

*In the opinion of Co-Bond Counsel, interest on the Series 2017 Bonds (including interest in the form of original issue discount properly allocated to a holder thereof) is excludable from the gross income of the holders of the Series 2017 Bonds for purposes of federal income taxation under existing statutes, regulations, rulings and court decisions, subject to the conditions described in "TAX MATTERS – Federal Tax Exemption" herein. Interest on the Series 2017 Bonds will not be treated as an item of tax preference for purposes of determining either individual or corporate alternative minimum taxes; however, such interest is taken into account in computing the alternative minimum tax for certain corporations and may be subject to certain other federal taxes affecting corporate holders of the Series 2017 Bonds. Under the laws of the Commonwealth of Pennsylvania, as enacted and construed on the date hereof, the Series 2017 Bonds are exempt from Pennsylvania personal property taxes, and the interest on the Series 2017 Bonds is exempt from Pennsylvania income tax and Pennsylvania corporate net income tax and any profits, gains or income derived from the sale or transfer of the Series 2017 Bonds shall be free from taxation in the Commonwealth of Pennsylvania. Under existing law, interest on the Series 2017 Bonds and net gains from the sale of the Series 2017 Bonds are exempt from the tax imposed by the New Jersey Gross Income Tax Act. For a more complete discussion, see "TAX MATTERS" herein.*



**\$430,250,000**  
**DELAWARE RIVER JOINT TOLL BRIDGE COMMISSION**  
**(Pennsylvania - New Jersey)**  
**Bridge System Revenue Bonds, Series 2017**

**Dated:** Date of Delivery

**Due:** July 1 (as shown on inside front cover)

The Delaware River Joint Toll Bridge Commission (the "Commission") will issue its \$430,250,000 Bridge System Revenue Bonds, Series 2017 (the "Series 2017 Bonds") to finance, together with other moneys of the Commission, (i) the cost of the Project; (ii) a deposit into the Debt Service Reserve Fund necessary to satisfy the Debt Service Reserve Fund Requirement; (iii) a deposit to the Series 2017 Capitalized Interest Account to pay capitalized interest for the Series 2017 Bonds; and (iv) costs of issuance of the Series 2017 Bonds. The Series 2017 Bonds will be issued pursuant to the Trust Indenture, dated as of January 1, 2003, between the Commission and TD Bank, National Association, as successor trustee (the "Trustee"), as previously supplemented and amended, and as further supplemented and amended by a Tenth Supplemental Trust Indenture, dated as of February 1, 2017 (collectively, the "Indenture"), and in accordance with the Compact (as defined herein) between the Commonwealth of Pennsylvania and the State of New Jersey and consented to by the Congress of the United States of America, as more fully described herein. See APPENDIX C - "DEFINITIONS OF CERTAIN TERMS AND SUMMARY OF CERTAIN PROVISIONS OF THE INDENTURE" herein.

The Series 2017 Bonds mature on the dates and in the principal amounts, and bear interest at the rates set forth on the inside front cover of this Official Statement. Interest on the Series 2017 Bonds is payable on each January 1 and July 1, commencing on July 1, 2017 (each, an "Interest Payment Date"), until maturity or redemption prior to maturity. See "DESCRIPTION OF THE SERIES 2017 BONDS" herein. Interest on the Series 2017 Bonds will be paid to the registered holders at their addresses as they appear on the registry books of the Trustee as of the fifteenth day of the month (whether or not a Business Day) next preceding each Interest Payment Date.

The Series 2017 Bonds will be issued in book-entry-only form, and when issued will be registered in the name of Cede & Co., as nominee of The Depository Trust Company, New York, New York ("DTC"). DTC will act as securities depository for the Series 2017 Bonds. Purchases of beneficial ownership interests in the Series 2017 Bonds may be made in book-entry-only form in denominations of \$5,000 each or any integral multiple thereof. So long as Cede & Co., as nominee for DTC, is the registered owner of the Series 2017 Bonds, payments of principal of and interest on the Series 2017 Bonds will be made by the Trustee to Cede & Co. See APPENDIX F - "BOOK-ENTRY ONLY SYSTEM AND THE DEPOSITORY TRUST COMPANY" herein.

The Series 2017 Bonds are subject to redemption as provided herein. See "DESCRIPTION OF THE SERIES 2017 BONDS — Redemption Provisions" herein.

The Series 2017 Bonds are limited obligations of the Commission and are payable solely from the Trust Estate (as defined herein) consisting primarily of Net Revenues (as defined herein), equally and ratably with the Commission's Outstanding Bonds and other Outstanding Parity Obligations (except as otherwise provided in the Indenture), as more fully described under "SECURITY FOR THE SERIES 2017 BONDS" and "COMMISSION INDEBTEDNESS AND OTHER PARITY OBLIGATIONS" herein.

**THE SERIES 2017 BONDS ARE LIMITED OBLIGATIONS OF THE COMMISSION PAYABLE SOLELY FROM THE TRUST ESTATE CONSISTING PRIMARILY OF NET REVENUES. THE COMMISSION HAS NO POWER TO LEVY OR COLLECT TAXES. THE SERIES 2017 BONDS ARE NEITHER A DEBT NOR A LIABILITY OF THE COMMONWEALTH OF PENNSYLVANIA OR THE STATE OF NEW JERSEY OR ANY POLITICAL SUBDIVISION OF EITHER THEREOF, AND DO NOT AND SHALL NOT CREATE OR CONSTITUTE AN INDEBTEDNESS OR AN OBLIGATION OF THE COMMONWEALTH OF PENNSYLVANIA OR THE STATE OF NEW JERSEY OR ANY POLITICAL SUBDIVISION OF EITHER THEREOF, EITHER LEGAL, MORAL OR OTHERWISE.**

This cover page contains information for quick reference only. It is not a summary of this issue. Investors must read the entire Official Statement, including the appendices attached hereto, to obtain information essential to the making of an informed investment decision.

*The Series 2017 Bonds are offered when, as and if issued by the Commission and accepted by the Underwriters, subject to withdrawal or modification of the offering without notice, and subject to the approval as to legality by Dilworth Paxson LLP, Philadelphia, Pennsylvania, and Gibbons P.C., Newark, New Jersey, Co-Bond Counsel. Certain legal matters will be passed upon for the Commission by Florio Perrucci Steinhardt & Fader LLC, Phillipsburg, New Jersey, and Stradley Ronon Stevens & Young, LLP, Philadelphia, Pennsylvania, and for the Underwriters by Cozen O'Connor, Philadelphia, Pennsylvania, and Gluck Wahrath LLP, Red Bank, New Jersey. Certain other legal matters respecting the Bonds will be passed upon for the Commission by Greenberg Traurig, LLP, Philadelphia, Pennsylvania, and McManimon, Scotland & Baumann, LLC, Roseland, New Jersey, Co-Disclosure Counsel. Phoenix Capital Partners, Philadelphia, Pennsylvania, has acted as Financial Advisor to the Commission. The Series 2017 Bonds are expected to be available for delivery through the facilities of DTC on or about March 1, 2017.*

**BofA Merrill Lynch**  
**Loop Capital Markets**

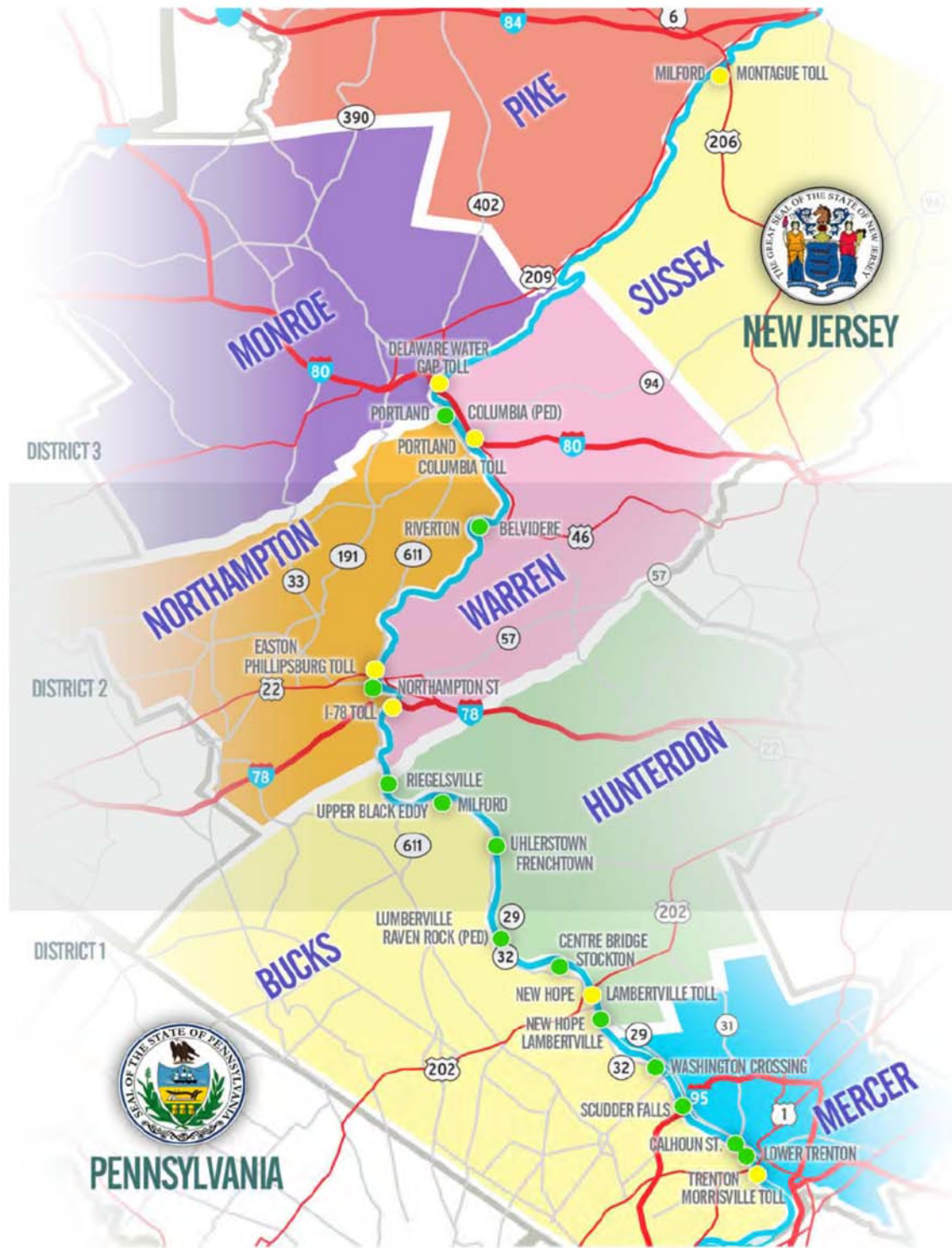
**Siebert Cisneros Shank & Co., L.L.C.**  
**Morgan Stanley**

**Academy Securities**   **Janney Montgomery Scott**

**Jefferies**

**Mischler Financial Group, Inc.**

**Ramirez & Co., Inc.**



● Toll bridges

● Toll-supported bridges

**DELAWARE RIVER JOINT TOLL BRIDGE COMMISSION**  
(Pennsylvania - New Jersey)

**\$430,250,000 Bridge System Revenue Bonds, Series 2017**

(July 1) Year	Principal Amount	Interest Rate	Price or Yield	CUSIP <sup>±</sup>
2020	\$945,000	1.400%	100%	246343KR7
2021	875,000	1.625	100	246343KS5
2022	1,740,000	5.000	1.810	246343KT3
2023	1,865,000	5.000	2.030	246343KU0
2024	1,970,000	5.000	2.310	246343KV8
2025	1,070,000	3.000	2.520	246343KW6
2027	20,000	4.000	2.800	246343KX4
2028	35,000	4.000	2.950*	246343KY2
2029	8,380,000	5.000	3.080*	246343KZ9
2030	8,845,000	5.000	3.190*	246343LA3
2031	10,765,000	5.000	3.270*	246343LB1
2032	14,735,000	5.000	3.350*	246343LC9
2033	15,715,000	5.000	3.410*	246343LD7
2034	16,500,000	5.000	3.470*	246343LE5
2035	17,325,000	5.000	3.520*	246343LF2
2036	18,190,000	5.000	3.560*	246343LG0
2037	22,015,000	5.000	3.590*	246343LH8

\$127,730,000 5.000% Term Bonds due July 1, 2042, Yield 3.640%\*, CUSIP<sup>±</sup> 246343LJ4

\$86,530,000 5.000% Term Bonds due July 1, 2047, Yield 3.690%\*, CUSIP<sup>±</sup> 246343LL9

\$75,000,000 4.000% Term Bonds due July 1, 2047, Yield 4.040%, CUSIP<sup>±</sup> 246343LK1

\* Priced at the stated yield to the first optional redemption date of July 1, 2027 at a redemption price of 100%.

± "CUSIP" is a registered trademark of the American Bankers Association. CUSIP numbers are provided by CUSIP Service Bureau, a Standard & Poor's Financial Services LLC business. The CUSIP numbers listed above are being provided solely for the convenience of holders of the Series 2017 Bonds only at the time of issuance of the Series 2017 Bonds and the Commission and the Underwriters do not make any representations with respect to such numbers or undertake any responsibility for their accuracy now or at any time in the future. The CUSIP number for a specified maturity is subject to being changed after the issuance of the Series 2017 Bonds as a result of various subsequent actions including, but not limited to, a refunding in whole or in part of such maturity or as a result of the procurement of secondary market portfolio insurance or other similar enhancement by investors that is applicable to all or a portion of certain maturities of the Series 2017 Bonds.

## **DELAWARE RIVER JOINT TOLL BRIDGE COMMISSION**

### **MEMBERS**

#### ***New Jersey***

Michael B. Lavery, *Chairman*  
Lori Ciesla  
Yuki Moore Laurenti  
Garret Leonard Van Vliet  
Geoffrey S. Stanley

#### ***Pennsylvania***

Wadud Ahmad, *Vice Chairman*  
Daniel H. Grace  
Vacant  
Pam Janvey  
John Siptroth

### **STAFF**

Joseph J. Resta, *Executive Director*  
James M. Petrino, *Chief Financial Officer*  
Arnold J. Conoline, Jr., *Chief Administrative Officer*  
Sean M. Hill, *Deputy Executive Director of Operations*  
Joseph F. Donnelly, Jr., *Deputy Executive Director of Communications*  
Roy W. Little, *Chief Engineer*  
Kevin M. Skeels, *Assistant Chief Engineer*  
Stephen Cathcart, CPA, *Comptroller*

### **FINANCIAL ADVISOR TO THE COMMISSION**

Phoenix Capital Partners, *Transaction Financial Advisor*

### **CONSULTANTS TO THE COMMISSION**

Jacobs Engineering Group, Inc., *Investment Grade Traffic and Revenue Forecast Consultant*  
Pennonni Associates, Inc., *Traffic Engineer*  
Cherry Weber & Associates, PC, *General Engineering Consultant*  
Zelenkofske Axelrod LLC, *Auditors*

### **COUNSEL TO THE COMMISSION**

Dilworth Paxson LLP, *Co-Bond Counsel*  
Gibbons P.C., *Co-Bond Counsel*  
Florio Perrucci Steinhardt & Fader LLC, *New Jersey Counsel*  
Stradley Ronon Stevens & Young, LLP, *Pennsylvania Counsel*  
Greenberg Traurig, LLP, *Co-Disclosure Counsel*  
McManimon, Scotland & Baumann, LLC, *Co-Disclosure Counsel*

### **TRUSTEE**

TD Bank, National Association

### **DISSEMINATION AGENT**

Digital Assurance Certification, L.L.C.

This Official Statement is being provided to prospective purchasers in either bound or printed format (the “Original Bound Format”), or in electronic format on the following websites: <https://www.munios.com> and <https://emma.msrb.org/> (the “Electronic Format”). Prospective purchasers may rely on the information contained in this Official Statement in the Original Bound Format or in the Electronic Format. Prospective purchasers must read this entire Official Statement (including the cover page and all appendices attached hereto) to obtain all of the information essential to the making of an informed investment decision.

No dealer, broker, salesman or other person has been authorized by the Commission or the Underwriters to give any information or to make any representations with respect to the Series 2017 Bonds other than those contained in this Official Statement, and if given or made, such other information or representations must not be relied upon as having been authorized by any of the foregoing. This Official Statement does not constitute an offer to sell or the solicitation of an offer to buy, nor shall there be any sale of the Series 2017 Bonds by any person in any jurisdiction in which it is unlawful for such person to make such offer, solicitation or sale.

Certain information contained herein has been provided by the Commission and by other sources which the Commission believes to be reliable, but the information obtained from such other sources is not guaranteed as to accuracy or completeness by, and is not to be construed as a representation of, the Commission.

The information and expressions of opinion herein are subject to change without notice and neither the delivery of this Official Statement nor any sale of the Series 2017 Bonds shall, under any circumstances, create an implication that there has been no change in any of the information set forth herein since the date hereof. This Official Statement is submitted in connection with the sale of the Series 2017 Bonds referred to herein and may not be used, in whole or in part, for any other purpose.

Statements contained in this Official Statement, including the Appendices hereto, which involve estimates, forecasts or other matters of opinion, whether or not expressly so described herein, are intended solely as such and are not to be construed as representations of fact. If and when included in this Official Statement, the words “expects,” “forecasts,” “projects,” “intends,” “anticipates,” “estimates,” “assumes” and analogous expressions are intended to identify forward-looking statements and any such statements inherently are subject to a variety of risks and uncertainties that could cause actual results to differ materially from those that have been projected. Such risks and uncertainties which could affect the amount of revenue collected by the Commission include, among others, changes in economic conditions and various other events, conditions and circumstances, many of which are beyond the control of the Commission. Such forward-looking statements speak only as of the date of this Official Statement. The Commission disclaims any obligation or undertaking to release publicly any updates or revisions to any forward-looking statement contained herein to reflect any changes in the Commission’s expectations with regard thereto or any change in events, conditions or circumstances on which any such statement is based.

In connection with this offering, the Underwriters may over-allot or effect transactions which stabilize or maintain the market price of the Series 2017 Bonds at a level above that which might otherwise prevail in the open market. Such stabilizing, if commenced, may be discontinued at any time without prior notice. The Underwriters may offer and sell the Series 2017 Bonds to certain dealers at prices lower than the public offering prices stated on the inside cover page hereof and said public offering prices may be changed from time to time by the Underwriters.

The Underwriters have provided the following sentence for inclusion in this Official Statement. The Underwriters have reviewed the information in this Official Statement in accordance with, and as part of, their responsibilities to investors under the federal securities laws as applied to the facts and

circumstances of this transaction, but the Underwriters do not guarantee the accuracy or completeness of such information.

In making an investment decision investors must rely on their own examination of the Commission and the terms of the offering, including the merits and risks involved. These securities have not been recommended by any federal or state securities commission or regulatory authority. Furthermore, the foregoing authorities have not approved or disapproved of these securities or passed upon or confirmed the accuracy or determined the adequacy of this Official Statement. Any representation to the contrary is a criminal offense.

REFERENCES TO WEBSITE ADDRESSES PRESENTED HEREIN ARE FOR INFORMATIONAL PURPOSES ONLY AND MAY BE IN THE FORM OF A HYPERLINK SOLELY FOR THE READER'S CONVENIENCE. UNLESS SPECIFIED OTHERWISE, SUCH WEBSITES AND THE INFORMATION OR HYPERLINKS CONTAINED THEREIN ARE NOT INCORPORATED INTO, AND ARE NOT PART OF, THIS OFFICIAL STATEMENT FOR ANY PURPOSES, INCLUDING FOR PURPOSES OF RULE 15(c)2-12 PROMULGATED BY THE SECURITIES AND EXCHANGE COMMISSION.

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## **OFFICIAL STATEMENT**

**Relating to**

**\$430,250,000**

**DELAWARE RIVER JOINT TOLL BRIDGE COMMISSION**

**(Pennsylvania — New Jersey)**

**Bridge System Revenue Bonds, Series 2017**

### **INTRODUCTION**

#### **General**

This Official Statement, including the cover pages and the Appendices hereto, sets forth information concerning the \$430,250,000 Delaware River Joint Toll Bridge Commission Bridge System Revenue Bonds, Series 2017 (the “Series 2017 Bonds”), issued by the Delaware River Joint Toll Bridge Commission (the “Commission”). The Series 2017 Bonds will be issued in accordance with the Compact (as defined herein), and as Additional Bonds (as defined herein) pursuant to a Trust Indenture, dated as of January 1, 2003 (the “General Indenture”), between the Commission and TD Bank, National Association (successor trustee to Commerce Bank/Pennsylvania, National Association), as trustee (the “Trustee”), as amended and supplemented by nine supplemental trust indentures, and as further amended and supplemented by a Tenth Supplemental Trust Indenture, dated as of February 1, 2017 (the “Tenth Supplemental Trust Indenture,” and together with the General Indenture as amended and supplemented, the “Indenture”). Capitalized terms used but not defined herein shall have the meanings ascribed to them in the Indenture. See APPENDIX C – “DEFINITIONS OF CERTAIN TERMS AND SUMMARY OF CERTAIN PROVISIONS OF THE INDENTURE” attached hereto.

#### **Delaware River Joint Toll Bridge Commission**

The Commission is a bi-state agency created by a bi-state compact executed in December of 1934 between the Commonwealth of Pennsylvania and the State of New Jersey, and consented to by the Congress of the United States of America (the “Compact”). See “DELAWARE RIVER JOINT TOLL BRIDGE COMMISSION” herein.

The Commission currently owns and operates twenty bridges crossing the Delaware River between Pennsylvania and New Jersey within a geographic jurisdiction extending from the northern border of the City of Philadelphia to the New York State border. Currently, seven of the bridges are toll bridges and thirteen are toll supported bridges. In addition to the bridges crossing the Delaware, the Commission also owns and operates thirty-four approach structures (overpasses, underpasses, toll plazas, entrance plazas, etc.) within its jurisdiction (collectively, the “System”). Currently, revenues from the seven toll bridges are the only source of funds available to the Commission for maintaining all twenty bridges and the thirty-four approach structures. The Commission receives no state or federal funds for operation or maintenance of the System. See “THE BRIDGE SYSTEM” herein. A portion of the proceeds of the Series 2017 Bonds will be used to finance the construction of a new Scudder Falls Bridge consisting of two parallel spans (the “New Scudder Falls Bridge”). Upon completion of the first span of the New Scudder Falls Bridge, the Commission will collect tolls on such bridge in the southbound/westbound direction (New Jersey to Pennsylvania) and will then receive revenues from eight toll bridges. See “PLAN OF FINANCE – The Project” herein.

## **Purpose of the Series 2017 Bonds**

The Series 2017 Bonds will be used to finance: (i) a portion of the cost of the Project (as defined herein); (ii) a deposit into the Debt Service Reserve Fund necessary to satisfy the Debt Service Reserve Fund Requirement; (iii) a deposit to the Series 2017 Capitalized Interest Account to pay capitalized interest for the Series 2017 Bonds; and (iv) costs of issuance of the Series 2017 Bonds.

## **The Project**

The Scudder Falls Bridge Replacement Project (the “Project”) includes: (i) the demolition of the existing Scudder Falls Bridge (the “Existing Scudder Falls Bridge”) and the construction of the New Scudder Falls Bridge over the Delaware River; (ii) related roadway widening and improvements in Pennsylvania and New Jersey; (iii) the reconfiguration of interchanges in Pennsylvania and New Jersey; (iv) a pedestrian/bicycle pathway; (v) construction of noise walls in Pennsylvania and New Jersey; (vi) construction of a structure and related equipment for All Electronic Tolling (as defined herein); and (vii) wetland mitigation. For a more complete description of the Project, see “THE PROJECT” herein.

## **Security for the Series 2017 Bonds; Parity Obligations**

The Series 2017 Bonds are limited obligations of the Commission, payable solely from the Trust Estate (as defined herein), consisting primarily of Net Revenues (as defined herein) of the System. The Series 2017 Bonds are secured under the Indenture, equally and ratably with the Commission’s Outstanding Bonds (as defined herein) and other Parity Obligations (as defined herein) and any Bonds or Parity Obligations issued in the future, except as otherwise provided in the Indenture. See “SECURITY FOR THE BONDS – General”, “SECURITY FOR THE BONDS – Debt Service Reserve Fund” and “COMMISSION INDEBTEDNESS – Parity Indebtedness” herein.

The Series 2017 Bonds are Debt Service Reserve Fund Bonds (as defined herein) and shall be entitled to the benefit of the Debt Service Reserve Fund established under the Indenture for certain series of the Commission’s Bonds. See “SECURITY FOR THE SERIES 2017 BONDS – Debt Service Reserve Fund” herein.

**THE COMMISSION HAS NO POWER TO LEVY OR COLLECT TAXES. THE SERIES 2017 BONDS ARE NEITHER A DEBT NOR A LIABILITY OF THE COMMONWEALTH OF PENNSYLVANIA OR THE STATE OF NEW JERSEY OR ANY POLITICAL SUBDIVISION OF EITHER THEREOF, AND DO NOT AND SHALL NOT CREATE OR CONSTITUTE AN INDEBTEDNESS OR AN OBLIGATION OF THE COMMONWEALTH OF PENNSYLVANIA OR THE STATE OF NEW JERSEY OR ANY POLITICAL SUBDIVISION OF EITHER THEREOF, EITHER LEGAL, MORAL OR OTHERWISE.**

## **Rate Covenant**

The Commission has agreed in the Indenture that it will establish and maintain a schedule of Tolls (as defined herein) for vehicular traffic over the System, and will collect Tolls, so that the Net Revenues of the System in each Fiscal Year will at all times be at least sufficient to meet certain debt service coverage ratios. See “SECURITY FOR THE SERIES 2017 BONDS – Rate Covenant” herein.

## **Investment Considerations**

There are certain risks inherent in investing in the Series 2017 Bonds. For a discussion of certain factors that should be considered in evaluating an investment in the Series 2017 Bonds, see “INVESTMENT CONSIDERATIONS” herein.

## **Consultant Reports**

This Official Statement refers to and/or contains reports of various consultants of the Commission, including estimates of revenues and expenditures and other matters relating to the operation of the System and financial information relating to the Commission.

*Traffic and Revenue Report.* Jacobs Engineering Group, Inc. (“Jacobs”) has prepared a Long Term Traffic and Revenue Report, dated February 7, 2017 (the “Traffic and Revenue Report”) which provides an analysis of the traffic and revenues of the System commencing with the year ending December 31, 2004 and provides traffic and revenue forecasts through December 31, 2026. Such forecasts are based upon many factors and assumptions, including the completion of the first span of the New Scudder Falls Bridge and the collection of tolls on the New Scudder Falls Bridge commencing in June 2019. The Traffic and Revenue Report is attached hereto as Appendix A.

*Audited Financial Statements.* Attached hereto as Appendix B are the financial statements for the Commission for the years ended December 31, 2015 and 2014, which includes the report of Zelenkofske Axelrod LLC, the Commission’s auditor.

*Inspection Reports.* The Commission is required, pursuant to the Indenture, to engage a consultant to conduct an inspection of the System at least once every two years and deliver a report to the Commission setting forth its findings and recommendations as to revisions or additions to the Commission’s latest Annual Capital Budget. All of the Commission’s toll bridges are inspected in odd-numbered years while all of the Commission’s toll-supported bridges are inspected in even-numbered years. See “THE BRIDGE SYSTEM – General” herein. Cherry, Weber & Associates, PC (the “General Engineer”) has prepared the 2015 Toll Bridge Annual Inspection Report, dated February 5, 2016 (the “2015 Bridge Inspection Report”). The 2015 Bridge Inspection Report and prior years’ reports can be found at <https://www.drjtbc.org/documents/inspection>.

*Traffic Engineering Report.* The Commission has retained Pennoni Associates Inc. (“Pennoni”) to annually deliver traffic and revenue reports to the Commission to determine if the Commission generates sufficient revenue to meet the covenants set forth in the Indenture (the “Pennoni Report”). As of the date of this Official Statement, the Pennoni Report for the year ended December 31, 2016 (the “Pennoni 2016 Report”) is not complete. Upon completion of the Pennoni 2016 Report, the Commission will make it available at <https://www.drjtbc.org/documents/traffic>. Prior years’ Pennoni Reports can also be found at such website.

## **PLAN OF FINANCE**

### **General**

The proceeds of the Series 2017 Bonds will be used to finance: (i) a portion of the cost of the Project; (ii) a deposit into the Debt Service Reserve Fund necessary to satisfy the Debt Service Reserve Fund Requirement; (iii) a deposit to the Series 2017 Capitalized Interest Account to pay capitalized interest for the Series 2017 Bonds; and (iv) costs of issuance of the Series 2017 Bonds.

The estimated total cost of the Project is \$512 million. The Commission expects to contribute approximately \$90 million from available funds to pay a portion of the costs of the Project.

### **ESTIMATED SOURCES AND USES OF FUNDS**

The following table sets forth the estimated sources and uses of the proceeds of the Series 2017 Bonds which, together with other moneys of the Commission, will be used to finance the Project.

#### **Sources:**

Principal amount of Series 2017 Bonds	\$430,250,000.00
Net original issue premium	42,974,745.00
TOTAL SOURCES	\$473,224,745.00

#### **Uses:**

Deposit to Construction Fund	\$422,020,238.85
Deposit to Debt Service Reserve Fund	30,601,000.00
Deposit to Series 2017 Capitalized Interest Account	17,227,511.01
Costs of Issuance <sup>(1)</sup>	3,375,995.14
TOTAL USES	\$473,224,745.00

<sup>(1)</sup> Includes Underwriters' discount, printing costs, legal, rating agency, financial advisory and trustee fees, and other costs related to the issuance of the Series 2017 Bonds.

### **DESCRIPTION OF THE SERIES 2017 BONDS**

#### **General Provisions**

The Series 2017 Bonds will initially be dated their date of delivery and will bear interest from that date at the rates per annum and mature on the dates and in the principal amounts set forth on the inside cover page of this Official Statement. Interest on the Series 2017 Bonds will be computed on the basis of a 360-day year consisting of twelve 30-day months and will be payable semiannually on January 1 and July 1 of each year, commencing on July 1, 2017 (each, an "Interest Payment Date"), until maturity or redemption prior to maturity. Interest on the Series 2017 Bonds will be paid to the registered holders at their addresses as they appear on the registry books of the Trustee as of the fifteenth day of the calendar month (whether or not a Business Day) next preceding each Interest Payment Date. Any interest not paid on an Interest Payment Date shall be paid to the persons in whose names Series 2017 Bonds are registered as of a special record date established by notice mailed by or on behalf of the Commission not less than ten days prior to such date to the persons in whose names Series 2017 Bonds are registered at the close of business on the fifth day prior to such mailing.

The Series 2017 Bonds will be issued as fully registered bonds in denominations of \$5,000 each or any integral multiple thereof and will be issued in book-entry form, registered in the name of Cede & Co., as nominee for The Depository Trust Company, New York, New York ("DTC"). So long as the Series 2017 Bonds are in book-entry form, the principal and redemption price of and interest on the Series 2017 Bonds is payable to DTC for redistribution by DTC to the DTC Participants and in turn to beneficial owners as described in APPENDIX F - "BOOK-ENTRY ONLY SYSTEM AND THE DEPOSITORY TRUST COMPANY."

The Indenture and all provisions thereof are incorporated by reference in the text of the Series 2017 Bonds, and the Series 2017 Bonds provide that each beneficial owner, DTC Participant or Indirect Participant (as such terms are hereinafter defined) in DTC, by acceptance of a Series 2017 Bond (including receipt of a book-entry credit evidencing an interest therein) assents to all of such provisions as an explicit and material portion of the consideration running to the Commission to induce it to issue such Series 2017 Bond.

## Redemption Provisions

*Optional Redemption of Series 2017 Bonds.* The Series 2017 Bonds maturing on or after July 1, 2028 are subject to optional redemption prior to maturity by the Commission, at any time, on or after July 1, 2027, in whole or in part, at a redemption price equal to 100% of the principal amount thereof, plus accrued interest to the redemption date.

*Mandatory Redemption.* The Series 2017 Bonds maturing on July 1, 2042, July 1, 2047 (5.00% coupon) and July 1, 2047 (4.00% coupon) are subject to mandatory sinking fund redemption prior to maturity by the Commission in part by lot on July 1 of the years and in the amounts set forth below, at a redemption price equal to 100% of the principal amounts set forth below, plus accrued interest to the redemption date.

### Maturing July 1, 2042

<u>Year (July 1)</u>	<u>Principal Amount</u>
2038	\$23,115,000
2039	24,270,000
2040	25,485,000
2041	26,760,000
2042*	28,100,000

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\*Final maturity

### Maturing July 1, 2047 (5.00% coupon)

<u>Year (July 1)</u>	<u>Principal Amount</u>
2043	\$15,930,000
2044	16,590,000
2045	17,275,000
2046	17,990,000
2047*	18,745,000

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\*Final maturity

**Maturing July 1, 2047 (4.00% coupon)**

Year (July 1)	Principal Amount
2043	\$13,575,000
2044	14,255,000
2045	14,965,000
2046	15,715,000
2047*	16,490,000

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\*Final maturity

*Redemption Procedures.* Pursuant to the Indenture, if less than all of the Series 2017 Bonds shall be called for optional redemption, the particular maturities of Series 2017 Bonds and principal amount thereof to be optionally redeemed shall be selected by the Commission. The particular Series 2017 Bonds or portions of Series 2017 Bonds within a maturity to be redeemed shall be selected by lot by the Trustee or in such manner as the Trustee in its discretion may determine, provided, however, that the portion of Series 2017 Bonds to be redeemed shall be in denominations of \$5,000 or any integral multiple of \$5,000, and that, in selecting portions of Series 2017 Bonds for redemption, the Trustee shall treat the Series 2017 Bonds as representing that number of Series 2017 Bonds which are obtained by dividing the principal amount thereof by \$5,000. In the case of optional redemption of Series 2017 Bonds subject to mandatory sinking fund redemption prior to maturity, the Commission shall be entitled to designate whether payments made in connection with such optional redemption shall be credited against principal amounts due at maturity or against particular mandatory redemption obligations with respect to the Series 2017 Bonds.

**Notice of Redemption**

In the event of any redemption as discussed above, either in whole or in part, notice of such redemption shall be sent by first class mail, postage prepaid, at least 30 days, but not more than 60 days prior to the redemption date to the registered owners of any Series 2017 Bonds or portions of Series 2017 Bonds to be redeemed at their registered addresses in the manner and under the terms and conditions provided in the Indenture. As long as DTC remains the sole registered owner of the Series 2017 Bonds, notice of redemption shall be sent to DTC as provided in the Indenture. Notice of redemption having been given as aforesaid, the Series 2017 Bonds or portions thereof so called for redemption shall become due and payable at the applicable redemption price herein provided, and from and after the date so fixed for redemption, interest on the Series 2017 Bonds or portions thereof so called for redemption shall cease to accrue and become payable. If a conditional notice of redemption has been given as permitted under the Indenture and the moneys have been duly deposited with TD Bank, National Association, as paying agent (the "Paying Agent"), sufficient to make such redemption, then the Series 2017 Bonds called for redemption shall be payable on the redemption date at the applicable redemption price and from and after the date so fixed for redemption, interest on the Series 2017 Bonds or portions thereof so called for redemption shall cease to accrue and become payable. Any failure of DTC to advise any DTC Participant, or of any DTC Participant or Indirect Participant to notify the beneficial owner of any such notice and its content or effect will not affect the validity of the redemption of the Series 2017 Bonds called for redemption or of any other action premised on such notice. See APPENDIX F - "BOOK-ENTRY ONLY SYSTEM AND THE DEPOSITORY TRUST COMPANY".



## Transfers and Exchanges of Bonds

So long as the Series 2017 Bonds are in book-entry form, transfers and exchanges will be effected through the facilities of DTC as described in APPENDIX F - “BOOK-ENTRY ONLY SYSTEM AND THE DEPOSITORY TRUST COMPANY”.

## Book-Entry Only System and The Depository Trust Company

For information related to DTC and the book-entry system, see Appendix F hereto.

## SECURITY FOR THE SERIES 2017 BONDS

### General

The Series 2017 Bonds are limited obligations of the Commission, payable solely from the Trust Estate, consisting primarily of Net Revenues of the System. The Series 2017 Bonds are secured under the Indenture, equally and ratably with the Commission’s Outstanding Bonds and other Parity Obligations and any Bonds or Parity Obligations issued in the future, except as otherwise provided in the Indenture. The Series 2017 Bonds and the outstanding Series 2005A Bonds, Series 2007A Bonds, Series 2007B Bonds, Series 2012A Bonds, Series 2012B Bonds, Series 2015 Bonds (as each term is defined in APPENDIX C – “DEFINITIONS OF CERTAIN TERMS AND SUMMARY OF CERTAIN PROVISIONS OF THE INDENTURE”) and any Additional Bonds are collectively referred to herein as the “Bonds.”

### Trust Estate

The Bonds and any Parity Obligations are secured equally and ratably by the “Trust Estate,” which includes: (1) Net Revenues of the System, (2) all monies deposited into accounts or funds created by the Indenture other than the Rebate Fund (3) any insurance proceeds required to be deposited into such accounts or funds, (4) all payments received pursuant to any Parity Swap Agreements (as defined herein), and (5) all investment earnings on all monies held in accounts and funds established by the Indenture other than the Rebate Fund; *provided, however, that the Series 2007B-1 Bonds, the Series 2007B-2 Bonds, the Series 2012B Bonds and the Parity Swap Obligations are **not** secured by monies held in the Debt Service Reserve Fund or any accounts held therein. Further, certain series of Bonds are secured by Specific Series Only Accounts (as defined herein), as more fully discussed under the heading “SECURITY FOR THE SERIES 2017 BONDS – Debt Service Reserve Fund.”* Certain capitalized terms used in this paragraph are defined below.

“Current Expenses” means the Commission’s reasonable and necessary current expenses of maintenance, repair and operation of the System, including, without limiting the generality of the foregoing, all premiums for insurance and payments into any self-insurance reserve fund, all administrative, management, service and engineering expenses relating to maintenance, repair and operation of the System, fees and expenses of the Trustee and of the Paying Agents, Policy Costs, legal expenses and any other expenses required to be paid by the Commission as shown in the Annual Operating Budget for the System.

“Net Revenues” means the amount by which total Revenues exceed Current Expenses for any particular period.

As a result of an amendment to the General Indenture that does not require bondholder consent, upon execution of the Tenth Supplemental Indenture, the term “Revenues” shall mean (a) all Tolls

received by or on behalf of the Commission from the System, (b) miscellaneous non-Toll revenues derived from the System, (c) any other sources of revenues or funds of the Commission which the Commission chooses to include in the Trust Estate pursuant to a Supplemental Indenture, and (d) the interest and income earned on any fund or account where said interest or income is required to be credited to the Revenue Fund pursuant to the Indenture. In the event the Commission receives advances or prepayments or otherwise operates or participates in a system in which funds are collected prior to the actual usage of the System, such funds shall not be deemed to be Revenues until the usage occurs or the funds are earned pursuant to the agreement under which the Commission receives funds.

“Tolls” means all rates, rents, fees, charges, fines or other income derived by the Commission from vehicular usage of the System, and all rights to receive the same.

See Table 1 under the caption “COMMISSION INDEBTEDNESS AND OTHER PARITY OBLIGATIONS– Parity Indebtedness” for a list of the Commission’s Outstanding Bonds as of December 31, 2016. See also “COMMISSION INDEBTEDNESS AND OTHER PARITY OBLIGATIONS – Commission Payment Obligations under Parity Swap Agreements” for a discussion of the Commission’s obligations under the Parity Swap Agreements.

The Series 2017 Bonds shall be entitled to the benefit of the Debt Service Reserve Fund established under the Indenture for certain series of the Commission’s Bonds. See “SECURITY FOR THE SERIES 2017 BONDS – Debt Service Reserve Fund” herein.

**THE COMMISSION HAS NO POWER TO LEVY OR COLLECT TAXES. THE SERIES 2017 BONDS ARE NEITHER A DEBT NOR A LIABILITY OF THE COMMONWEALTH OF PENNSYLVANIA OR THE STATE OF NEW JERSEY OR ANY POLITICAL SUBDIVISION OF EITHER THEREOF, AND DO NOT AND SHALL NOT CREATE OR CONSTITUTE AN INDEBTEDNESS OR AN OBLIGATION OF THE COMMONWEALTH OF PENNSYLVANIA OR THE STATE OF NEW JERSEY OR ANY POLITICAL SUBDIVISION OF EITHER THEREOF, EITHER LEGAL, MORAL OR OTHERWISE.**

The Commission, pursuant to the Indenture, has established the following funds and accounts: the Revenue Fund, the Rebate Fund, the Operating Account, the Debt Service Fund, the Debt Service Reserve Fund, the Reserve Maintenance Fund and the General Reserve Fund. The Revenue Fund, Operating Account, Reserve Maintenance Fund and General Reserve Fund, together with all applicable accounts within each such fund, are held by the Commission. The Rebate Fund, Debt Service Fund and Debt Service Reserve Fund, together with all applicable accounts within such funds, are held by the Trustee.

## **Revenue Fund**

The Indenture creates the Revenue Fund, which is held by the Commission outside of the Indenture. The Commission covenants that all Revenues will be deposited daily, as far as practicable, with one or more Depositories to the credit of the Revenue Fund. Except as otherwise described herein under “Agreements with Other Toll Facilities,” transfers from the Revenue Fund shall be made to the following funds and in the following order of priority:

1. Rebate Fund;
2. Operating Account;
3. Debt Service Fund;

4. Debt Service Reserve Fund;
5. Reserve Maintenance Fund; and
6. General Reserve Fund.

### **Rebate Fund**

The Commission has covenanted to calculate and to pay directly to the government of the United States of America all amounts due for payment of “arbitrage rebate” under Section 148(f) of the Code with respect to any Bonds. Nevertheless, the Commission may deposit or direct the Trustee to deposit in the Rebate Fund amounts held in any other fund in accordance with the terms of the Indenture. Amounts on deposit in the Rebate Fund do not constitute part of the Trust Estate and may be used solely to make payments to the United States of America under Section 148 of the Code and to pay costs related to the calculation of the amounts due, except that, upon satisfaction of the Commission’s covenant described above, any amounts remaining in the Rebate Fund shall be deposited in the General Reserve Fund.

### **Operating Account**

The Commission shall establish an account known as the Operating Account which shall be held by the Commission in the name of the Commission outside of the Indenture until applied as set forth in the Indenture. The Commission shall transfer from the Revenue Fund on or before the last Business Day of each month to the credit of the Operating Account an amount equal to (i) the amount shown by the Annual Operating Budget to be necessary to pay Current Expenses for the ensuing month and (ii) an amount determined by a Commission Official as being reasonably necessary to pay Current Expenses which are expected for such month, after taking into account the amount on deposit in the Operating Account (including the amount described in clause (i) above), it being recognized that the Annual Operating Budget may have to be amended accordingly.

In making payments from the Operating Account, the Commission shall be deemed to be certifying that obligations in the stated amounts have been incurred by the Commission and that each item thereof was properly incurred in maintaining, repairing and operating the System, and has not been paid previously.

### **Debt Service Fund**

On or before the last Business Day preceding each Interest Payment Date or principal (or sinking fund redemption) payment date or such other day as set forth in a Supplemental Indenture, after making the deposits to the Operating Account provided for in the Indenture, the Commission shall withdraw from the Revenue Fund and pay over to the Trustee for deposit to the applicable Account in the Debt Service Fund (or to a Series Credit Facility Fund in lieu of either of the foregoing as provided for in the Indenture) the amounts due on any Parity Obligations.

The monies in the Interest and Principal Accounts shall be held by the Trustee in trust for the benefit of the Owners of the Bonds, to the extent the foregoing are payable from such accounts, and, to said extent and pending application, shall be subject to a lien and charge in favor of the Owners of the Bonds until paid out or transferred as provided for in the Indenture. There shall be withdrawn from the Interest Account and the Principal Account from time to time and set aside or deposited with the Trustee sufficient money for paying the interest on and the principal of and premium on the Bonds as the same shall become due, except to the extent such interest, principal or other amounts are payable from a fund or account other than the Debt Service Fund as provided in any Supplemental Indenture.

The Trustee is required to pay out of the Interest Account, from time to time, without further authorization from the Commission, and as the same shall become due and payable, the interest upon the Bonds, except to the extent payable from funds and accounts other than the Debt Service Fund, if applicable, as provided in any Supplemental Indenture. The Trustee is required likewise to pay out of the Principal Account, from time to time, without further authorization from the Commission, as the same shall become due and payable, the principal of the Bonds, except to the extent payable from funds and accounts other than the Debt Service Fund, if applicable, as provided in any Supplemental Indenture.

If at the time the Trustee is required to make a withdrawal from the Debt Service Fund, the monies therein shall not be sufficient for the purpose, the Trustee shall withdraw the amount of such deficiency from the monies on deposit in the following funds or accounts and transfer the same to the Debt Service Fund in the following order: the Debt Service Reserve Fund (only with respect to Debt Service Reserve Fund Bonds), the General Reserve Fund and the Reserve Maintenance Fund.

### **Debt Service Reserve Fund**

Pursuant to the General Indenture, the Commission is authorized to designate in a Supplemental Indenture any Long-Term Indebtedness that will be secured by the Debt Service Reserve Fund (the "Debt Service Reserve Fund Bonds"). The Commission did not designate the Series 2007B-1 Bonds, the Series 2007B-2 Bonds or the Series 2012B Bonds as Debt Service Reserve Fund Bonds. The Commission previously has designated the Series 2005A Bonds, the Series 2007A Bonds, the Series 2012A Bonds and the Series 2015 Bonds as Debt Service Reserve Fund Bonds. The Commission, in the Tenth Supplemental Indenture, will designate the Series 2017 Bonds as Debt Service Reserve Fund Bonds.

Monies held in the Debt Service Reserve Fund shall be used for the purpose of paying interest on, maturing principal of and mandatory sinking fund redemption price of Debt Service Reserve Fund Bonds whenever and to the extent that the monies held for the credit of the Debt Service Fund shall be insufficient for such purpose.

In each Fiscal Year, after first having made the deposits provided by the Indenture, the Commission shall transfer from the Revenue Fund on or before the last day of each month and pay over to the Trustee to the credit of the Debt Service Reserve Fund (1) the amount, if any, required to make the amount on deposit in the Debt Service Reserve Fund equal to the Debt Service Reserve Requirement, which restoration is intended to occur within eighteen months of the date of any insufficiency; and (2) the amount set forth in a Supplemental Indenture if an amount different than the Debt Service Reserve Requirement is required. The amounts transferred from the Revenue Fund to the Debt Service Reserve Fund pursuant to the previous sentence shall be allocated on a *pro rata* basis among the accounts and unallocated funds in the Debt Service Reserve Fund from which the moneys were withdrawn pursuant to the Indenture. The Debt Service Reserve Requirement is the amount equal to the Maximum Annual Debt Service on all Debt Service Reserve Fund Bonds, which includes the Series 2017 Bonds.

Pursuant to the Indenture, separate accounts (each a "Specific Series Only Account") may be created in the Debt Service Reserve Fund for a specific series of Debt Service Reserve Fund Bonds if so provided by the Supplemental Indenture pursuant to which the applicable series of Debt Service Reserve Fund Bonds are issued. If such accounts are created, the funds and DSRF Security (as defined below) held therein shall be available to make payments required under the Indenture for the benefit of all Debt Service Reserve Fund Bonds unless otherwise specified in a Supplemental Indenture. Pursuant to such authorization, the Commission created separate Specific Series Only Accounts in the Debt Service Reserve Fund in connection with the issuance of the following bonds: the Series 2005A Bonds ("2005A Bonds DSRF Account"), the Series 2007A Bonds ("2007A Bonds DSRF Account") and the Series 2012A Bonds ("2012A Bonds DSRF Account"). Pursuant to the Supplemental Indentures executed in

connection with each of these series of Bonds, amounts on deposit in such accounts, so long as such series of Bonds remains Outstanding: (i) are held by the Trustee solely for the benefit of the Owners of the specific series of Bonds for which such account has been created and (ii) are not available to pay debt service on any other Debt Service Reserve Fund Bonds. Upon execution of the Tenth Supplemental Trust Indenture, a new provision will be added to the General Indenture that provides that at such time as a series of Bonds for which a Specific Series Only Account has been created is no longer Outstanding under the Indenture, the Commission may direct the Trustee to transfer monies in the related Specific Series Only Account to any other account established in the Debt Service Reserve Fund.

In the event the Trustee shall be required to withdraw funds from the Debt Service Reserve Fund to restore a deficiency in the Debt Service Fund related to Debt Service Reserve Fund Bonds, the amount of such deficiency shall be allocated *pro rata* among the accounts and unallocated funds in the Debt Service Reserve Fund that relate to the series of Debt Service Reserve Funds Bonds for which payment is coming due on the next succeeding payment date on the basis of the ratio that the debt service for each particular series of Debt Service Reserve Fund Bonds for which payment is coming due bears to the debt service for all series of Debt Service Reserve Fund Bonds for which payment is coming due on the next succeeding payment date. If a Specific Series Only Account has been established in the Debt Service Reserve Fund solely for the benefit of a particular series of Bonds (“Specific Account Bonds”), the Trustee shall first withdraw monies from such Specific Series Only Account to restore a deficiency in the interest and principal subaccounts established in the Debt Service Fund for such Specific Account Bonds and, thereafter, to the extent necessary or required, from the other accounts and unallocated funds in the Debt Service Reserve Fund on a *pro rata* basis. Investors should note that in effecting the *pro rata* allocation of funds from the Debt Service Reserve Fund for the various series of Debt Service Reserve Fund Bonds, the share of such funds allocable to such series of Specific Account Bonds shall be net of funds withdrawn from the related Specific Series Only Account.

As described above, since Specific Series Only Accounts have been established in the Debt Service Reserve Fund for the Series 2005A Bonds, the Series 2007A Bonds and the Series 2012A Bonds, the Trustee shall first withdraw monies from the 2005A Bonds DSRF Account, the Series 2007A Bonds DSRF Account and the 2012A Bonds DSRF Account, respectively, to restore a deficiency in each of the interest and principal subaccounts established in the Debt Service Fund for the Series 2005A Bonds, the Series 2007A Bonds and the Series 2012A Bonds, respectively, and, thereafter, to the extent necessary or required, from the other accounts and unallocated funds in the Debt Service Reserve Fund on a *pro rata* basis net of funds withdrawn from the Specific Series Only Accounts.

In lieu of the deposit of monies into the Debt Service Reserve Fund, the Commission may cause to be provided a surety bond, an insurance policy, a letter of credit or similar financial instrument satisfactory to the Rating Agency (as evidenced by a letter from the Rating Agency confirming that the DSRF Security will not result in the rating on any Outstanding Bonds being downgraded) (each, a “DSRF Security”) payable to the Trustee for the benefit of the Bondholders in an amount equal to the difference between the Debt Service Reserve Requirement and the amounts then on deposit in the Debt Service Reserve Fund.

The Series 2017 Bonds will be designated as Debt Service Reserve Fund Bonds; however, no Specific Series Only Account has been or will be created with respect to the Series 2017 Bonds. Funds deposited into the Debt Service Reserve Fund in connection with the issuance of the Series 2017 Bonds may be used for the purpose of paying interest on, maturing principal of and mandatory sinking fund redemption price of any Debt Service Reserve Fund Bonds whenever and to the extent that the monies held for the credit of the Debt Service Fund shall be insufficient for such purpose.

*Debt Service Reserve Requirement.* The Debt Service Reserve Requirement for all Outstanding Debt Service Reserve Fund Bonds, as of January 31, 2017, was \$15,630,456. The balance of cash and investments credited to the Debt Service Reserve Fund, as of January 31, 2017, was \$15,655,552. On the date of issuance of the Series 2017 Bonds, the Commission will deposit an amount sufficient, together with funds on deposit in the Debt Service Reserve Fund, to meet the Debt Service Reserve Requirement for all Outstanding Debt Service Reserve Fund Bonds on the date of issuance of the Series 2017 Bonds, which is an amount equal to the Maximum Annual Debt Service on all Outstanding Debt Service Reserve Fund Bonds.

### **Reserve Maintenance Fund**

In each Fiscal Year, after first having made the deposits provided by the Indenture, the Commission shall transfer from the Revenue Fund on or before the last Business Day of each month to the credit of the Reserve Maintenance Fund the amount shown in the Annual Capital Budget for the ensuing month.

Except as otherwise provided in the Indenture, or except in case of an emergency, as characterized in a certificate signed by a Commission Official stating that the monies to the credit of the Operating Account are insufficient to meet such emergency, monies in the Reserve Maintenance Fund shall be disbursed to pay current capital expenditures shown in the Annual Capital Budget for the System, plus the cost of unusual or extraordinary maintenance (as determined solely by the Commission) and shall be disbursed only for such purposes, except to the extent hereinafter provided. Such purposes shall include, but not be limited to, paying the cost of constructing, improving and reconstructing improvements and betterments to all parts of the System now or hereafter open to vehicular or pedestrian traffic, including, without limitation, additional lanes, tunnels, interchanges, toll plazas, bridges and connecting roads, transit interface facilities and any other improvements deemed necessary or desirable by the Commission. In making any such withdrawal, the Commission shall be deemed to be certifying that such withdrawal is authorized pursuant to the Indenture. See “SECURITY FOR THE SERIES 2017 BONDS – Debt Service Fund”, last paragraph, for the order of withdrawals from the Debt Service Reserve Fund, the General Reserve Fund and the Reserve Maintenance Fund upon a deficiency in the Debt Service Fund.

The Commission may transfer any monies from the Reserve Maintenance Fund to the credit of the General Reserve Fund from time to time if a Commission Official determines that the amount so to be transferred is not required for the purposes for which the Reserve Maintenance Fund has been created and the transfer is in accordance with the Annual Capital Budget as then in effect.

The balance of cash and investments on deposit in the Reserve Maintenance Fund, as of January 31, 2017, was \$3,774,127.

### **General Reserve Fund**

After first having made the deposits required under the Indenture to the Operating Account, the Debt Service Fund, the Debt Service Reserve Fund and the Reserve Maintenance Fund, if applicable, and while any Bonds are outstanding, the Commission is required to transfer from the Revenue Fund on or before the last Business Day of each Fiscal Year (or more frequently if desired) to the credit of the General Reserve Fund any funds which a Commission Official determines to be in excess of the amount required to be reserved therein for future transfers to the Debt Service Fund. Monies in the General Reserve Fund may be expended by the Commission to restore deficiencies in any funds or accounts created under the Indenture, and, absent any such deficiency, for any of the following purposes, with no one item having priority over any of the others: to purchase or redeem Bonds; to secure and pay the

principal or redemption price of and interest on any Subordinated Indebtedness; to make payments into the Construction Fund; to fund improvements, extensions and replacements of the System; as a self-insurance reserve; or to further any corporate purpose. The Commission is authorized to apply monies on deposit in the General Reserve Fund for any of the foregoing purposes. See “SECURITY FOR THE SERIES 2017 BONDS – Debt Service Fund”, last paragraph, for the order of withdrawals from the Debt Service Reserve Fund, the General Reserve Fund and the Reserve Maintenance Fund upon a deficiency in the Debt Service Fund.

For a discussion of the balance on account in the General Reserve Fund, see “RESULTS OF OPERATIONS AND ADDITIONAL COMMISSION INFORMATION – General Reserve Fund Balances”. For a discussion of the Commission’s policy regarding the balance to be maintained in the General Reserve Fund, see “RESULTS OF OPERATIONS AND ADDITIONAL COMMISSION INFORMATION – Board Policies”.

### **Limitations on Additional Indebtedness**

The Indenture provides that the Commission will not issue or incur any other Indebtedness having a parity lien on the Trust Estate except for Additional Bonds and other Parity Obligations, which include obligations of the Commission to the provider of any Credit Facility or to the counterparty on any Approved Swap Agreement constituting a Parity Swap Agreement. As provided in the Indenture, payments to be made and received by the Commission under an Approved Swap Agreement are taken into account in any calculation of Annual Debt Service.

Prior to issuing any Additional Bonds, the Commission must satisfy certain requirements of the Indenture, and must identify the Additional Bonds as Short-Term Indebtedness, Long-Term Indebtedness or Subordinated Indebtedness and demonstrate that it meets the related requirements set forth below. Prior to entering into any Approved Swap Agreement, the Commission must deliver one of the certificates or reports described below under “Long-Term Indebtedness,” which takes into account the expected payments by and to the Commission pursuant to such Approved Swap Agreement in calculating Annual Debt Service. See APPENDIX C – “DEFINITIONS OF CERTAIN TERMS AND SUMMARY OF CERTAIN PROVISIONS OF THE INDENTURE.”

*Short-Term Indebtedness.* The Commission covenants in the Indenture that it will not issue any Additional Bonds constituting Short-Term Indebtedness unless (1) immediately after the incurrence of such Short-Term Indebtedness, the outstanding principal amount of all Short-Term Indebtedness issued pursuant to the Indenture does not exceed 30% of the Revenues for the most recent Fiscal Year for which audited financial statements are available, and (2) for a period of not fewer than seven consecutive days within each Fiscal Year, commencing with the Fiscal Year following the issuance of such Short-Term Indebtedness, the aggregate principal amount of all outstanding Short-Term Indebtedness issued pursuant to the Indenture is reduced to less than 5% of the Revenues for the immediately preceding Fiscal Year for which audited financial statements are available.

*Long-Term Indebtedness.* Prior to issuing any Additional Bonds constituting Long-Term Indebtedness or entering into any Approved Swap Agreement, the Commission must deliver one of the following:

1. a certificate of a Commission Official certifying that the Historical Pro Forma Debt Service Coverage Ratio for the most recent Fiscal Year preceding the delivery of such certificate for which audited financial statements are available was not less than 1.50; or

2. a report of a Consultant to the effect that (i) the Net Revenues of the Commission during the preceding Fiscal Year were at least 130% of the Maximum Annual Debt Service on all Applicable Long-Term Indebtedness then Outstanding and on any Applicable Long-Term Indebtedness proposed to be issued (which report may assume any revisions of the Tolls which have been approved by the Commission subsequent to the beginning of such Fiscal Year were in effect for the entire Fiscal Year), and (ii) the Projected Debt Service Coverage Ratio is not less than 1.30; or

3. if the Long-Term Indebtedness is being incurred solely for the purposes of refunding, repurchasing or refinancing (whether in advance or otherwise) any outstanding Long-Term Indebtedness, a certificate of a Commission Official certifying the Maximum Annual Debt Service on all Applicable Long-Term Indebtedness prior to the issuance of the proposed Long-Term Indebtedness is greater than the Maximum Annual Debt Service on all Applicable Long-Term Indebtedness after the issuance of such proposed Long-Term Indebtedness.

*Subordinated Indebtedness.* Subordinated Indebtedness is subordinated and junior in all respects to payment of all Bonds and other Parity Obligations, and is payable as to principal and interest from amounts on deposit to the credit of the General Reserve Fund once all other payments have been made under the Indenture. The Commission may incur Subordinated Indebtedness without limit, so long as prior to or contemporaneously with such incurrence it delivers a certificate of a Commission Official certifying that the Rate Covenant would have been met during the preceding Fiscal Year taking into account the Maximum Annual Debt Service on such Subordinated Indebtedness.

### **Rate Covenant**

The Commission agrees in the Indenture that at all times it will establish and maintain a schedule of Tolls for vehicular traffic over the System, and will collect Tolls, so that the Net Revenues in each Fiscal Year will at all times be sufficient to provide funds at least equal to the sum of the following three amounts (the "Rate Covenant"):

1. the greater of
  - a. 130% of the Annual Debt Service for such Fiscal Year on account of all Applicable Long-Term Indebtedness then outstanding under the provisions of the Indenture ("Applicable Long-Term Indebtedness" includes Bonds, obligations to repay amounts drawn under a Credit Facility together with interest thereon, and obligations under Approved Swap Agreements, to the extent the same constitute Long-Term Indebtedness), or
  - b. 100% of the Maximum Annual Debt Service on all Applicable Long-Term Indebtedness, plus (i) the amount of required transfers from the Revenue Fund to the credit of the Reserve Maintenance Fund pursuant to the Annual Capital Budget, and (ii) an amount sufficient to restore any deficiency in the Debt Service Reserve Fund within an 18-month period; plus
2. the amount of any Short-Term Indebtedness issued on a parity with Outstanding Bonds; plus
3. the amount of Net Revenues in excess of the sum of the amounts set forth in clauses (1) and (2), together with Other Revenues pledged to the payment of Subordinated Indebtedness, sufficient to pay the Annual Debt Service for any Subordinated Indebtedness.



The Commission's failure to meet the Rate Covenant will not constitute an Event of Default under the Indenture if no default occurs in debt service payments as a result of such failure and, promptly after determining that the Rate Covenant was not met, the Commission retains a Consultant to make recommendations as to revisions to the Toll schedules necessary or appropriate to meet the Rate Covenant. If the Commission complies with the recommendations of the Consultant in respect of Tolls, it will not constitute an Event of Default under the Indenture if the Commission fails to meet the Rate Covenant during the succeeding Fiscal Year as long as no default occurs in debt service payments. If the Commission does not comply with the recommendations of the Consultant in respect of Tolls, the Trustee may, and at the request of the holders of not less than 25% in principal amount of the Bonds then Outstanding and upon being indemnified to its satisfaction the Trustee shall, institute and prosecute any appropriate action to compel the Commission to revise the Toll schedules.

In the event that the Consultant fails to file recommendations with the Commission within 60 days after being retained, the Trustee may designate and appoint a different Consultant to make recommendations as to an adjustment of the Toll schedules. Such Consultant's recommendations shall be reported to the Commission and the Trustee within 60 days after its appointment, and shall for all purposes be considered to be the equivalent of and substitute for the recommendations of the Consultant retained by the Commission.

### **Covenants as to Toll Classification**

The Commission agrees in the Indenture that Tolls on its toll bridges will be classified in a reasonable way to cover all traffic, so that the Tolls may be uniform in application to all traffic falling within any reasonable class regardless of the status or character of any Person participating in the traffic. The Commission also agrees that it will not grant free passage or reduced Tolls within a class, except in the limited manner permitted by the Indenture. Any change in classification that results in a reduced Toll or a new classification, and any reduced Toll or grant of free passage must be reviewed by a Consultant before it is implemented, and if the Commission did not meet the Rate Covenant for the preceding Fiscal Year, the same must be approved by a Consultant before being implemented by the Commission. In all events, the Commission agrees that it will not make a change in classification or a new classification, reduce Tolls or grant free passage, if to do so would cause the Commission to fail to meet the Rate Covenant.

As provided in the Indenture, the Commission's covenant as to classification of Tolls does not restrict its right, in its discretion in connection with its management of the System, to establish and maintain flexible Toll schedules including, but not limited to, provisions for utilizing or otherwise taking into account peak and nonpeak pricing, introductory pricing, weight, method of payment, frequency, carpooling, electronic and other Toll collection technologies, traffic management systems, and similar classifications, and the Commission's covenant as to uniformity of Tolls does not require that Tolls for any given class of traffic be identical in amount throughout the entire System. The Commission may fix and place in effect schedules of Tolls for any given class of traffic wherein the Tolls charged for passage over one bridge are different from the Tolls charged for passage over another bridge.

### **Agreements with Other Toll Facilities**

To the extent authorized by law, the Commission may enter into agreements with any commission, authority or other similar legal body operating one or more toll road, bridge or tunnel facilities, whether or not connected to the System, (a) with respect to the establishment of combined schedules of Tolls and/or (b) for the collection and application of Tolls charged for passage over all or a portion of the System and/or trips over such other toll facilities, which on the basis of the revenues to be received by any such agreement will result in the Commission receiving its allocable portion of such Tolls

(less fees and expenses associated with such arrangement). The Commission also may enter into agreements with other Persons with respect to the collection of Tolls or advances or prepayment of Tolls charged for passage over all or a portion of the System, which on the basis of the revenues to be received by any such agreement will result in the Commission receiving the appropriate Tolls for such passage. Unless approved by a Consultant, no agreement establishing a combined schedule of Tolls may restrict the ability of the Commission to implement an increase in its Tolls at least annually.

Amounts received by the Commission from any such other commission, authority or body in accordance with such agreements may be held with a Depositary until they constitute Revenues, when they are required to be deposited in the Revenue Fund. The Indenture permits amounts received and deposited in the Revenue Fund which are payable by the Commission to any such other commission, authority or body in accordance with any such agreements, to be withdrawn from the Revenue Fund and paid by the Commission in accordance with such agreements.

### **Covenants of State of New Jersey and Commonwealth of Pennsylvania with Bondholders**

The State of New Jersey and the Commonwealth of Pennsylvania covenant and agree in the Compact with each other and with the holders of any bonds or other obligations of the Commission for which tolls, rents, rates or other revenues have been pledged, that (i) so long as any of said bonds or obligations remain outstanding and unpaid (unless adequate provision is otherwise made by law for the protection of those advancing monies upon such bonds or obligations), the Commonwealth of Pennsylvania and the State of New Jersey will not diminish or impair the power of the Commission to own, operate and control bridge facilities or to establish, levy and collect tolls, rents, rates and other charges in connection therewith, and (ii) the Commonwealth of Pennsylvania and the State of New Jersey will not authorize or permit the construction, operation and maintenance of any additional bridge or tunnel for the transportation of passengers by vehicles over the Delaware River by any person or body other than the Commission, within a distance of ten miles in either direction from any such toll bridge, measured along the boundary line between Pennsylvania and New Jersey. The Pennsylvania Turnpike Commission and the New Jersey Turnpike Authority are permitted to provide for the financing, construction, operation and maintenance of one bridge across the Delaware River south of the City of Trenton in the State of New Jersey, provided that such bridge must not be constructed within ten miles of the Trenton-Morrisville Toll Bridge. See information regarding Non-Commission Bridges, included under the caption “THE BRIDGE SYSTEM – Non-Commission Bridges” herein.

## **COMMISSION INDEBTEDNESS AND OTHER PARITY OBLIGATIONS**

### **Parity Indebtedness**

*Parity Obligations.* The Series 2017 Bonds will rank on a parity with all other Outstanding Bonds (except as otherwise provided in the Indenture with respect to Debt Service Reserve Fund Bonds), all Parity Swap Obligations (which are not secured by the Debt Service Reserve Fund) and other obligations of the Commission owed to Secured Owners, but excluding Subordinated Indebtedness (collectively, the “Parity Obligations”) with respect to the Commission’s pledge of the Trust Estate. As a result, a payment default or other default by the Commission with respect to any Parity Obligation will constitute a default under the Indenture with respect to all Parity Obligations, including the Series 2017 Bonds. The Outstanding Bonds, together with the Parity Swap Obligations, as defined and discussed below, constitute all Parity Obligations of the Commission as of the date of this Official Statement. Set forth on Table 1 is a list of all Outstanding Bonds. The Commission currently has no Outstanding Subordinated Indebtedness.

**Table 1**  
**Outstanding Parity Bonds as of December 31, 2016**

<u>Series</u>	<u>Outstanding Principal Amount</u>	<u>Fixed/Variable Rate</u>	<u>Final Maturity</u>	<u>Designated as Debt Service Reserve Fund Bonds</u>
2005A	\$18,880,000	Fixed	07/01/2020	Yes*
2007A	2,000,000	Fixed	07/01/2017	Yes*
2007B-1	57,025,000	Variable (SIFMA Index)	07/01/2032	No
2007B-2	57,025,000	Variable (SIFMA Index)	07/01/2032	No
2012A	70,470,000	Fixed	07/01/2030	Yes*
2012B	7,050,000	Fixed	07/01/2018	No
2015	<u>86,505,000</u>	Fixed	07/01/2036	Yes
TOTAL	<u>\$298,955,000</u>			

\*The Commission created separate Specific Series Only Accounts in the Debt Service Reserve Fund pledged only to the payment of these specific series of Bonds. See “SECURITY FOR THE SERIES 2017 BONDS - Debt Service Reserve Fund” herein.

*Description of Series 2007B-1 Bonds and Series 2007B-2 Bonds.* The Series 2007B-1 Bonds and the Series 2007B-2 Bonds are multi-modal bonds presently in the SIFMA Index Rate Mode held by Wells Fargo Bank, National Association and Wells Fargo Municipal Capital Strategies, LLC, respectively. The Series 2007B-1 Bonds and the Series 2007B-2 Bonds both currently bear interest at the SIFMA Index Rate plus a fixed spread, and are not supported by a credit or liquidity facility. The Series 2007B-1 Bonds and the Series 2007B-2 Bonds are subject to special mandatory purchase on May 1, 2017 (the “Series 2007B Mandatory Purchase Date”). The purchase price of the Series 2007B-1 Bonds and the Series 2007B-2 Bonds on or prior to such special mandatory purchase date is payable by the Commission, unless the Series 2007B-1 Bonds and Series 2007B-2 Bonds are remarketed by the Commission. The Commission expects to remarket the Series 2007B-1 Bonds and the Series 2007B-2 Bonds prior to the Series 2007B Mandatory Purchase Date.

In the event the Commission has not successfully remarketed the Series 2007B-1 Bonds and the Series 2007B-2 Bonds prior to the Series 2007B Mandatory Purchase Date, an event of default will not occur. From the Series 2007B Mandatory Purchase Date, the interest rate on the Series 2007B-1 Bonds and the Series 2007B-2 Bonds will convert to a fluctuating rate of interest equal to the greater of: (i) the Prime Rate plus one percent; (ii) the Federal Funds Rate plus two percent; and (iii) eight percent. In addition, the Commission would be required to repay, commencing on the Series 2007B Mandatory Purchase Date, the principal amount of the Series 2007B-1 Bonds and Series 2007 B-2 Bonds in equal semi-annual installments over three years following the Series 2007B Mandatory Purchase Date.

*Subordinated Indebtedness.* As of the date of this Official Statement, there is no Subordinated Indebtedness Outstanding. See APPENDIX C – “DEFINITIONS OF CERTAIN TERMS AND SUMMARY OF CERTAIN PROVISIONS OF THE INDENTURE.”

## Commission Payment Obligations under Parity Swap Agreements

*Series 2007B Swap Agreements.* The Commission entered into two separate Interest Rate Swap Agreements with separate counterparties, which hedge the interest rate on the Series 2007B Bonds (collectively, the “Series 2007B Swap Agreements”). The Series 2007B Swap Agreements constitute Parity Swap Agreements under the Indenture. The Commission does not currently have any other outstanding Parity Swap Agreements. A summary of the Series 2007B Swap Agreements is set forth below:

<u>Related Bond Series:</u>	Series 2007B-1	Series 2007B-2
<u>Initial Notional Amount:</u>	\$75,000,000	\$75,000,000
<u>Current Notional Amount:</u>	\$57,035,000	\$57,035,000
<u>Termination Date:</u>	July 1, 2032	July 1, 2032
<u>Product:</u>	Fixed Payer Swap	Fixed Payer Swap
<u>Rate Paid by the Commission:</u>	4.231%	4.231%
<u>Rate Paid by Counterparty:</u>	SIFMA	SIFMA
<u>Counterparty:</u>	Merrill Lynch Capital Services, Inc.	Morgan Stanley Capital Services, Inc.
<u>Fair Value<sup>(1)</sup>:</u>	(\$10,621,006)	(\$10,621,006)
<u>Additional Termination Event:</u>	<u>For Counterparty:</u> Rating change below BBB or Baa2	<u>For Counterparty:</u> Rating change below BBB or Baa2
	<u>For Commission:</u> Rating change below BBB- or Baa3 upon insurer event (Includes insurer <sup>(2)</sup> being rated below A- or A3)	<u>For Commission:</u> Rating change below BBB- or Baa3 upon insurer event (Includes insurer <sup>(2)</sup> being rated below A- or A3)

<sup>(1)</sup> Fair value as of December 31, 2016; calculated by the Commission’s general financial advisor, NW Financial Group, LLC.

<sup>(2)</sup> See below for a discussion of the swap insurer.

The Series 2007B Swap Agreements will terminate on July 1, 2032, unless terminated sooner in accordance with their respective terms. Additionally, the Commission has the option to terminate all or part of the Series 2007B Swap Agreements at any time. In the event that the Series 2007B Swap Agreements terminate prior to their stated termination dates (including any optional termination by the Commission), either the Commission or the applicable Counterparties or Counterparty may be required to make a termination payment to the other party. The party required to make such payment and the amount thereof will be determined by market conditions at the time of such early termination. No financial or other information has been authorized to be provided herein with respect to any Counterparty. There can be no assurance that either Counterparty will pay or perform its obligations under its respective Series 2007B Swap Agreement in accordance with the terms thereof, or that such Counterparty will be able to pay any termination payment which it may be required to pay upon the occurrence of certain events of default or termination events under its respective Series 2007B Swap Agreement.

The floating interest rate payable to the Commission by each Counterparty under each Series 2007B Swap Agreement may differ from the floating interest rates payable by the Commission under the Series 2007B Bonds. There can be no assurance that the floating amounts received by the Commission under the Series 2007B Swap Agreements in any period will be sufficient to pay the interest accruing on the Series 2007B Bonds during such period.

The Commission’s obligation to make regularly scheduled payments and termination payments under the Series 2007B Swap Agreements are secured by the pledge under the Indenture, and are payable from amounts deposited in the Debt Service Fund equally and ratably, and on parity with, the payment of principal of and interest on the other Parity Obligations. The Commission’s regularly scheduled payments, but not its termination payments, are insured by National Public Finance Guarantee

Corporation (“National”). Notwithstanding the foregoing insurance, a failure by the Commission to make a regularly scheduled payment under either Series 2007B Swap Agreement would constitute an event of default under the applicable Series 2007B Swap Agreement.

Based upon the current ratings of the applicable Series 2007B-1 Bonds and Series 2007B-2 Bonds, the Commission is currently not required to post collateral under the Series 2007B Swap Agreements. The Commission may be required to post collateral if the long-term rating on the Commission’s Bonds falls below “Baa2” from Moody’s or below “BBB” from S&P.

Each of the Series 2007B Swap Agreements provides that an automatic, immediate termination of such Agreement shall take place upon the occurrence of the dissolution, bankruptcy, insolvency, liquidation or any similar related events involving or related to the Commission’s Counterparty under such Agreement. If a Series 2007B Swap Agreement is automatically and immediately terminated as a result of any such event and the fair value of such Series 2007B Swap Agreement is negative to the Commission, on the date of such automatic immediate termination, the Commission could be obligated to make a substantial termination payment to the Counterparty.

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## DEBT SERVICE SCHEDULE

The following table sets forth for each Fiscal Year ending December 31 the total debt service requirements of the Commission's Outstanding Bonds after the issuance of the Series 2017 Bonds.

Fiscal Year Ending December 31	Outstanding Debt Service <sup>(1)</sup>	Series 2017 Bonds			Aggregate Outstanding Debt Service <sup>(1)</sup>
		Principal	Interest	Net Debt Service <sup>(2)</sup>	
2017	\$29,252,948	--	\$6,892,333	\$6,892,333	\$36,145,281
2018	27,223,328	--	20,676,999	9,407,832	36,631,160
2019	25,935,500	--	20,676,999	14,718,655	40,654,154
2020	25,914,085	\$945,000	20,676,999	21,621,999	47,536,084
2021	26,034,459	875,000	20,663,769	21,538,769	47,573,228
2022	26,073,764	1,740,000	20,649,550	22,389,550	48,463,314
2023	26,037,952	1,865,000	20,562,550	22,427,550	48,465,502
2024	25,997,471	1,970,000	20,469,300	22,439,300	48,436,771
2025	25,951,463	1,070,000	20,370,800	21,440,800	47,392,263
2026	25,925,047	--	20,338,700	20,338,700	46,263,747
2027	25,906,337	20,000	20,338,700	20,358,700	46,265,037
2028	25,891,119	35,000	20,337,900	20,372,900	46,264,019
2029	17,548,702	8,380,000	20,336,500	28,716,500	46,265,202
2030	17,499,621	8,845,000	19,917,500	28,762,500	46,262,121
2031	16,022,880	10,765,000	19,475,250	30,240,250	46,263,130
2032	12,591,932	14,735,000	18,937,000	33,672,000	46,263,932
2033	12,350,100	15,715,000	18,200,250	33,915,250	46,265,350
2034	12,351,300	16,500,000	17,414,500	33,914,500	46,265,800
2035	12,350,500	17,325,000	16,589,500	33,914,500	46,265,000
2036	12,352,100	18,190,000	15,723,250	33,913,250	46,265,350
2037	--	22,015,000	14,813,750	36,828,750	36,828,750
2038	--	23,115,000	13,713,000	36,828,000	36,828,000
2039	--	24,270,000	12,557,250	36,827,250	36,827,250
2040	--	25,485,000	11,343,750	36,828,750	36,828,750
2041	--	26,760,000	10,069,500	36,829,500	36,829,500
2042	--	28,100,000	8,731,500	36,831,500	36,831,500
2043	--	29,505,000	7,326,500	36,831,500	36,831,500
2044	--	30,845,000	5,987,000	36,832,000	36,832,000
2045	--	32,240,000	4,587,300	36,827,300	36,827,300
2046	--	33,705,000	3,124,950	36,829,950	36,829,950
2047	--	35,235,000	1,596,850	36,831,850	36,831,850
<b>TOTAL</b>	<b>\$429,210,608</b>	<b>\$430,250,000</b>	<b>\$473,099,699</b>	<b>\$886,122,188</b>	<b>\$1,315,332,795</b>

<sup>(1)</sup> Interest on the Series 2007B Bonds is calculated at a fixed swap rate of 4.231% plus 60 basis points, which represents the spread between the variable swap rate and the variable bond interest rate in effect as of the date of this Official Statement. See "COMMISSION INDEBTEDNESS AND OTHER PARITY OBLIGATIONS – Parity Indebtedness – *Description of Series 2007B-1 Bonds and Series 2007B-2 Bonds*" and "– Commission Payment Obligations Under Parity Swap Agreements."

<sup>(2)</sup> Net of capitalized interest.

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## DELAWARE RIVER JOINT TOLL BRIDGE COMMISSION

### Creation and History of the Commission

The Commission is the successor to the former Joint Commission for the Acquisition of Various Bridges over the Delaware River between the Commonwealth of Pennsylvania and the State of New Jersey. The Commission came into being by reason of a 1912 New Jersey statute (L. 1912, c. 297, p. 527) and 1913 Pennsylvania legislation. The Commission acquired bridges from private owners, freed the bridges from tolls and, up until July 1, 1987, maintained and operated the toll-supported bridges with public funds provided by the two states.

In 1984, the Commission, the State of New Jersey and the Commonwealth of Pennsylvania entered into an agreement (the “1984 Agreement”), wherein the parties agreed, among other things, that the Commission assume the full financial responsibility for the cost of operation and maintenance of the toll-supported bridges within its jurisdiction and control.

In addition, the 1984 Agreement provided that the parties thereto agree that the I-78 Toll Bridge shall be operated and maintained by the Commission as a toll bridge and that the Commission would be responsible for the non-federal share of the I-78 Toll Bridge project.

The Commission has never defaulted in the payment of the principal of or interest or premium on any of its obligations.

### Members of the Commission

The Commission is composed of ten members, five from Pennsylvania and five from New Jersey. The Pennsylvania members are citizens who are appointed by and serve at the pleasure of the Governor of the Commonwealth of Pennsylvania. The New Jersey members are citizens who are appointed by the Governor of the State of New Jersey with the consent of the State Senate for three-year terms. No action of the Commission is binding unless a majority of the members of the Commission from Pennsylvania and a majority of the members of the Commission from New Jersey vote in favor of it.

The current members and officers of the Commission are as follows:

***New Jersey Members:***  
Michael B. Lavery, *Chairman*  
Lori Ciesla  
Yuki Moore Laurenti  
Garret Leonard Van Vliet  
Geoffrey S. Stanley

***Pennsylvania Members:***  
Wadud Ahmad, *Vice Chairman*  
Daniel H. Grace  
Vacant  
Pam Janvey  
John Siptroth

### Staff

Joseph J. Resta is Executive Director of the Commission, James M. Petrino is Chief Financial Officer, Arnold J. Conoline, Jr., is Chief Administrative Officer, Sean M. Hill is Deputy Executive Director of Operations, Joseph F. Donnelly, Jr. is Deputy Executive Director of Communications, Roy W. Little is Chief Engineer, Kevin M. Skeels is Assistant Chief Engineer and Stephen Cathcart is Comptroller of the Commission. Brief biographies of the management staff of the Commission follow.

*Joseph J. Resta, Executive Director.* Joseph J. Resta became the Commission’s Executive Director in February 2013. The agency’s top administrator, he manages a \$53 million annual operating

budget and administers a full-time staff of roughly 350 employees. Mr. Resta also oversees the Commission's continuing capital improvement program for the agency's 20 river crossings and related transportation facilities. Mr. Resta has more than 20 years of private and public-sector experience in capital project management, strategic planning, and governmental administration. He previously served as Project Executive for the \$786 million Pennsylvania Convention Center Expansion Project in Philadelphia, Pennsylvania - the largest single public works project ever undertaken by the Commonwealth of Pennsylvania. Mr. Resta also is a former Deputy Secretary for Public Works in Pennsylvania's Department of General Services, where his administrative functions included professional selections, design, project management, and construction management of over 400 public works projects worth approximately \$1.5 billion. Mr. Resta holds a Bachelor of Arts degree from Temple University, where he graduated cum laude. He has served as a member on the Pennsylvania Department of Transportation's Consultant Selection Committee and Pennsylvania's State Registration Board for Professional Engineers, Land Surveyors, and Geologists.

*James M. Petrino, Chief Financial Officer.* James M. Petrino was appointed as the Commission's Chief Financial Officer in April 2016. He is responsible for overseeing the Commission's financial operations, treasury investment and debt management functions. Mr. Petrino previously spent over 30 years employed by the State of New Jersey, including 22 years in the Office of Public Finance in the New Jersey Department of the Treasury. He served as Director of Public Finance from 2009-2016. In that position, he oversaw the debt management and capital finance functions for the State and many of its bond-issuing authorities, with an aggregate debt portfolio of over \$30 billion. Mr. Petrino also managed New Jersey's annual short-term cash flow borrowing program from 1997-2016. He began his public service career as a municipal finance auditor in the New Jersey Department of Community Affairs. Mr. Petrino holds a Master of Business Administration degree from Rutgers University and a Bachelor of Science in Business Administration degree from the University of Delaware.

*Arnold J. Conoline, Jr., Chief Administrative Officer.* Arnold J. Conoline, Jr. became the Commission's Chief Administrative Officer in February 2008. In that capacity, he oversees the Commission's human resources, E-ZPass and purchasing departments. He also manages insurance-related matters. Mr. Conoline joined the Commission after serving as executive vice president for sales and marketing for the Lomax Companies, a private equity firm based in Chalfont, Pennsylvania. Prior to Lomax, he worked for twenty-three years in law enforcement, serving as Sgt. Deputy Sheriff for Bucks County, Pennsylvania, and chief of police in Falls Township, Pennsylvania. He has a Bachelor of Science degree in Criminal Justice from Trenton State College (now The College of New Jersey), in Ewing, New Jersey, and an Associate of Arts degree from Bucks County Community College in Newtown, Pennsylvania.

*Sean M. Hill, Deputy Executive Director of Operations.* Sean M. Hill was appointed as the Commission's Deputy Executive Director of Operations in May 2013 and is responsible for overseeing the operation and maintenance of the Commission's twenty main-river bridges, 34 approach structures, and corresponding approach roadways, access ramps and support facilities such as toll plazas and administrative buildings. Mr. Hill also has administrative charge over a variety of departments, including: Electronic Security and Surveillance; Information Technology; Plants and Facilities; Security, Safety and Training; and the Commission's three geographic operating districts. Mr. Hill previously spent 19 years with the New Jersey Turnpike Authority with the last 5 as Director of Operations for the New Jersey Turnpike and the Garden State Parkway. Mr. Hill's previous experience also includes Professional and Management positions with the New Jersey Department of Transportation and the Atlantic County Department of Public Works. Mr. Hill holds New Jersey licenses as a professional engineer and a professional planner. He is also past president of a local chapter of the National Society of Professional Engineers and is a member of the American Society of Highway Engineers and the



American Society of Civil Engineers. He is a 1984 graduate of Drexel University, where he earned a bachelor of science in civil engineering.

*Joseph F. Donnelly, Jr., Deputy Executive Director of Communications.* Joseph F. Donnelly, Jr. was named the Commission's Deputy Executive Director of Communications in January 2008. He is responsible for communications with the media and public regarding Commission activities. He also oversees the Commission's community affairs department. He previously served 15 years as a communications manager with the New Jersey State Legislature, most recently as Associate Executive Director for Communications at the Assembly Majority Office. Prior to his state employment, he worked 13 years as a reporter for The Record of Hackensack, New Jersey. He holds a Bachelor of Arts degree from the University of New Mexico.

*Roy W. Little, Chief Engineer.* Roy W. Little was appointed Senior Program Manager for System Preservation and Enhancement for the Commission in July 2005. He was promoted to the position of Assistant Chief Engineer in May 2008, and then to Chief Engineer in November 2013. As Chief Engineer, he serves as the engineering department manager and oversees the Commission's bridge inspection and rehabilitation program. Mr. Little is a licensed Professional Engineer and licensed Professional Planner in the State of New Jersey. He previously spent 15 years with the New Jersey Highway Authority where he held the positions of Senior Structural Engineer and Project Development Manager managing the Authority's \$500 million Capital Improvement Program. Mr. Little has spent a good part of his career with national consulting engineering firms in the role of Vice President and Regional Office Manager. He holds a Bachelor of Science degree in Civil Engineering from Rutgers University and completed extensive post-graduate studies at the Rutgers Graduate School of Management. Mr. Little is a member of the Rowan University School of Engineering Industry Advisory Board and the American Society of Highway Engineers.

*Kevin M. Skeels, Assistant Chief Engineer.* Kevin Skeels is the Assistant Chief Engineer for the Commission. In this role, he supervises and/or performs engineering associated with the design, construction and maintenance of bridges, highways and buildings and assists the Chief Engineer in the development and implementation of the Commission's Capital Program to preserve, protect, manage and enhance the Commission's asset base. He has over 28 years of experience in highway and bridge design and the construction industry, which includes previous employment at major national consulting engineering firms servicing both public and private sector clients in the planning, design and construction management of bridges, tunnels, highways, railroad and buildings infrastructure. He holds an A.A.S. from Westchester Community College, and a B.S.C.E. from Northeastern University. Mr. Skeels is a Registered Professional Engineer, a member of the Civil Engineering Honor Society Chi Epsilon and a member of the American Society of Civil Engineers.

*Stephen Cathcart, Comptroller.* Stephen Cathcart is Comptroller of the Commission, having been appointed to that post in March 2001. He oversees the accounting, accounts payable, payroll and funds management functions. His previous financial management experience includes serving as Controller of the Central Jersey Bank and Trust Company and TRW ISCS, a software consulting organization. A resident of Bucks County, Pennsylvania, he holds a Bachelor of Arts degree in Accounting from Temple University and is a licensed Certified Public Accountant in the State of New Jersey.

## **Powers of the Commission**

Pursuant to the Compact, the Commission has the power, among other things, (a) to acquire, construct, rehabilitate, improve, maintain, repair and operate bridges for vehicular or pedestrian traffic across the Delaware River between the Commonwealth of Pennsylvania and the State of New Jersey from

the Philadelphia, Bucks County line to the New York State line, a distance of approximately 139 miles; (b) to combine for financing purposes any two or more bridges; (c) subject to any applicable law, to fix, charge and collect tolls for use of any bridge to provide funds sufficient to pay the reasonable costs of maintaining, repairing and operating the bridges, paying principal of and interest on the Commission's revenue bonds and other obligations and to provide reserves for such purposes; (d) to investigate the necessity for additional bridge connections over the Delaware River, making such studies, surveys and estimates as may be necessary to determine the feasibility and cost of such additional bridge connections; (e) to prepare plans and specifications for, and locate, acquire, construct, administer, operate and maintain, such additional bridges over the Delaware River within its jurisdiction and to issue such bonds and obligations to provide monies sufficient for the acquisition or construction of such bridges, to collect tolls, rentals and other charges for the redemption of such bonds and obligations, and the payment of interest thereon; (f) to investigate the necessity for additional port and terminal facilities in a certain area and to acquire, construct, administer, operate and maintain such facilities within such area as the Commission deems necessary to advance the interests of the two states, and to issue bonds or other obligations to acquire or construct such facilities, and to collect fees, rentals, tolls and other charges for the payment of such bonds and other obligations and for the operation, administration and maintenance of such facilities; (g) to lease bridges as lessor to, and contract for the operation of, such bridges by one or more public bodies, instrumentalities, commissions, or public agencies; (h) with the written consent of the Governor of the State of New Jersey and the Governor of the Commonwealth of Pennsylvania, to accept all right, title and interest in and to the Tacony-Palmyra Bridge, across the Delaware River at Palmyra, New Jersey, together with any approaches and interests in property necessary thereto; and (i) to replace any one or more existing bridges with one or more new bridges as the Commission may determine to be adequate and convenient for the traffic to be served thereby.

The Commission is authorized by the Compact to establish separate schedules of tolls, rates and charges for the use of any bridge on which tolls may be established under the Compact by residents of areas adjacent to or served directly by such bridge under such conditions and on such terms as the Commission shall determine to be proper and reasonable, including tolls, rates and charges for unlimited use of any such bridge.

The Commission's duties include the maintenance and operation of all the bridges over the Delaware River in its geographic jurisdiction, with the following exceptions: the New Jersey-Pennsylvania Turnpike Bridge and the Burlington-Bristol Toll Bridge, both south of Trenton, and the Dingman's Ferry Toll Bridge north of the Delaware Water Gap.

The Commonwealth of Pennsylvania and the State of New Jersey covenant in the Compact that so long as any bonds or other obligations of the Commission are outstanding and secured by tolls or other revenues, the two states will not diminish or impair the power of the Commission to own, operate and control bridge facilities or to establish, levy and collect tolls, rents, rates and other charges in connection therewith, nor will they authorize or permit the construction, operation and maintenance of any additional bridge or tunnel for vehicular travel over the Delaware River by any other person or body other than the Commission within a distance of ten miles of an existing Commission toll bridge.

The Commission does not have the power to levy taxes or assessments for benefits and has no power to pledge the credit of the Commonwealth of Pennsylvania or of the State of New Jersey or to create any debt against said Commonwealth or State or any municipality therein.

### **Federal Limitations on Commission Powers**

*23 U.S.C. Section 129.* A provision of federal law (23 U.S.C. Section 301) provides that, except as provided in 23 U.S.C. Section 129, all highways constructed with federal-aid funds shall be free from

tolls of all kinds. 23 U.S.C. Section 129 provides that, notwithstanding the provisions of 23 U.S.C. Section 301, federal-aid funds may be applied to a toll bridge and its approaches if the applicable state highway department or departments are a party to an agreement with the United States Secretary of Transportation, which agreement must provide that all tolls received from the operation of the bridge, less the costs of operating and maintaining such bridge, shall be applied to the repayment to the public authority of all costs of construction of such bridge except costs which were contributed by the United States; no tolls shall be charged for the use of such bridge after the public authority shall have been repaid; and that after the date of final repayment the bridge shall be maintained or operated as a free bridge. As set forth below, by statutorily authorized agreement Section 129 is no longer applicable to the Commission.

Pursuant to 23 U.S.C. Section 129, the Commission entered into an agreement on May 31, 1988, with the United States Department of Transportation, acting by and through the Federal Highway Administration, the Commonwealth of Pennsylvania, acting by and through the Secretary of the Pennsylvania Department of Transportation, and the State of New Jersey, acting by and through the Commissioner of the New Jersey Department of Transportation (the "Section 129 Agreement"). The Section 129 Agreement provides that all tolls received from the operation of the I-78 Toll Bridge and approaches, less the actual cost of such operation and maintenance, shall be applied to the repayment to Pennsylvania, New Jersey and the Commission, according to their respective contributions, of all of the costs of acquisition and construction of the I-78 Toll Bridge approaches, except that part which was contributed by the United States; that no tolls shall be charged for use of the I-78 Toll Bridge and approaches after Pennsylvania, New Jersey and the Commission shall have been repaid; that, after the date of final repayment, the I-78 Toll Bridge and approaches shall be maintained and operated as a free bridge; that no revenue bonds issued by the Commission will contain any provision which will prevent or preclude the Commission from carrying out the terms of the Section 129 Agreement, and that no pledge or use of revenues from the Commission's existing bridge facilities to secure bonds used to finance any part of the local share of the I-78 Toll Bridge will prevent or preclude the Commission from carrying out the terms of the Section 129 Agreement; that separate financial records shall be maintained by the Commission relating to the I-78 Toll Bridge; that Pennsylvania and New Jersey agree to audit jointly the Commission's records annually to assure compliance with the Section 129 Agreement and that any rate of toll on the I-78 Toll Bridge shall be just and reasonable to accommodate the purposes of the Section 129 Agreement under economical management.

*The 1991 Act.* The Intermodal Surface Transportation Efficiency Act of 1991 (the "1991 Act"), which was signed into law by the President of the United States on December 18, 1991, regulates various aspects of the surface transportation system. In general, the legislation was designed to give state and local officials greater flexibility in making decisions as to how their funds should be used. Section 1012 of the 1991 Act addresses toll roads, bridges and tunnels and changes the existing prohibition on federal funding of toll facilities.

Subsection (f) of Section 1012 of the 1991 Act generally permits tolls to be continued on the I-78 Toll Bridge and for excess toll revenues to be used, *inter alia*, with respect to other bridges under the Commission's jurisdiction. Subsection (f) of Section 1012 of the 1991 Act specifically provides for the voiding of the Section 129 Agreement by the Secretary of the U.S. Department of Transportation upon the request of the Commonwealth of Pennsylvania, the State of New Jersey and the Commission and their entering into a new agreement (the "1991 Act Agreement") permitting the continuation of tolls without repayment of federal funds and providing that revenues received from operation of the I-78 Toll Bridge will be used (i) first, as repayment of the non-federal costs of construction of the I-78 Toll Bridge, (ii) next, for the costs necessary for the proper operation and maintenance of the I-78 Toll Bridge, including resurfacing, restoration and rehabilitation, and (iii) then, to the extent that revenues exceed the amount necessary for (i) and (ii), the excess may be used with respect to any other bridge under the Commission's

jurisdiction. The 1991 Act Agreement was executed on April 9, 1992 by the Commonwealth of Pennsylvania, acting by and through the Pennsylvania Department of Transportation, and on April 9, 1992 by the State of New Jersey, acting by and through the Commissioner of the New Jersey Department of Transportation. The 1991 Act Agreement was executed by the United States Department of Transportation on April 20, 1992.

The Commission has not used any federal-aid funds to construct or improve any bridges other than the I-78 Toll Bridge and will not use any federal funds for construction of the New Scudder Falls Bridge. Thus, the acts referred to above only apply to the I-78 Toll Bridge.

*Federal Bridge Acts.* The Surface Transportation and Uniform Relocation Assistance Act of 1987 (33 U.S.C. Section 508) provides that tolls for passage over bridges constructed under the authority of the federal Bridge Act of 1906 or the federal General Bridge Act of 1946 be “just and reasonable.” The Commission believes that its tolls are just and reasonable. The federal Bridge Act of 1906 applies to all bridges constructed over navigable waters of the United States after March 23, 1906, and the General Bridge Act of 1946 applies to bridges over navigable waters of the United States the construction of which is approved after August 2, 1946. Prior to 1987, any person could initiate proceedings before the Federal Highway Administrator at any time for the purpose of examining whether or not tolls were just and reasonable. Since 1987 such proceedings can be initiated directly in the appropriate court, but it is currently unclear who is entitled to bring such an action. In 2006, the U.S. District Court for the Eastern District of Pennsylvania ruled that certain plaintiffs did not have a private right of action under 33 U.S.C. Section 508.

## **THE BRIDGE SYSTEM**

### **General**

The Indenture provides that the System includes all bridges and other vehicular traffic facilities owned or constructed and operated by the Commission. The Commission currently owns and operates seven toll bridges and thirteen toll-supported bridges, which are listed below in Table 2. The Commission collects tolls on all toll bridges only in the Pennsylvania-bound direction. Upon completion of the first span of the New Scudder Falls Bridge, the Commission will collect tolls via All Electronic Tolling for the New Scudder Falls Bridge in the southbound/westbound direction (New Jersey to Pennsylvania). The Commission will then receive revenues from eight toll bridges.

The Dingman’s Ferry Toll Bridge, the New Jersey-Pennsylvania Turnpike Bridge and the Burlington-Bristol Toll Bridge, which are discussed below under the caption “THE BRIDGE SYSTEM – Non-Commission Bridges,” are within the Commission’s geographic jurisdiction but are not owned or operated by the Commission and are not part of the System.

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**Table 2**  
**Commission Bridges**

The Commission currently maintains and operates the following bridges which cross the Delaware River within the geographic jurisdiction of the Commission.

<b><u>Bridge</u></b>	<b><u>Type</u></b>	<b><u>Year Built</u></b>	<b><u>Route</u></b>
Calhoun Street Bridge	Toll-Supported	1884	Local
Northampton Street Bridge	Toll-Supported	1894	Local
Riverton Belvidere Bridge	Toll-Supported	1904	Local
Riegelsville Bridge	Toll-Supported	1904	Local
New Hope-Lambertville Bridge	Toll-Supported	1904	Local
Washington Crossing Bridge	Toll-Supported	1904	Local
Centre Bridge-Stockton Bridge	Toll-Supported	1926	Local
Lower Trenton Bridge	Toll-Supported	1927	Local
Uhlerstown-Frenchtown Bridge	Toll-Supported	1931	Local
Upper Black Eddy-Milford Bridge	Toll-Supported	1933	Local
Easton-Phillipsburg Toll Bridge	Toll	1938	U.S. 22
Lumberville-Raven Rock Pedestrian Bridge	Toll-Supported	1947	Pedestrian
Trenton-Morrisville Toll Bridge	Toll	1952	U.S. 1
Milford-Montague Toll Bridge	Toll	1953	U.S. 206
Delaware Water Gap Toll Bridge	Toll	1953	I-80
Portland-Columbia Toll Bridge	Toll	1953	U.S. 46 and PA. 611
Portland-Columbia Pedestrian Bridge	Toll-Supported	1957	Pedestrian
Scudder Falls Bridge	Toll-Supported <sup>(1)</sup>	1959	I-95
New Hope-Lambertville Toll Bridge	Toll	1971	U.S. 202
I-78 Toll Bridge	Toll	1989	I-78

Source: The Commission

<sup>(1)</sup> The New Scudder Falls Bridge will be constructed and the Existing Scudder Falls Bridge will be demolished. Upon completion of the first span of the New Scudder Falls Bridge, the Commission will begin collecting tolls for use of such bridge.

## **The Toll Bridges**

The Commission currently owns and operates seven toll bridges which are briefly described below. The seven toll bridges and the thirteen toll-supported bridges are all maintained, repaired and operated from revenues derived from the tolls charged for the use of the seven toll bridges. The Commission collects tolls on all toll bridges only in the Pennsylvania-bound direction. Upon completion of the first span of the New Scudder Falls Bridge, the Commission will collect tolls via All Electronic Tolling for the New Scudder Falls Bridge in the southbound/westbound direction (New Jersey to Pennsylvania). The Commission will then receive revenues from eight toll bridges.

*Trenton-Morrisville Toll Bridge.* The Trenton Morrisville Toll Bridge carries US Route 1 over the Delaware River between Trenton, New Jersey and Morrisville, Pennsylvania. This bridge allows through traffic to bypass the congested downtown streets of Trenton and Morrisville. The facility is heavily used by commuter vehicles. The one way toll plaza, located at the Pennsylvania approach, has five toll lanes. A westbound one way toll collection conversion was completed in 1992. In 2002, a power, telecommunications, and data infrastructure contract was completed, and in 2003 the Commission's legacy toll equipment was replaced and electronic toll collection equipment (E-ZPass) was installed in all five toll lanes. In December 2006, the Commission began a full rehabilitation of the facility including construction of a new toll plaza and one additional northbound lane. The construction caused traffic diversion to other Commission and non-Commission facilities. This project was completed

in 2009. During 2016, a total of 9,002,450 vehicles passed through the westbound toll plaza, an increase of 4.35 % from 2015. The total volume crossing the bridge in 2016 in both directions (westbound and eastbound) was 21,451,731 vehicles.

*New Hope-Lambertville Toll Bridge.* The New Hope Lambertville Toll Bridge was opened to traffic on July 22, 1971. It has four toll lanes and carries US Route 202 over the Delaware River approximately one mile north of New Hope, Pennsylvania, and Lambertville, New Jersey. The bridge was converted to a one way toll plaza (westbound direction) in 2003, when the Commission reconstructed the toll plaza located at the Pennsylvania approach. The reconstruction included replacing the Commission's legacy toll equipment with electronic toll collection (E-ZPass) and upgrading the facility's power, telecommunications and data systems. In 2009, all of the one hundred thirty steel cantilever bracket tie plates on the bridge were strengthened with high strength steel. In 2013, concrete roadway repairs and asphalt replacement took place on the Pennsylvania and New Jersey approaches and the associated access ramps to Route 202. During 2016, a total of 1,963,051 vehicles passed through the westbound toll plaza, a decrease of 0.03% from 2015. The total volume crossing the bridge in 2016 in both directions (westbound and eastbound) was 4,465,603 vehicles.

*I-78 Toll Bridge.* The I-78 Toll Bridge carries traffic over the Delaware River between Northampton County, Pennsylvania and Warren County, New Jersey. The facility was completed and opened to traffic on November 21, 1989. The one way toll plaza, located at the Pennsylvania approach, has seven toll lanes. Tolls are collected in the westbound direction. In 2003, the Commission completed the construction of a 2,000 ton salt storage building, upgraded the facility's power, telecommunications and data systems and replaced the Commission's legacy toll equipment with electronic toll collection (E-ZPass) at all seven toll lanes. In 2004, it replaced the bridge expansion dams, re-striped the toll plaza and added appropriate signage to guide motorists to appropriate E-ZPass lanes. The Commission began rehabilitation project work along its 4.2 mile New Jersey portion of I-78 in October 2007. The rehabilitation project addressed premature cracking of the concrete roadway slabs and settlement of the roadway due to the heavy truck traffic that uses the I-78 corridor every day. In addition, sinkholes were filled and stabilized as part of the project. The work included: rehabilitation of the concrete roadway pavement, rehabilitation of the bridge decks, and various highway feature upgrades along the corridor. The project was completed in 2009. In 2010, the Commission completed a project to reduce the conventional plaza from seven toll lanes to four lanes, and added two Open Road Toll ("ORT") toll lanes. The ORT lanes allow vehicles to pass through the toll plaza at highway speed. During 2016, a total of 12,039,790 vehicles passed through the westbound toll plaza, an increase of 2.58% from 2015. The total volume crossing the bridge in 2016 in both directions (westbound and eastbound) was 24,920,291 vehicles.

*Easton-Phillipsburg Toll Bridge.* The Easton-Phillipsburg Toll Bridge carries US Route 22 over the Delaware River. It has five toll lanes and was converted to westbound toll collection in June 1989. In 2002, the Commission completed reconstruction of the center bearing truss on the New Jersey side of the bridge. In 2003 it upgraded the facility's power, telecommunications and data systems and replaced the Commission's legacy toll equipment with electronic toll collection (E-ZPass) at all five toll lanes. In 2004, both upstream and downstream bridge sidewalks were replaced. In 2015, the complete rehabilitation of the main river bridge was completed. Specific repairs to the Easton-Phillipsburg Toll Bridge facility included concrete and asphalt pavement repairs and replacement, and roadway safety feature upgrades along the Pennsylvania and New Jersey approaches; toll plaza repairs and electrical upgrades; replacement of roadway lighting on the main river bridge, approach roadways and local streets within the Commission's jurisdiction; deck replacement and rehabilitation of the main river bridge; cleaning and painting of the main river bridge and approach roadway structures; structural repairs to approach roadway overpasses; and repaving of adjacent roads within the Commission's jurisdiction. During 2016, a total of 5,415,710 vehicles passed through the westbound toll plaza, an increase of 3.50%

from 2015. The total volume crossing the bridge in 2016 in both directions (westbound and eastbound) was 12,613,146 vehicles.

*Portland-Columbia Toll Bridge.* The Portland-Columbia Toll Bridge connects Pennsylvania Route 611 at Portland, Pennsylvania, with US 46 at Columbia, New Jersey. Its toll plaza, located at the Pennsylvania approach, has three toll lanes. The bridge was converted to one way toll collection in 1989 with tolls collected in the westbound direction. The main river bridge was re decked in 1992, and in 1998 the bridge and approach structures were cleaned and painted. In 2003, the Commission upgraded the facility's power, telecommunications and data systems and replaced its legacy toll equipment with electronic toll collection (E-ZPass) at all three toll lanes. In 2015, the Portland-Columbia Toll Bridge approach roadway improvements project was completed. This project consisted of the rehabilitation of the approach roadway and ramp system at the Portland-Columbia Toll Bridge facility. Work consisted of concrete roadway and island repairs, drainage improvements, asphalt milling and overlay, pavement striping of the entire approach roadway/ramp systems, toll plaza roadway drainage improvements and miscellaneous topside repairs to the three bridge superstructures. During 2016, a total of 1,280,854 vehicles passed through the westbound toll plaza, an increase of 2.86% from 2015. The total volume crossing the bridge in 2016 in both directions (westbound and eastbound) was 2,926,879 vehicles.

*Delaware Water Gap Toll Bridge.* The Delaware Water Gap Toll Bridge crosses the Delaware River near Stroudsburg, Pennsylvania, providing a gateway from eastern metropolitan districts to the Pocono recreational areas. It is located on I-80 (Keystone Shortway), a four lane limited access highway that crosses the width of Pennsylvania to the Pennsylvania Ohio border and connects directly with the Ohio Turnpike west of Youngstown. On the New Jersey side, I-80 crosses the width of New Jersey from the Delaware Water Gap Toll Bridge to the George Washington Bridge. The bridge's toll plaza, located at the Pennsylvania approach, has eight toll lanes. The bridge was converted to one way toll collection in 1989. Tolls are collected in the westbound direction. Other major rehabilitative work completed in 1989 included deck replacement and construction of a New Jersey approach pedestrian walkway. In 2010, the Commission began a project to reduce the conventional toll plaza from eight toll lanes to five lanes, and install one ORT lane with full shoulders. In 2011, the bridge was rehabilitated to include replacement of steel expansion bearings, concrete repairs to the piers and abutments, replacement of the deck joints and cleaning and painting of the structural steel. This project was completed in 2011. During 2016, a total of 9,790,584 vehicles passed through the westbound toll plaza, an increase of 2.86% from 2015. The total volume crossing the bridge in 2016 in both directions (westbound and eastbound) was 19,572,594 vehicles.

*Milford-Montague Toll Bridge.* The Milford-Montague Toll Bridge is the northernmost toll bridge across the Delaware River under the Commission's jurisdiction and is located approximately seven miles south of the New York/New Jersey state line near Port Jervis. This structure connects US Route 206 at Montague, New Jersey, to US 6 and US Route 209 on the Pennsylvania side at Milford. Its toll plaza, located at the Pennsylvania approach, has three toll lanes. The bridge was converted to one way toll collection in 1999 and tolls are collected in the westbound direction. In 2003, the Commission upgraded the facility's power, telecommunications and data systems and replaced its legacy toll equipment with electronic toll collection (E-ZPass) at all three toll lanes. In early 2008, the Commission began a full rehabilitation which included rehabilitation and painting of the bridge, various improvements to the approach roadways on both sides of the river, and replacement of the toll plaza. This project was completed in 2009. During 2016, a total of 1,340,787 vehicles passed through the westbound toll plaza, an increase of 1.66% from 2015. The total volume crossing the bridge in 2016 in both directions (westbound and eastbound) was 2,443,926 vehicles.

## The Toll-Supported Bridges

The Commission's existing eleven vehicular and two pedestrian toll-supported bridges are listed in Table 2 above, "Commission Bridges," and briefly described below. The costs of operating and maintaining these thirteen toll-supported bridges, and any additional toll-supported bridge which may hereafter be acquired or constructed and included as part of the System, are supported by revenues from the toll bridges included in the Commission's System. Information summarized below regarding traffic volumes on the toll-supported bridges is taken from internal Commission reports.

*Lower Trenton Bridge.* The Lower Trenton Bridge over the Delaware River connects Bridge Street in Trenton, New Jersey with Bridge Street in Morrisville, Pennsylvania. It was opened to traffic in 1929. The bridge carries one lane of traffic in each direction separated by a center truss. In 2005, the structure was cleaned and painted and a new Trenton Makes the World Takes sign was installed. The structure is currently posted for restricted loading of 5 tons and speed limit of 25 miles per hour. In 2016, the bridge carried 5,452,648 vehicles, a decrease of 6.68% from 2015.

*Calhoun Street Bridge.* The Calhoun Street Bridge connects Calhoun Street in Trenton, New Jersey, with Trenton Avenue in Morrisville, Pennsylvania, approximately one mile north of the Lower Trenton Bridge. The present superstructure was built in 1884. The Calhoun Street Bridge is posted for a three ton weight limit and a fifteen mile per hour speed limit. In 2010, a comprehensive rehabilitation was completed to include floor system replacement, truss repairs and cleaning and painting of the superstructure. Commission bridge monitors are continuously stationed at each end of the bridge to enforce the truck ban. The bridge was closed from May 24, 2010 to September 24, 2010 to complete the rehabilitation. The bridge carried 6,361,380 vehicles in 2016, a decrease of 1.20% from 2015.

*Scudder Falls Bridge.* The Existing Scudder Falls Bridge is a major river crossing that carries I-95 between Lower Makefield Township, Pennsylvania, and Ewing Township, New Jersey and is located 1.3 miles north of the site of the Yardley Wilburtha Bridge which was destroyed in the flood of August 1955. The bridge carried a total of 22,067,416 vehicles in 2016, an increase of 2.19% from 2015. The Existing Scudder Falls Bridge will be demolished and the New Scudder Falls Bridge will be constructed and will become a toll bridge. See "THE PROJECT" herein.

*Washington Crossing Bridge.* The present Washington Crossing Bridge, built in 1904, connects Washington Crossing in New Jersey and Pennsylvania. The superstructure is a six-span, riveted steel, double Warren truss with a total length of 877 feet. It has a narrow roadway, only 15 feet, 2 inches wide. The Washington Crossing Bridge is limited to vehicles weighing up to three tons. Commission bridge monitors are on duty at all times to enforce the posted weight limit. The bridge was closed from August 9, 2010 through September 24, 2010 for a partial rehabilitation of the Pennsylvania abutment and steel structure. The bridge carried a total of 2,743,743 vehicles in 2016, an increase of 3.51% from 2015.

*New Hope-Lambertville Bridge.* The New Hope-Lambertville Bridge connects the business districts of Lambertville, New Jersey and New Hope, Pennsylvania. The superstructure was built in 1904 and the substructure in 1814. The bridge consists of six spans with a total length of 1,046 feet. The bridge is limited to vehicles not heavier than four (4) tons and a speed limit of fifteen miles per hour. Commission bridge monitors are on duty at all times to enforce the posted weight limit. In 2004, the bridge was rehabilitated with a full structural steel painting. The bridge carried a total of 4,899,984 vehicles in 2016, a decrease of 1.83% from 2015.

*Centre Bridge-Stockton Bridge.* The Centre Bridge-Stockton Bridge connects Stockton, New Jersey with Centre Bridge in Bucks County, Pennsylvania. The superstructure was built in 1927 and the



substructure in 1814. The Commission completed major structural rehabilitation and painting of the bridge in 2007. The bridge carried a total of 1,680,965 vehicles in 2016, a decrease of 1.84% from 2015.

*Lumberville-Raven Rock Pedestrian Bridge.* The Lumberville-Raven Rock Pedestrian Bridge connects Lumberville in Bucks County, Pennsylvania with the small community of Raven Rock in Hunterdon County, New Jersey. It is a five-span stiffened cable suspension bridge with straight backstays, 691 feet carrying a prestressed concrete walkway, nine feet wide. The present superstructure, which replaced a covered wooden bridge, was erected in 1947. It is supported on four piers and two abutments constructed in 1853 of stone masonry.

*Uhlerstown-Frenchtown Bridge.* The Uhlerstown-Frenchtown Bridge connects Frenchtown, New Jersey, with Uhlerstown in Bucks County, Pennsylvania. The superstructure was built in 1931 and is a six-span, riveted steel, Warren truss with a total length of 951 feet. It is carried on five piers and abutments, all of stone masonry construction, built in 1834. The bridge was constructed in 1931. A major structural rehabilitation and painting of the bridge was completed in the spring and summer of 2001. It is currently posted for a fifteen ton weight limit and a speed limit of fifteen miles per hour. The bridge carried a total of 1,595,402 vehicles in 2016, an increase of 8.97% from 2015.

*Upper Black Eddy-Milford Bridge.* The Upper Black Eddy-Milford Bridge connects Milford, New Jersey with Upper Black Eddy, Pennsylvania. The structure is a three-span riveted Warren Truss with a total length of 700 feet. The original structure at this site was a covered wooden bridge built in 1841 and replaced in 1933. The Bridge underwent a comprehensive rehabilitation and painting during the winter and early spring of 2011. The bridge was closed to vehicular traffic from January 11, 2011 through May 20, 2011. The bridge has a speed limit of 15 miles per hour but does not have a weight restriction. The bridge carried a total of 1,346,356 vehicles in 2016, a decrease of 1.38% from 2015.

*Riegelsville Bridge.* Riegelsville is the name of two towns, each on opposite banks of the Delaware River. One is situated near the northern boundary of Bucks County, Pennsylvania; the other at the southern end of Warren County, New Jersey. The bridge was closed on and off from September 17, 2010 to December 2, 2010 for a rehabilitation and structural steel painting. It is posted for a two and one-half ton weight limit and a speed limit of fifteen miles per hour. The bridge carried a total of 1,245,987 vehicles in 2016, an increase of 2.02% from 2015.

*Northampton Street Bridge.* The Northampton Street Bridge connects Union Square in Phillipsburg, New Jersey with Northampton Street in Easton, Pennsylvania. Both the substructure and superstructure were built in 1895, replacing a famous covered bridge designed and built by Timothy Palmer in 1805. It is currently posted for a three ton weight limit and 15 mile per hour speed limit. A major rehabilitation, lighting and painting of the bridge took place in 2002. The bridge carried a total of 7,068,617 vehicles in 2016, a decrease of 2.89% from 2015.

*Riverton-Belvidere Bridge.* The Riverton-Belvidere Bridge connects Belvidere, New Jersey with Riverton, Lower Mount Bethel Township, Pennsylvania. The present superstructure was built in 1904. The Commission completed gusset plate connection repairs, heat straightening of lower chord members, repairs to end post and slope stability improvements in 2016. The structure is limited to vehicles weighing not more than eight tons and it has a fifteen mile per hour speed limit. The bridge carried a total of 1,626,062 vehicles during 2016, an increase of 1.60% from 2015.

*Portland-Columbia Pedestrian Bridge.* The first bridge to cross the Delaware River between Portland, Pennsylvania and Columbia, New Jersey was built on this site in 1868. A covered wooden bridge, it was the last of its kind over the Delaware River when it washed away in the flood of August

1955. It had been closed to vehicular traffic in 1953, with the opening of the nearby toll bridge, but continued to be used by pedestrians. The present bridge was constructed in 1958.

### **Non-Commission Bridges**

Although located within the Commission's geographic jurisdiction, the following three toll bridges are not owned or operated by the Commission: (1) Dingman's Ferry Toll Bridge, built in 1900, (2) Burlington-Bristol Toll Bridge, built in 1931, and (3) New Jersey-Pennsylvania Turnpike Bridge, built in 1956.

### **Bridge Inspection and Maintenance**

In accordance with the National Bridge Inspection Standards ("NBIS"), the Commission conducts biennial inspections on each of its bridges and conducts additional inspections of certain bridges when the Commission believes weather or other circumstances warrant more frequent inspections and prior to undertaking a rehabilitation project. Consulting engineering firms with recognized expertise in conducting bridge inspections are retained to perform the inspections. Thorough inspections of all critical elements of the bridges are conducted. The consultants' findings are contained in detailed annual reports which include a discussion of the condition of the elements of the bridges, recommendation and prioritization for remedial work and cost estimates for the recommended work. The Commission's engineers coordinate and oversee the inspection effort and review in detail the inspection reports. The consulting engineers work closely with the Chief Engineer and maintenance personnel to coordinate remedial work that can be accomplished with in-house maintenance forces. Remedial work which cannot be performed by in-house personnel is designed by licensed engineering consultants and performed by pre-qualified contractors on a competitive bid basis. All work recommended by the consultants to be performed on each of the bridges is recorded on computerized spreadsheets and the progress of the work is monitored by the Chief Engineer or his/her designee.

In addition, the Indenture requires that a Consultant conduct inspections of the System at least once every two years and that the Consultant provide the Commission with a report setting forth its findings and recommendations as to revisions or additions to the Commission's latest Annual Capital Budget. The Commission currently operates a biennial inspection program of its bridges, with toll-supported bridges inspected in even-numbered years and toll bridges inspected in odd-numbered years. As discussed above, under the heading "INTRODUCTION – Consultant Reports – Inspection Reports", the General Engineer prepared the 2015 Bridge Inspection Report, which summarizes the General Engineer's inspection findings and sets forth the recommended maintenance and repair items for the Commission's System.

The General Engineer noted in the 2015 Bridge Inspection Report that the Commission does not have any structurally deficient bridges.

*Commission Maintenance and Engineering Staff.* The Commission maintenance staff consists of approximately 50 personnel working within four major trades: specialized maintenance, HVAC/controls, electrical and highway/grounds. Maintenance staff must be qualified in accordance with the types of duties assigned to them, and must pass a skills test and a physical examination prior to employment. Commission maintenance is supported by a full range of heavy equipment and hand and power tools.

Commission engineering staff consists of twelve personnel supported by an additional staff of five provided by AECOM, Philadelphia, Pennsylvania, the Commission's Capital Program Management Consultant ("CPMC"). The Engineering Department and CPMC staff are experienced in all major disciplines associated with Commission operations including: heavy bridge and highway construction,

building facilities and systems, power distribution, communications, environmental, parking facilities and surveying.

*Bridge Condition.* The Commission performs detailed engineering inspections of its bridge facilities on a biennial basis (toll bridges in the “odd” years and toll supported bridges in the “even” years). In 2015 and 2016, the General Engineer performed the inspections.

*Structural Soundness.* Based upon the findings and conclusions of the prior inspections and upon the knowledge and experience of the Commission’s Engineering Staff, the bridges are considered to be structurally sound and can safely carry the posted loads. This condition is expected to continue based upon currently planned maintenance and capital improvement projects. The Commission’s inspection program is monitored by the Commonwealth of Pennsylvania and the State of New Jersey for compliance with federal standards. These standards stipulate condition reporting using uniform coding, required inspection intervals and techniques, qualifications of staff, reporting techniques and format, and load rating methods. The condition of the bridges is reported to the Pennsylvania Department of Transportation (“PENNDOT”) and the New Jersey Department of Transportation (“NJDOT”) upon completion of the biennial inspections for coding and inclusion into the Federal Highway Administration National Bridge Inventory.

The Commission’s General Engineer has performed detailed load rating analyses of all vehicular bridges (including special ratings for heavy permit vehicles and infrequent emergency vehicle crossings) during their periodic inspections and as weather or other circumstances warrant and those analyses are updated as structural modifications are implemented or as conditions change. Load rating analyses are performed using the standard criteria and guidelines as appropriate as stipulated by the State of New Jersey, the Commonwealth of Pennsylvania and the Federal Highway Administration. There are currently no restrictions on any toll bridges; however, there are some load restrictions on some toll-supported bridges. Those load restrictions impose weight limits that are enforced by Pennsylvania and New Jersey state police. Each load restriction is reviewed and re-assessed in connection with rehabilitation work on the affected bridge. All bridges are currently rated within acceptable or posted load capacity levels.

*Lead-Based Paint Status.* The bridges were constructed during the period between 1884 and 1989, with six of the twenty constructed at the turn of the 20th century. As is typical with bridges of this era, lead containing paints were specified for use as a steel coating. All the bridges are therefore assumed to contain lead-based paint. Through its General Engineer and in-house staff, the Commission has developed a painting program that addresses the issue of existing lead-based paint remediation through the use of encapsulation and/or total removal.

*Environmental Compliance.* The Commission has addressed or is addressing all environmental related issues that have been brought to light on its facilities in compliance with all applicable federal, New Jersey and Pennsylvania environmental remediation regulations.

## **Capital Program**

In 2001, the Commission developed its first ten-year Capital Program (the “Capital Program”). The Capital Program envisioned the implementation of a four-prong strategy to secure the Commission’s long-term mission as follows:

*Bridge System Protection/Security.* Structural modifications to protect the Commission’s facilities from sabotage, establishment of back-up command and control centers to ensure continuous operations, investments in surveillance technology to secure facilities, upgrades of voice, data and video

communications to permit integrated response to incident management and installation of closed circuit television at various strategic locations for real time monitoring.

*Bridge System Preservation.* The average age of the System is over 80 years old. This prong addresses the maintenance and rehabilitation needs of the System, including lead-based paint removal and painting with environmentally safe coatings, structural repairs and modifications and historic preservation of both toll and toll-supported bridges.

*Bridge System Management.* Replacement and upgrade to next generation technology of E-ZPass, upgrade the System's power supply, data and telecommunications infrastructure and implementation of intelligent transportation systems technology at key crossings to optimize traffic flow.

*Bridge System Enhancement.* Continuing improvement projects to address current and projected corridor congestion at the Commission's three key crossing corridors: Route US 1 and Interstate 95, the southerly corridor; I-78 and Route US 22, the middle corridor; and Interstate 80 and Route US 46, the northerly corridor.

The Commission updates its Capital Program each year (looking forward to the next 10 years) to reflect current construction costs and changes/modifications brought about through a change in priorities and/or redefinition of project scope due to advances in technology and/or changes in the condition of its existing infrastructure.

The Commission recently completed its latest Capital Program update covering the next ten-year period (2017-2026). The Commission currently anticipates using Revenues of the System to fund the Capital Program over the next ten years. Major projects in the Capital Program include:

*Scudder Falls Bridge Replacement.* A portion of the Project will be financed with the proceeds of the Series 2017 Bonds. See "THE PROJECT" for a description of the Project.

*New Commission Administration Building.* This project includes construction of a new administration building. The existing Administration Building in Morrisville, built in the 1950's, is outdated with structural features and building systems which have exceeded their useful lives resulting in a need for extensive renovation or replacement. A consultant study has indicated an alternate site replacement building will be more cost efficient and serviceable than renovation of the existing building on its overcrowded site. The Commission has acquired a new site for construction of a new administration building in Lower Makefield Township, adjacent to the New Scudder Falls Bridge.

*Trenton-Morrisville Toll Bridge Maintenance Facility Improvements.* This project includes addition of a district wide maintenance facility with approximately fifteen vehicle storage garage bays, an equipment storage building, a 3,000 ton salt storage building and sufficient maintenance office size to serve toll operations at the Trenton-Morrisville Toll Bridge. It also includes renovating the existing maintenance garage to maximize its use.

*Trenton-Morrisville Toll Bridge Open Road Tolling.* This project consists of studying design and construction of Open Road Tolling at the Trenton-Morrisville Toll Bridge. This project is anticipated to be implemented in the next three years.

*Trenton-Morrisville Toll Bridge All Electronic Tolling.* This project consists of Phase 2 of the All Electronic Tolling, including studying, design and implementation of all electronic tolling at the Trenton-Morrisville Toll Bridge. Installation of the tolling equipment is not included in this estimate. This is a long-term initiative expected to occur in the next eight to ten years.

*New Hope-Lambertville Toll Bridge Equipment and Salt Storage Building Improvements.* This project includes the study, design and construction of an equipment storage building to provide adequate storage space for maintenance vehicles and equipment and a salt storage building to provide adequate storage space for maintenance operations in the area.

*I-78 Toll Bridge.* There are several projects included in the Capital Program for the I-78 toll bridge, including the following:

*Welcome Center and Maintenance Garage Improvements.* This project includes the study, design and construction of a building expansion and renovation to provide adequate storage space for maintenance vehicles and equipment, one vehicle lift, restrooms, kitchen, offices and locker room facility improvements at the I-78 facility. Construction is underway at this time.

*Cleaning and Painting.* The project includes the cleaning and painting of the main Delaware River bridges, and all overpass structures in New Jersey and Pennsylvania.

*Bridge Rehabilitation.* This project will consist of replacement of the parapets as well as rehabilitating the deck, superstructure and substructure components of the eastbound and westbound bridge structures crossing the Delaware River at the I-78 Toll Bridge facility.

*New Jersey Roadway Mill and Paving.* This project will consist of the milling, paving and restriping of the New Jersey approach roadway along with miscellaneous guide rail and concrete repairs. This project represents the next necessary life cycle rehabilitation for the pavement.

*Easton-Phillipsburg Toll Bridge Administration Building Improvements.* This project will consist of upgrading the HVAC, elevator and renovations to the building to increase the energy and space efficiency and meet new code requirements.

*Portland-Columbia Toll Bridge Administration Building Facility Upgrades.* This project will consist of the upgrade/replacement of the outdated building heating, ventilation and air-conditioning system.

*Washington Crossing Bridge Priority Repairs.* This project will consist of priority structural repairs to the bridge's floor beams and gusset plate connections in order to extend its useful life until a longer term project (seven to ten years away) to replace the functionally obsolete existing structure can be planned, designed, and constructed. This project will occur after the completion of construction of the New Scudder Falls Bridge.

*Centre Bridge-Stockton Bridge Rehabilitation.* This project will consist of rehabilitation of the floor system at the Centre Bridge-Stockton Bridge as well as the rehabilitation of the bridge to preclude major repairs for a minimum of 15 years. The work will include: replacement of lower truss chord members, repairs to the grid deck and structural steel floor system; replacement of the bridge tri rail, removal of existing paint and repainting of the trusses; repairs to the truss bearings and abutment backwalls; substructure repairs; new bridge lighting; and replacement of the approach roadways at both ends of the bridge.

*Uhlerstown-Frenchtown Bridge Rehabilitation.* This project will consist of rehabilitation of the floor system at the Uhlerstown-Frenchtown Bridge as well as the rehabilitation of the bridge to preclude major repairs for a minimum of 15 years. The work will include: repairs to the grid deck and structural

steel floor system; replacement of the bridge tri rail, removal of existing paint and repainting of the trusses; repairs to the truss bearings and abutment backwalls; substructure repairs; new bridge lighting; and replacement of the approach roadways at both ends of the bridge.

*Northampton Street Bridge Floor System Replacement and Rehabilitation.* This project will consist of rehabilitation and replacement of the floor system at the Northampton Street Bridge as well as the rehabilitation of the bridge to preclude major repairs for a minimum of 15 years. The work will include: complete replacement of the grid deck and structural steel floor system; removal of existing paint and repainting of the trusses; repairs to the truss bearings and abutment backwalls; improving bridge drainage; replacement of sidewalk and access panels; substructure repairs; new bridge lighting and architectural lighting; and replacement of the approach roadways at both ends of the bridge.

*Riverton-Belvidere Bridge Cleaning and Painting.* This project will consist of cleaning and repainting the existing bridge.

*Commission Traffic Count Program Upgrade.* The work includes the replacement of the existing traffic count system with a new system to count traffic at all vehicular toll supported bridges and the free direction of all toll bridges. The installation of a new traffic count program to manage the traffic data includes the replacement of the traffic counters, modems and software. The new system will include microwave radar units that will provide increased functionality such as vehicle length data and speed data.

*Electronic Toll Collection System Wide Replacement and E-ZPass Next Generation Technology.* The project includes a system wide replacement of the existing Electronic Toll Collection System and replacement with next generation E-ZPass technology in both the conventional toll plaza and open road tolling lanes. Also included is the replacement of the Violation Enforcement System.

*Electronic Surveillance System Enhancements.* The work includes Electronic Surveillance/Detection System Enhancements including radio communication system upgrades; replacement of existing, aging cameras; additional cameras to provide necessary camera coverage, including infrared technology; enhancements to the existing Primary Control Center, addition of a Secondary Control Center within Commission facilities; and providing the New Jersey State Police with the ability to display Commission camera displays within their Regional Operations Intelligence Center facility.

*Bridge Monitor Shelter Replacement Program.* This project will include the system-wide replacement of all toll-supported bridge officers' shelters throughout the System, creating two standardized officer shelter types. One type would be a full 24/7 shelter; the other would be a smaller, part-time satellite shelter (no restroom facilities) for use for enforcement activities.

*Toll Plaza Sign Replacement.* This project includes the installation of LED Daktronics signs at the New Hope-Lambertville Toll Bridge, Easton-Phillipsburg Toll Bridge, Portland-Columbia Toll Bridge and Milford-Montague Toll Bridge to enhance the visibility of the lane status signs to the approaching drivers. Upon completion of this project, all toll bridges will have LED signs over the toll lanes. This project also includes revising the I-78 westbound roadway overhead guide signs at two miles, one mile and a half mile before the split for the open road tolling lanes.

*Toll Collection Counting Facilities at I-78 Toll Bridge, Delaware Water Gap Toll Bridge, Easton-Phillipsburg Toll Bridge, Portland-Columbia Toll Bridge and Milford-Montague Toll Bridge.* This project will address the security issues associated with the transport and counting of toll receipts at these facilities. The work will consist of a Concept Development and Feasibility Study, and subsequent

implementation of recommendations for Banking and Toll Collector Counting Rooms in new banking buildings to be built adjacent to each toll plaza.

## **THE PROJECT**

### **Description of the Project**

The Existing Scudder Falls Bridge is a 1,740 foot-long bridge that spans the Delaware River between Ewing Township, New Jersey and Lower Makefield Township, Pennsylvania and, together with its adjoining interchanges and immediate approach roadways, is a heavily used commuter route that encounters daily peak-period traffic congestion and travel delays. The existing bridge was constructed in 1959 and opened in 1961, becoming an important regional commuter connection between Bucks County, Pennsylvania and Mercer County, New Jersey. The Commission is undertaking the Project to address safety deficiencies and traffic congestion at the bridge, its nearby interchanges, and its approach roadways in New Jersey and Pennsylvania.

The Project includes: (i) the demolition of the Existing Scudder Falls Bridge over the Delaware River and the construction of new northbound and southbound structures (i.e. the New Scudder Falls Bridge); (ii) 4.4 miles of approach roadway widening and improvements between the I-95/PA Route 332 Interchange in Pennsylvania and the I-95/Bear Tavern Road Interchange in New Jersey; (iii) the reconfiguration of the I-95/Taylorville Road Interchange in Pennsylvania and the I-95/Route 29 Interchange in New Jersey, and associated ramps and structures; (iv) a pedestrian/bicycle shared-use pathway that ties in with the canal towpaths in both Pennsylvania and New Jersey; (v) construction of noise walls in Pennsylvania and New Jersey; (vi) construction of a Bridge Monitor/All Electronic Tolling Facility; and (vii) a wetland mitigation site in Pennsylvania. Construction of the Project is expected to occur over a four-year period.

The total estimated cost of the Project is \$512 million. Costs include approximately (i) \$414 million for actual construction, which includes \$10 million for unforeseen costs (i.e. contingency) under the Construction Contract (hereinafter defined), (ii) \$92 million for engineering, management and inspection and (iii) \$6 million for miscellaneous costs.

### **Project Timeline**

#### ***Project Inception***

The Commission first identified the need to reduce congestion and improve safety on the Existing Scudder Falls Bridge in 1990. In 2000, the Commission commenced a transportation study to define transportation needs at four bridges (one of which is the Existing Scudder Falls Bridge) near Trenton, New Jersey. In 2002, the Commission commenced the Southerly Crossings Corridor Study: Phase I Transportation Study (the “2002 Study”) and identified the Existing Scudder Falls Bridge as a higher priority than the other three bridges because it accommodates the highest traffic volume of the four bridges studied.

The traffic engineer that conducted the 2002 Study recommended: (i) adding a travel lane in each direction to the Existing Scudder Falls Bridge and the adjoining highway segments; (ii) capacity improvements extending west to PA Route 332 in Pennsylvania and east of NJ Route 29 in New Jersey; (iii) reconstruction of the NJ Route 29 Interchange and ramps; and (iv) a transition section to the existing six-lane cross-section of the I-95 mainline.

### ***Preliminary Design and Environmental Assessment***

Commencing in 2003, the Commission engaged professionals to prepare a preliminary design for, and an environmental assessment of constructing, the New Scudder Falls Bridge. The Commission and its professionals worked with the Federal Highway Administration, PENNDOT, NJDOT, the New Jersey Department of Environmental Protection (“NJDEP”), the Pennsylvania Department of Environmental Protection (the “PADEP”) and all other necessary environmental permitting agencies for approval to construct the New Scudder Falls Bridge. In 2012, the Commission received final approval from such entities to continue to the final design phase for constructing the New Scudder Falls Bridge.

### ***Final Design***

In March, 2015 the Commission engaged Michael Baker, Jr. International (“Baker”) to prepare the final construction documents for the Project. Baker has prepared construction plans for two early construction contracts and the main construction contract. The early contracts are necessary to accommodate the construction schedule of the main construction contract.

### **Project Contracts**

*Early Construction Contracts.* There are two early construction contracts for the Project (the “Early Construction Contracts”). The first Early Construction Contract is with A.P. Construction, Inc. for clearing, removing and disposal of trees, logs, dead trees and other vegetation and debris within the sound barrier wall corridors in Pennsylvania and New Jersey. A majority of the work under this contract is complete, and the remainder is expected to be completed in early 2017. The second Early Construction Contract is with PKF-Mark III, Inc. for construction of sound barriers along the Pennsylvania approach to the New Scudder Falls Bridge. Construction of the sound barriers has commenced and is expected to be complete by June 30, 2017.

*Construction Manager.* In October, 2016, the Commission entered into a construction management agreement (the “Construction Management Agreement”) with Hill International (the “Construction Manager”). Under the Construction Management Agreement, the Construction Manager will be responsible for oversight and reporting functions for the Project, including establishing and monitoring the schedule for the Project, monitoring construction progress, reviewing drawings, conducting safety and material inspections and administering invoices and payment.

*Construction Contract.* On January 10, 2017, following a public bid solicitation that began in September 2016, the Commission received one proposal for the construction of the Project from Trumbull Corporation (the “General Contractor”) with a total bid price of \$396 million (the “Bid Price”). Although such Bid Price is approximately 12% higher than Baker’s final estimate, reviews by Baker, the Construction Manager and the Commission determined that the bid from the General Contractor was responsive and conforms to the requirements of the bid specifications for the Project, in all respects. Accordingly, the Commission, at its meeting held on January 30, 2017, approved the bid award. A notice of award was issued to the General Contractor on January 31, 2017.

The Commission expects to enter into a construction contract with the General Contractor reflecting the terms of the proposal from the General Contractor and Bid Price (the “Construction Contract”). Pursuant to the bid specifications and the terms of the Construction Contract, under certain circumstances (such as unexpected subsurface conditions or changes in quantities required), the final total cost of the Construction Contract could be higher or lower than the Bid Price. The Construction Contract includes a contingency of \$10 million for unforeseen costs. Pursuant to the bid specifications and the terms of the Construction Contract, the General Contractor is also required to execute a project labor



agreement with certain area unions, which is intended to guarantee adequate quantities of the required skilled labor necessary for the Project.

The Commission anticipates executing the Construction Contract and issuing a notice to proceed thereunder in March 2017. For a discussion of certain litigation relating to the bid process, see “LITIGATION – Harms Litigation” herein.

The Construction Contract includes the following security provisions:

*Payment, Performance and Maintenance Bonds.* The General Contractor is required to provide payment, performance and maintenance bonds in the amount equal to 100% of the price of the Construction Contract. The bonds will be for the benefit of the Commission and must be issued by a corporate surety authorized to do business in the Commonwealth of Pennsylvania.

*Insurance.* The General Contractor will be required to maintain adequate insurance for the performance of the Construction Contract. In addition, the Commission will maintain its own insurance policies for the construction of the New Scudder Falls Bridge.

*Liquidated Damages.* Under the Construction Contract, the General Contractor will be assessed liquidated damages of \$60,000.00 per day for each day the first span of the New Scudder Falls Bridge is not complete beyond May 1, 2019. During the invoice process, the Commission has the right to reduce payment to the General Contractor in the amount of such liquidated damages.

*AET Installation Contract.* The Commission and TransCore (the “AET Contractor”) have entered into an Electronic Toll Collection System Replacement Design, Build and Maintain Agreement, dated September 29, 2015 (the “AET Contract”), pursuant to which the AET Contractor has agreed to design, develop, integrate, install and test the All Electronic Tolling collection system at the New Scudder Falls Bridge. The amount the Commission is required to pay the AET Contractor under the AET Contract is included in the budget to construct the New Scudder Falls Bridge.

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## Permits and Approvals

The Commission has received all permits and approvals for the Early Construction Contracts and expects to receive all permits and approvals prior to the time required to commence the various phases of construction under the Construction Contract. Set forth below is a table of all material permits and approvals required for the construction of the Project, together with the date such permit or approval was issued or the anticipated date of issuance.

<u>Permits and Approvals</u>	<u>Date Issued or Anticipated Issue Date</u>
Interagency Agreement with PENNDOT and NJDOT	April 30, 2010
NJDEP Letter of Interpretation	February 10, 2011
Delaware River Basin Commission Project Approval	May 10, 2012
FHWA Finding of No Significant Impact	June 14, 2012
FHWA Tolling Approval	September 21, 2012
NJDEP Freshwater Wetland Individual Permit	June 28, 2013
NJDEP Flood Hazard Area Permit	June 28, 2013
NJDEP Water Quality Certificate	June 28, 2013
Delaware and Raritan Canal Commission Certificate of Approval	July 15, 2013
Bucks County (PA) Planning Commission – Act 67 Consistency Letter	January 14, 2014
Lower Makefield Township (PA) – Act 67 Consistency Letter	February 28, 2014
Bucks County (PA) Conservation District – Erosion and Sediment Control Approval	March 21, 2014
Bucks County (PA) Conservation District – Pennsylvania NPDES Approval	March 28, 2014
National Marine Fisheries Service – Sturgeon Monitoring Plan Approval	November 25, 2015
Pennsylvania Fish and Boat Commission – Red Belly Turtle Survey and Compliance	January 14, 2016
NJDEP – LURP Approval of the New Jersey Riparian Mitigation Sites	May 13, 2016
NJDEP – Green Acres Program Parkland Diversion	June 30, 2016
New Jersey Water Supply Authority – Authorization to Perform Work in the D&R Canal	August 3, 2016
Mercer County (NJ) Soil Conservation District – Soil Erosion and Sediment Control Certification	August 4, 2016
NJDEP NPDES General Permit for Stormwater Discharge Associated with Construction	August 9, 2016
Pennsylvania Fish and Boat Commission – Permit to Install Floating Structures	August 22, 2016
Bucks County (PA) Conservation District – Erosion and Sediment Control Approval	October 28, 2016
Bucks County (PA) Conservation District – Pennsylvania NPDES Approval	November 10, 2016
NJDEP Flood Hazard Area Individual Permit	December 14, 2016
NJDEP Freshwater Wetland Permit	December 15, 2016
NJDEP Historic Preservation Office – Authorization under New Jersey Register of Historic Places Act	December 23, 2016
National Marine Fisheries Service – Section 7 Approval	January 4, 2017
Delaware River Basin Commission – Project Review	Anticipated February, 2017
NJDEP – Reforestation Act Approval	Anticipated February, 2017
Pennsylvania Game Commission and NJDEP – Peregrine Falcon Mitigation Plan Approval	Anticipated March, 2017
FHWA – NEPA Environmental re-evaluation	Anticipated March, 2017
Pennsylvania Wetlands Mitigation Plan Final Design Approval	Anticipated March, 2017
USACE Section 404 Permit	Anticipated March, 2017

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## Timing of Construction

As discussed above, the Commission anticipates delivering a notice to proceed to the General Contractor in March, 2017. Construction is expected to commence in April, 2017 and be completed in 2021. Set forth below is a schedule of milestones and key dates set forth in the Construction Contract:

<u>Milestone</u>	<u>Anticipated Date</u>
Notice to proceed	March, 2017
Construction Commencement	April, 2017
Bridge Monitor/All Electronic Tolling Building Completion	February, 2019
Completion of First Span of New Scudder Falls Bridge	May, 2019
Completion of New Scudder Falls Bridge	August, 2021

## Schedule for Collecting Tolls

The Construction Contract includes a milestone date of June, 2019 for the commencement of collecting tolls on the New Scudder Falls Bridge. In order to provide time for the installation of the All Electronic Tolling infrastructure and equipment, and testing and acceptance of the All Electronic Tolling system, by the vendor who will install such infrastructure and equipment, the General Contractor must complete the first span of the New Scudder Falls Bridge by May 1, 2019. As discussed above, the General Contractor will be assessed liquidated damages to compensate the Commission for failure to achieve completion of the first span by such date.

## All Electronic Tolling

The Commission will collect one-way tolls in the southbound/westbound direction for use of the New Scudder Falls Bridge electronically through the E-ZPass system or video capture and billing ("Toll-By-Plate") (collectively, "All Electronic Tolling"). A conventional toll plaza will not be built. Electronic toll equipment will be mounted on an overhead gantry structure on the Pennsylvania side of the bridge. The New Scudder Falls Bridge is the first Commission bridge to use All Electronic Tolling as the toll collection method. All Electronic Tolling is an electronic toll collection system that allows the motorist to travel at prevailing speeds without having to stop to pay the toll. A camera image of the license plate of motorists passing through the All Electronic Tolling system who are not E-ZPass tag holders will be taken by electronic equipment mounted in the overhead gantry. The Commission expects to send Toll-By-Plate invoices monthly. The Commission currently contracts with Xerox State and Local Solutions, Inc. ("Xerox State and Local") to operate its E-ZPass customer service and violation processing center and intends to contract with Xerox State and Local to operate the Toll-By-Plate customer service and collection center.

The process for collecting tolls for Toll-By-Plate customers is as follows:

- The Commission will send an invoice to the customer for the toll thirty days after the first toll transaction and the customer has thirty days to pay the toll.
- Thirty days after the first invoice, the Commission will send the customer a second invoice that also includes a five dollar late charge.
- Thirty days after the second invoice, the Commission will send the customer a third invoice that is a violation notice and also includes a thirty dollar violation fee.

- If customer fails to pay within thirty days of the third invoice, the Commission will not send another notice to the customer but will refer the customer to a collection agency.
- The Pennsylvania legislature recently enacted a law, effective May 2017, that authorizes the Commission to notify PENNDOT that a Pennsylvania motorist has outstanding six or more unpaid tolls or more than \$500 of unpaid tolls, at which time PENNDOT is authorized to suspend such motorist's vehicle registration.

See "INVESTMENT CONSIDERATIONS – Operating Risks", herein.

## **TOLL RATES, TRAFFIC AND REVENUE**

### **Toll Rates**

The Commission currently collects tolls on seven bridges, with all of the bridges having one-way toll plazas and collecting tolls in the westbound/southbound direction only. There are seven commercial vehicle classes determined by axles, passenger vehicles or other special permits. Upon completion of the first span of the New Scudder Falls Bridge, the Commission will commence collecting tolls for the Scudder Falls Bridge. The Commission will then receive revenues from eight toll bridges to maintain a total of twenty bridges.

Tolls are assessed based on the classification of each vehicle and the payment type. Currently, the Commission accepts cash, tokens and E-ZPass at each of its toll bridges. Utilization of E-ZPass as a method of payment on the toll bridges has increased since the Commission implemented E-ZPass in 2003. The percentage of car trips paid for using E-ZPass in 2016 was 64.0%. The percentage of trucks and commercial vehicle trips paid for using E-ZPass in 2016 was 85.1%. The total (cars, trucks and commercial) percentage of trips paid for using E-ZPass in 2016 was 66.9%.

The Commission last increased tolls for all toll bridges on July 1, 2011. The Commission is not required to obtain the approval of any state or the federal government in order to raise tolls for its toll bridges; however, pursuant to a resolution the Commission adopted in 2013, the Commission will hold public meetings prior to any toll adjustment.

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Table 3 sets forth a schedule of the Commission's current one-way bridge tolls for all current toll bridges and the approved toll rates for the New Scudder Falls Bridge, the collection of which will commence upon completion of the first span. After holding public hearings, the Commission adopted the toll rates for the New Scudder Falls Bridge on September 26, 2016.

**Table 3**  
**Toll Rates by Vehicle Class**

<b><u>Vehicle Type</u></b>	<b><u>Current Toll Bridge Toll Rates</u></b>	<b><u>Scudder Falls Approved Toll Rates</u></b>
Automobile	\$1.00	\$1.25 E-ZPass/\$2.60 Toll-By-Plate
E-ZPass Commuter Discount <sup>(1)</sup>	0.60	0.75
2 Axle Truck	6.50	7.00 E-ZPass/8.35 Toll-By-Plate
E-ZPass - Off-Peak <sup>(2)</sup>	5.85	6.30
3 Axle Truck	12.00	12.75 E-ZPass/14.25 Toll-By-Plate
E-ZPass - Off-Peak <sup>(2)</sup>	10.80	11.48
4 Axle Truck	16.00	17.00 E-ZPass/19.00 Toll-By-Plate
E-ZPass - Off-Peak <sup>(2)</sup>	14.40	15.30
5 Axle Truck	20.00	21.25 E-ZPass/23.75 Toll-By-Plate
E-ZPass - Off-Peak <sup>(2)</sup>	18.00	19.13
6 Axle Truck	24.00	25.50 E-ZPass/28.50 Toll-By-Plate
E-ZPass - Off-Peak <sup>(2)</sup>	21.60	22.95
7 Axle Truck	28.00	29.75 E-ZPass/33.25 Toll-By-Plate
E-ZPass - Off-Peak <sup>(2)</sup>	25.20	26.78

<sup>(1)</sup> E-ZPass 40% discount for automobiles for 16 or more trips in a calendar month.

<sup>(2)</sup> Off-Peak = 9:01 PM to 5:59 AM (10% discount).

Source: Commission

Table 4 on the following page sets forth a schedule of the Commission's current one-way bridge tolls for all current toll bridges, the approved toll rates for the New Scudder Falls Bridge, which will commence upon completion of the first span, and a comparison of such rates to toll rates for one-way bridge tolls collected by other regional authorities.

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**Table 4**  
**One-Way Toll Comparisons**

<b><u>Vehicle Type</u></b>	<b><u>Delaware River Joint Toll Bridge Commission<sup>(1)</sup></u></b>	<b><u>Delaware River Joint Toll Bridge Commission (New Scudder Falls Bridge Only)<sup>(2)</sup></u></b>	<b><u>Delaware River Port Authority<sup>(3)</sup></u></b>	<b><u>Pennsylvania Turnpike Commission<sup>(4)</sup></u></b>	<b><u>Burlington County Bridge Commission<sup>(5)</sup></u></b>	<b><u>The Port Authority of NY &amp; NJ<sup>(6)</sup></u></b>	<b><u>Metropolitan Transportation Authority<sup>(7)</sup></u></b>
Automobile	\$1.00	\$1.25 E-ZPass/\$2.60 Toll-By-Plate	\$5.00	\$5.00 E-ZPass/\$6.75 Toll-By-Plate	\$4.00	\$15.00	\$16.00
E-ZPass - Peak	No Discount	No Discount	No Discount	No Discount	\$3.00	\$12.50	\$11.08
E-ZPass - Off-Peak	No Discount	No Discount	No Discount	No Discount	\$3.00	\$10.50	\$11.08
2 Axle Truck	\$6.50	\$7.00 E-ZPass/\$8.35 Toll-By-Plate	\$15.00	\$5.00 E-ZPass/\$6.75 Toll-By-Plate	\$12.00	\$42.00	\$32.00
E-ZPass - Peak	No Discount	No Discount	No Discount	No Discount	No Discount	\$36.00	\$20.00
E-ZPass - Off-Peak	\$5.85	\$6.30	No Discount	No Discount	No Discount	\$34.00	\$20.00
3 Axle Truck	\$12.00	\$12.75 E-ZPass/\$14.25 Toll-By-Plate	\$22.50	\$10.00 E-ZPass/\$13.50 Toll-By-Plate	\$18.00	\$63.00	\$52.00
E-ZPass - Peak	No Discount	No Discount	No Discount	No Discount	No Discount	\$54.00	\$32.78
E-ZPass - Off-Peak	\$10.80	\$11.48	No Discount	No Discount	No Discount	\$51.00	\$32.78
4 Axle Truck	\$16.00	\$17.00 E-ZPass/\$19.00 Toll-By-Plate	\$30.00	\$15.00 E-ZPass/\$20.25 Toll-By-Plate	\$24.00	\$84.00	\$66.00
E-ZPass - Peak	No Discount	No Discount	No Discount	No Discount	No Discount	\$72.00	\$41.90
E-ZPass - Off-Peak	\$14.40	\$15.30	No Discount	No Discount	No Discount	\$68.00	\$41.90
5 Axle Truck	\$20.00	\$21.25 E-ZPass/\$23.75 Toll-By-Plate	\$37.50	\$20.00 E-ZPass/\$27.00 Toll-By-Plate	\$30.00	\$105.00	\$86.00
E-ZPass - Peak	No Discount	No Discount	No Discount	No Discount	No Discount	\$90.00	\$54.62
E-ZPass - Off-Peak	\$18.00	\$19.13	No Discount	No Discount	No Discount	\$85.00	\$54.62
6 Axle Truck	\$24.00	\$25.50 E-ZPass/\$28.50 Toll-By-Plate	\$45.00	\$25.00 E-ZPass/\$33.75 Toll-By-Plate	\$36.00	\$126.00	\$100.00
E-ZPass - Peak	No Discount	No Discount	No Discount	No Discount	No Discount	\$108.00	\$63.74
E-ZPass - Off-Peak	\$21.60	\$22.95	No Discount	No Discount	No Discount	\$102.00	\$63.74
7 Axle Truck	\$28.00	\$29.75 E-ZPass/\$33.25 Toll-By-Plate	\$52.50	\$25.00 E-ZPass/\$33.75 Toll-By-Plate	\$42.00	\$147.00	\$124.00
E-ZPass - Peak	No Discount	No Discount	No Discount	No Discount	No Discount	\$136.00	\$76.46
E-ZPass - Off-Peak	\$25.20	\$26.78	No Discount	No Discount	No Discount	\$119.00	\$76.46

(1) All Commission toll bridges, other than the New Scudder Falls Bridge. Off-Peak = 9:01 PM to 5:59 AM (10% discount), effective July 1, 2011. Offers a frequent automobile rider E-ZPass discount of 40% (60 cents) for sixteen or more trips in a calendar month.

(2) Off-Peak = 9:01 PM to 5:59 AM (10% discount). Offers a frequent automobile rider E-ZPass discount of 40% Discount (75 cents) for sixteen or more trips in a calendar month.

(3) Commodore Barry Bridge (US 322); Walt Whitman Bridge (1-76); Ben Franklin Bridge (1-676); Betsy Ross Bridge (Rt. 90).

(4) Pennsylvania Turnpike Bridge.

(5) Tacony-Palmyra Bridge (Rt. 73); Burlington-Bristol Bridge (Rt. 413).

(6) George Washington and Goethals Bridges; Lincoln and Holland Tunnels; Outerbridge Crossing.

(7) Verrazano Narrows Bridge.

NOTE: Peak and Off-Peak times vary by agency. Toll rate information obtained from applicable agency's website on February 6, 2017.

## **E-ZPass System**

E-ZPass is an electronic toll collection system, which enables a driver of a vehicle who has a pre-paid toll account to pay tolls using an electronic transponder on the vehicle. The Commission completed the implementation of the E-ZPass system in 2003. The Commission uses Xerox State and Local to operate its Customer Service Center/Violation Processing Center. The Commission charges E-ZPass accounts a monthly \$1 account service fee.

The Commission provides an “off-peak” discount for trucks that utilize E-ZPass in the amount of 10%. The Commission also provides a discount for automobiles that utilize E-ZPass for 16 or more trips in a calendar month in the amount of 40%.

An analysis of the effect of use of the E-ZPass system on projected toll revenues has been prepared by the Commission’s Traffic Engineer. See APPENDIX A – “TRAFFIC AND REVENUE REPORT”.

## **All Electronic Tolling**

A description of the All Electronic Tolling system is set forth above under “THE PROJECT – All Electronic Tolling”. An analysis of the effect of use of the All Electronic Tolling system on projected toll revenues has been prepared by the Commission’s Traffic Engineer. See APPENDIX A – “TRAFFIC AND REVENUE REPORT”.

## **Historical Traffic and Revenue**

Certain historical information and projections summarized below and in Table 5A and Table 5B regarding traffic on and revenues from the seven currently existing toll bridges are taken from the Traffic and Revenue Report attached hereto as Appendix A and the Commission’s financial statements attached hereto as Appendix B. Table 5A and Table 5B on the following pages summarize toll traffic volume and toll revenues, as detailed in APPENDIX A – “TRAFFIC AND REVENUE REPORT”. Certain terms used in Table 5A and Table 5B are defined terms in the Indenture, but are not intended to have the specific meaning given to them in the Indenture and are used in their customary manner.

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**Table 5A**  
**Summary of Toll Traffic Volume**

<b><u>Toll Bridge</u></b>	<b><u>Total Toll Vehicles 2016 <sup>(1)</sup></u></b>	<b><u>Total Toll Vehicles 2015<sup>(2)</sup></u></b>	<b><u>Rate of Change 2015 to 2016</u></b>	<b><u>Total Toll Vehicles 2014<sup>(3)</sup></u></b>	<b><u>Rate of Change 2014 to 2015</u></b>
Trenton-Morrisville	9,002,000	8,627,000	4.35%	8,095,000	6.57%
New Hope-Lambertville	1,963,000	1,964,000	-0.03	1,955,000	0.45
I-78	12,040,000	11,737,000	2.58	11,351,000	3.40
Easton-Phillipsburg	5,416,000	5,233,000	3.50	4,700,000	11.34
Portland-Columbia	1,281,000	1,245,000	2.86	1,186,000	5.02
Delaware Water Gap	9,790,000	9,518,000	2.86	9,175,000	3.74
Milford-Montague	<u>1,341,000</u>	<u>1,319,000</u>	<u>1.66</u>	<u>1,255,000</u>	<u>5.05</u>
TOTAL	<u>40,833,000</u>	<u>39,643,000</u>	<u>3.00%</u>	<u>37,717,000</u>	<u>5.11%</u>

<sup>(1)</sup> Source: Year 2016 Unaudited Financial Statements of the Commission

<sup>(2)</sup> Source: Year 2015 Audited Financial Statements of the Commission

<sup>(3)</sup> Source: Year 2014 Audited Financial Statements of the Commission

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**Table 5B**  
**Summary of Toll Revenues**

<b><u>Toll Bridge</u></b>	<b><u>2016 Toll Revenues</u></b> <sup>(1)(2)</sup>	<b><u>2015 Toll Revenues</u></b> <sup>(3)</sup>	<b><u>Rate of Change 2015 to 2016</u></b>	<b><u>2014 Toll Revenues</u></b> <sup>(4)</sup>	<b><u>Rate of Change 2014 to 2015</u></b>
Trenton-Morrisville	\$16,055,000	\$15,494,000	3.62%	\$15,150,000	2.27%
New Hope-Lambertville	3,239,000	3,179,000	1.87	3,240,000	-1.87
I-78	61,860,000	60,500,000	2.25	58,723,000	3.03
Easton-Phillipsburg	9,534,000	8,658,000	10.12	8,331,000	3.94
Portland-Columbia	2,618,000	2,378,000	10.11	1,957,000	21.50
Delaware Water Gap	33,655,000	32,784,000	2.66	31,795,000	3.11
Milford-Montague	<u>1,688,000</u>	<u>1,648,000</u>	<u>2.39</u>	<u>1,586,000</u>	<u>3.90</u>
TOTAL	<u>\$128,649,000</u>	<u>\$124,641,000</u>	<u>3.22%</u>	<u>\$120,782,000</u>	<u>3.19%</u>

<sup>(1)</sup> Source: Year 2016 Unaudited Financial Statements of the Commission

<sup>(2)</sup> Unaudited 2016 Revenue includes Toll Violation Enforcement Revenue

<sup>(3)</sup> Source: Year 2015 Audited Financial Statements of the Commission

<sup>(4)</sup> Source: Year 2014 Audited Financial Statements of the Commission

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## Projected Results

Set forth below is a table that shows the projected debt service coverage ratio for the years ending December 31, 2017 through 2022. Certain terms used in the following table are defined terms in the Indenture, but are not intended to have the specific meaning given to them in the Indenture and are used in their customary manner.

	2017	2018	2019	2020	2021	2022
Revenues from Existing System <sup>(1)</sup>	\$131,200,000	\$132,300,000	\$133,300,000	\$134,300,000	\$135,300,000	\$136,400,000
Revenues from New Scudder Falls Bridge <sup>(2)</sup>	--	--	11,900,000	22,900,000	22,900,000	23,000,000
Total Revenues <sup>(1)(2)</sup>	<u>\$131,200,000</u>	<u>\$132,300,000</u>	<u>\$145,200,000</u>	<u>\$157,200,000</u>	<u>\$158,200,000</u>	<u>\$159,400,000</u>
Less Operations and Maintenance Costs <sup>(3)</sup>	<u>60,700,000</u>	<u>62,700,000</u>	<u>68,000,000</u>	<u>71,600,000</u>	<u>74,800,000</u>	<u>77,200,000</u>
Total Net Revenue	<u>\$70,500,000</u>	<u>\$69,600,000</u>	<u>\$77,200,000</u>	<u>\$85,600,000</u>	<u>\$83,400,000</u>	<u>\$82,200,000</u>
Estimated Net Debt Service <sup>(4)</sup>	\$36,145,281	\$36,631,160	\$40,654,154	\$47,536,084	\$47,573,228	\$48,463,314
Debt Service Coverage Ratio <sup>(5)</sup>	<b>1.95</b>	<b>1.90</b>	<b>1.90</b>	<b>1.80</b>	<b>1.75</b>	<b>1.70</b>

<sup>(1)</sup> Includes toll revenues, interest income and other miscellaneous income.

<sup>(2)</sup> Includes additional toll revenue from Trenton-Morrisville Toll Bridge.

<sup>(3)</sup> Does not include payments for other post-employment benefits.

<sup>(4)</sup> Debt service is net of capitalized interest.

<sup>(5)</sup> Ratio is not calculated pursuant to the terms of the Indenture.

Source: Traffic and Revenue Report; the Commission.

## RESULTS OF OPERATIONS AND ADDITIONAL COMMISSION INFORMATION

### Five Year Financial History

Table 6 and Table 7 below illustrate the financial history of the Commission for the five fiscal years ended December 31, 2012-2016. The Commission's financial statements are prepared on the accrual basis of accounting and in accordance with generally accepted accounting principles applicable to enterprise funds of state and local government units. The information for the years ended December 31, 2012-2015 has been derived from the audited financial statements of the Commission for the years then ended and the information for the year ended December 31, 2016 has been derived from the unaudited financial statements of the Commission. The audited financial statements for the years ended December 31, 2015 and 2014, together with the report therein of Zelenkofske Axelrod LLC, independent auditors, are set forth in Appendix B to this Official Statement. See "INVESTMENT CONSIDERATIONS" herein.

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Table 6 illustrates the historical toll revenue collections of the Commission for the five fiscal years ended December 31, 2012-2016. Certain terms used in Table 6 are defined terms in the Indenture, but are not intended to have the specific meaning given to them in the Indenture and are used in their customary manner.

**Table 6**  
**Historical Toll Revenue Collected**

<b><u>Fiscal Year</u></b>	<b><u>Trenton-Morrisville</u></b>	<b><u>New Hope-Lambertville</u></b>	<b><u>I-78</u></b>	<b><u>Easton-Phillipsburg</u></b>	<b><u>Portland-Columbia</u></b>	<b><u>Delaware Water Gap</u></b>	<b><u>Milford-Montague</u></b>	<b><u>Total</u></b>
2012	\$14,196,829	\$3,067,766	\$54,571,610	\$9,500,126	\$2,339,372	\$31,065,175	\$1,528,135	\$116,269,013
2013	14,692,101	3,157,203	56,263,012	9,397,916	2,137,349	31,669,051	1,547,985	118,864,616
2014	15,150,307	3,239,724	58,723,056	8,330,428	1,957,153	31,794,927	1,586,250	120,781,845
2015	15,493,946	3,179,090	60,499,430	8,658,273	2,377,940	32,783,796	1,648,090	124,640,565
2016*	16,055,530	3,238,651	61,859,612	9,534,450	2,618,282	33,655,355	1,687,559	128,649,439

\*Unaudited figures.

Source: Year 2012 to 2015 Audited Financial Statements and year 2016 Unaudited Financial Statements of the Commission

Table 7 illustrates the Commission's historical results of operations for the five fiscal years ended December 31, 2012-2016. Certain terms used in Table 7 are defined terms in the Indenture, but are not intended to have the specific meaning given to them in the Indenture and are used in their customary manner.

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**Table 7**  
**Historical Results of Operations**  
**Schedule of Operating Results**  
**Years Ended December 31,**

	<u>2012</u>	<u>2013</u>	<u>2014</u>	<u>2015</u>	<u>2016<sup>(1)</sup></u>
Net Toll Revenues	\$117,352,596	\$120,128,146	\$122,012,244	\$125,893,506	\$129,921,046
Expenses					
Operating and Maintenance	27,710,161	28,886,214	31,143,322	34,415,220	34,125,033
Administration	9,483,971	10,490,155	10,976,644	11,888,288	12,050,718
Toll-Supported Bridges	7,989,510	8,640,050	8,565,564	9,526,798	9,808,186
Total Expenses	45,183,642	48,016,419	50,685,530	55,830,306	55,983,937
Interest Income	1,905,002	1,667,335	1,819,264	1,497,193	1,303,150
Miscellaneous Income	144,747	13,544	4,065	11,126	164,821
Net Operating Revenue Available for Debt Service	74,218,703	73,792,606	73,150,043	71,571,519	75,405,080
Less: Debt Service	(33,238,877)	(32,751,799)	(30,027,114)	(30,088,745)	(29,029,986)
Funds Available for Transfer to Other Funds	40,979,826	41,040,807	43,122,929	41,482,774	46,375,094
Compact Authorized Investments Disbursements and Cost	(8,799,468)	(2,676,076)	(337,749)	-	-
Net Revenues (Expenses)	32,180,358	38,364,731	42,785,180	41,482,774	46,375,094
General Reserve Fund Balance	\$150,525,944	\$170,203,678	\$193,461,180	\$205,981,268	\$208,472,263
<b>Debt Service Coverage</b>	<u><b>2012</b></u>	<u><b>2013</b></u>	<u><b>2014</b></u>	<u><b>2015</b></u>	<u><b>2016<sup>(1)</sup></b></u>
<b>Years Ended December 31,</b>					
Net Operating Revenue Available for Debt Service	\$74,218,703	\$73,792,606	\$73,150,043	\$71,571,519	\$75,405,080
Debt Service	\$33,238,877	\$32,751,799	\$30,027,114	\$30,088,745	\$29,029,986
Debt Service Coverage Ratio <sup>(2)</sup>	2.23x	2.25x	2.44x	2.37x	2.60x

<sup>(1)</sup> Unaudited figures.

<sup>(2)</sup> Ratio is not calculated pursuant to the terms of the Indenture.

Source: Figures derived from year 2012 to 2015 Audited Financial Statements and year 2016 Unaudited Financial Statements of the Commission

## **Management's Discussion of Unaudited Results for Twelve Months Ended December 31, 2016**

Operating revenues, revenue available for operating expense, debt service and reserves for the Commission totaled \$129,921,046 for the year ended December 31, 2016, which represents an increase of 3.2% from the previous year. The increase in 2016 is primarily the result of a 3.0% increase in toll traffic.

Investment income, which represents earnings on all Commission investments and accounts other than those held in Construction Fund accounts, was \$1,303,150, which was \$194,043 lower than the amount earned during the twelve months of 2015.

Miscellaneous revenue, which represents a refund of previous year's expenses and other various fees, totaled \$164,821, which was \$153,695 higher than 2015.

Operating expenses in 2016 were \$55,983,937, which was \$153,631 or 0.28% higher than the prior year. The modest net increase in operating expense is reflective of a number of vacant positions during the year and savings generated from changes in the employee healthcare plan introduced at the beginning of 2016.

Net operating revenue available for debt service in 2016 was \$75,405,080, which was \$3,833,561 or 5.36% higher than the prior year. Debt service was \$29,029,986, which was \$1,058,759 or 3.52% lower than the prior year. The Commission's debt service coverage ratio was 2.60 times debt service cost as compared to 2.37 times in 2015.

### **General Reserve Fund Balances**

The Bonds are in part secured by the balances in the General Reserve Fund. Transfers are made to the General Reserve Fund from the Revenue Fund of monies remaining after meeting certain transfer requirements to various other Funds. See "SECURITY FOR THE BONDS – General Reserve Fund". As of December 31, 2016, the balance in the General Reserve Fund (unaudited) was \$208,472,260. As of December 31, 2015, the balance was \$205,981,268. See APPENDIX B – "FINANCIAL STATEMENTS OF THE COMMISSION FOR THE YEARS ENDED DECEMBER 31, 2015 AND 2014."

### **Personnel and Labor Relations**

As of December 31, 2016, the Commission employed 348 persons, 24 of whom are management employees. There are currently no collective bargaining organizations related to Commission employees. The civil service requirements applicable to each state government do not apply to employees of the Commission.

### **Retirement Plan and Other Post-Employment Benefit Liabilities**

Substantially all employees of the Commission are covered by the Commonwealth of Pennsylvania State Employees' Retirement System (the "Commonwealth Retirement System"). Employees of the Commission are required to pay between 5% and 6.25% of their salary into the Commonwealth Retirement System and the Commission is required to contribute at an actuarially determined rate. The current Commission contribution rate is 29.95% of the employees' salaries. Starting July 1, 2017, the new Commission contribution rate is 32.57%. The Commission's contributions to the Commonwealth Retirement System for the years ended December 31, 2016 and 2015 were \$4,328,725 and \$2,680,930, respectively.

The Commission also has six employees who participate in the State of New Jersey Public Employees Retirement System (the “New Jersey Retirement System”). The Commission’s contribution to the State of New Jersey Public Employees Retirement System for the years ended December 31, 2016 and 2015 were \$68,189 and \$65,852, respectively.

The Commission has included in its budget for Fiscal Year 2017 the amount of \$6,451,918 for contributions to the Commonwealth Retirement System and the New Jersey Retirement System.

The Commission provides certain post-retirement life and health insurance benefits to its qualified employees and their spouses and dependents under the Commission’s Retiree Health Benefits Plan (“Retiree Health Benefits Plan”) if they retire while working for the Commission and meet certain other eligibility criteria detailed below. In order to address liabilities for these other post-employment benefits (“OPEB”) and to pay the expenses of administering the Retiree Health Benefits Plan, the Commission established an irrevocable trust, the Delaware River Joint Toll Bridge Commission Section 115 OPEB Trust Fund (the “Trust”) in December 2009. The amount the Commission pays for the medical and life insurance premiums for retirees and spouses vary.

Eligibility for the Retiree Health Benefits Plan depends on date of hire. For employees hired prior to January 1, 1979, the required years of service at retirement is equal to 65 minus age times 2; for employees hired after January 1, 1979 but before December 31, 1994, the required years of service at retirement is equal to 70 minus age times 2; and employees hired after December 31, 1994 are eligible at the age of 55 with 25 years of service or 60 with 20 years of service. Service includes all service in state, county, or municipal pension systems within the State of New Jersey or the Commonwealth of Pennsylvania, with the last 5 years with the Commission. Employees with 25 years of service who retire before the age of 55 may elect to receive COBRA benefits until they are eligible for the Retiree Health Benefits Plan.

In 2008, the Commission implemented Government Accounting Standards Board Statement No. 45 (“GASB 45”) “Accounting and Financial Reporting by Employers for Other Post Employment Benefits Other Than Pensions (OPEB).” This statement requires employers to recognize annual OPEB cost equal to the annual required contribution and recognize the unfunded accrued actuarial liability over an amortization period of thirty years. Prior to 2008, expenditures for post-retirement benefits were recognized on a pay-as-you-go basis.

As of December 31, 2016 and 2015, one hundred sixty retired employees, respectively, were eligible for both life and health insurance benefits. An additional nine and ten retirees, respectively, were eligible for de minimis life insurance benefits only. The Commission's annual contribution requirement (“ARC”) to the Trust is paid by the Commission out of the General Reserve Fund at the discretion of the Commission and expensed according to the requirements of GASB 45. The ARC for 2016 was determined in the most recent actuarial report to be \$5,778,306 at an unfunded discount rate of 6%. The ARC for both 2014 and 2015 was \$5,541,134. The ARC for both 2012 and 2013 was \$6,550,462. The Commission made contributions to the Trust in the amount of \$11,082,268 in 2015, \$6,640,000 in 2014, \$6,660,000 in 2013 and \$10,000,000 in 2012. The Commission made no contribution in 2011 and 2016. As of the date of this Official Statement, the actuarial report calculating the ARC for 2017 has not been completed.

As of January 1, 2016, the actuarial value of assets in the Trust provided a funded ratio of 74% and its unfunded actuarial accrued liability (the “UAAL”) was \$26,429,510, using a 6% discount rate compounded annually and the entry age normal actuarial cost method. The UAAL is being amortized using a closed, level dollar amount over 30 years on a closed basis. The remaining amortization period at December 31, 2016 was 22 years. As of January 1, 2015, the actuarial value of assets in the Trust

provided a funded ratio of 74% of OPEB actuarial accrued liabilities. The out-of-pocket expenditures for year 2016 and 2015 were \$3,040,474 and \$3,226,293, respectively. The market value of the assets in the Trust was \$78,014,662 as of December 31, 2016.

For additional information regarding the Trust, including funding status and actuarial methods and assumptions, see Note 4 in APPENDIX B – “FINANCIAL STATEMENTS OF THE COMMISSION FOR THE YEARS ENDED DECEMBER 31, 2015 AND 2014.”

### **Board Policies**

In September 2003, the members of the Commission, by resolution, established a policy to maintain a minimum cash balance in the General Reserve Fund of an amount equal to the greater of \$80 million or fifteen percent of the Commission’s then current outstanding principal indebtedness.

In May 2011, the members of the Commission, by resolution, established a policy to maintain debt service coverage equal to or greater than 1.5 times annual debt service on all Outstanding Bonds.

Since the date of adoption of each policy, the Commission has satisfied the minimum cash balance and debt service coverage ratio. There is no assurance that the Commission will do so in the future. **Furthermore, each policy is subject to amendment or change at the Commission’s discretion, and neither policy is required to be maintained pursuant to the Indenture.**

## **INVESTMENT CONSIDERATIONS**

The Series 2017 Bonds are revenue obligations of the Commission which are payable solely from Net Revenues and other sources comprising the Trust Estate as provided in the Indenture. The following is a discussion of investment considerations that should be considered in evaluating an investment in the Series 2017 Bonds. This discussion does not purport to be either comprehensive or definitive. The order in which risks are presented is not intended to reflect either the likelihood that a particular event will occur or the relative significance of such an event. Moreover, there may well be other risks associated with an investment in the Series 2017 Bonds in addition to those set forth herein.

### **General**

The financial forecasts set forth in this Official Statement are based generally upon certain assumptions and projections as to estimated revenues and operating and maintenance expenses. See the Traffic and Revenue Report included as Appendix A to this Official Statement. Inevitably, some underlying assumptions and projections used to develop the forecasts will not be realized, and unanticipated events and circumstances may occur. Therefore, the actual results achieved during the forecast periods will vary from the forecasts, and such differences may be material.

### **Forward-Looking Statements**

The statements contained in this Official Statement that are not purely historical are forward-looking statements. See “FORWARD-LOOKING STATEMENTS” herein.

### **Risks Related to Construction of the Project**

*General.* As discussed in greater detail under “THE PROJECT”, the Commission has successfully procured and awarded the Construction Contract to the General Contractor. As of the date of this Official Statement, the Commission has not executed the Construction Contract. The construction of

the Project involves many risks that could result in cost overruns, delays or failure to complete the Project in its entirety. There is no assurance that the amount paid by the Commission to the General Contractor under the Construction Contract will not exceed \$396 million.

*Construction Delay.* The New Scudder Falls Bridge is comprised of twin spans. Upon completion of the first span of the New Scudder Falls Bridge, the Commission will commence operations and collect tolls via All Electronic Tolling for the New Scudder Falls Bridge in the southbound/westbound direction (New Jersey to Pennsylvania). If there is a delay in the completion of the first span of the New Scudder Falls Bridge, the Commission's ability to collect tolls will also be delayed. This risk is potentially mitigated by the fact that the Construction Contract includes a liquidated damages clause to compensate the Commission for potential lost revenue. See "THE PROJECT – Construction Contracts; Permits and Approvals."

*Cost Overruns.* While the Commission has included in its budget for the Project certain contingencies and allowances for overruns, it is possible that additional costs beyond what has been included in the budget will occur.

*Risks Related to Natural Disasters and Catastrophic Events.* A natural disaster, severe weather, or any other event that damages the New Scudder Falls Bridge during construction or after operation of one or both spans are completed could reduce toll revenues projected to be generated by the New Scudder Falls Bridge or significantly increase the expense of maintaining or restoring the New Scudder Falls Bridge. While these risks are generally covered by the Commission's insurance policies, to the extent not fully covered by insurance, the Commission's ability to repay Parity Obligations, including the Series 2017 Bonds, could be adversely affected.

## **Traffic and Revenue Report**

The Commission requested that Jacobs prepare the Traffic and Revenue Report. See APPENDIX A – "TRAFFIC AND REVENUE REPORT" attached hereto. The revenue forecasts contained in the Traffic and Revenue Report are based upon certain assumptions and limits set forth or incorporated therein which should be reviewed by potential investors to assure an understanding of some of the risks inherent in such estimates and projections. The Traffic and Revenue Report is not a guarantee of any future events or trends and the forecasts therein are subject to future economic and social conditions and demographic developments that cannot be predicted with certainty. Further, the estimates, projections and assumptions in the Traffic and Revenue Report are inherently subject to significant economic and competitive uncertainties and contingencies, many of which are beyond the control of the Commission. Failure to achieve or realize any of the assumptions listed in the Traffic and Revenue Report may have a materially adverse effect upon the Net Revenues actually realized by the Commission.

The information provided with respect to toll revenues collected by the Commission is based on historical data. The amount of future toll revenues to be collected by the Commission depends upon a number of factors, some of which are not in the control of the Commission. Some of these factors include a decline in traffic due to general economic conditions, fare evasion, diversion of traffic to alternative non-toll routes, increased fuel costs, limited supply of fuel, the availability of alternate forms of travel and shipping, and government regulations, such as Clean Air Act requirements, increased mileage standards or higher fuel taxes, which could significantly restrict motor vehicle use, as well as international events affecting fuel supply and costs.

In addition, with the implementation of All Electronic Tolling at the New Scudder Falls Bridge, the Traffic and Revenue Report discusses in detail the forecasting methodology for the All Electronic



Tolling system for non-E-ZPass customers and the estimates for potential revenue offsets attributable to the inability to collect tolls from the Toll-By-Plate customers.

### **Operating Risks**

When completed, the New Scudder Falls Bridge will be a new toll bridge having no previous tolling history. While not presently tolled, the Existing Scudder Falls Bridge is a heavily traveled, interstate crossing in operation since 1961. The ability of the New Scudder Falls Bridge to generate revenue will be subject to the risks inherent in the imposition of tolls on such bridge. The ability to generate revenue will be dependent, in part, on the volume of traffic that will continue to utilize the New Scudder Falls Bridge. Net Revenues will be influenced by numerous factors, including, among other things, the ability to manage toll evasion; the ability to control expenses; population, employment and income trends within the region; the congestion on alternative bridges; toll rates; and the availability and price of fuel. Unlike in the Commonwealth of Pennsylvania, the Commission is not authorized under New Jersey law to notify the NJDOT about unpaid tolls to seek to suspend a New Jersey motorist's vehicle registration.

### **Debt Service Reserve Fund**

As described above, although the Series 2017 Bonds will be designated as Debt Service Reserve Fund Bonds and will be secured by the Debt Service Reserve Fund, no Specific Series Only Account has been established in the Debt Service Reserve Fund for the Series 2017 Bonds. Specific Series Only Accounts have, however, been established in the Debt Service Reserve Fund for the Series 2005A Bonds, the Series 2007A Bonds and the Series 2012A Bonds. Amounts on deposit in such Specific Series Only Accounts are held by the Trustee solely for the benefit of the Owners of the specific series of Bonds for which such account has been created.

### **Certain Matters Relating to Enforceability of Obligations**

The remedies available to the holders of the Series 2017 Bonds upon the occurrence of an Event of Default under the Indenture are, in many respects, dependent upon regulatory and judicial actions that are often subject to discretion or delay. Under existing law and judicial decisions, including specifically the United States Bankruptcy Code, the remedies specified in the Indenture may not be readily available or may be limited. In addition, enforcement of such remedies (i) may be subject to general principles of equity which may permit the exercise of judicial discretion, (ii) are subject to the exercise in the future by the State of New Jersey and the Commonwealth of Pennsylvania of their rights to amend the Compact, subject to the approval of the United States Congress, where applicable, (iii) are subject, in part, to the provisions of the United States Bankruptcy Code and other applicable bankruptcy, insolvency, reorganization, moratorium or similar laws relating to or affecting the enforcement of creditors' rights generally, now or hereafter in effect, and (iv) are subject to the exercise by the United States of the powers delegated to it by the Constitution of the United States of America. The various legal opinions to be delivered concurrently with the delivery of the Series 2017 Bonds will be qualified to the extent that the enforceability of certain legal rights related to the Series 2017 Bonds is subject to limitations imposed by bankruptcy, reorganization, insolvency or other similar laws affecting the rights of creditors generally and by equitable remedies and proceedings generally.

### **Legislative Action**

Legislation may be enacted from time to time in the State of New Jersey and the Commonwealth of Pennsylvania, which may affect the Commission and/or the System. The Commission cannot predict

whether or not such legislation may affect the Commission and its ability to pay debt service on the Series 2017 Bonds.

### **Decline in Toll Revenues**

The information provided with respect to toll revenues collected by the Commission is based on historical data and projected revenues. The amount of future toll revenues to be collected by the Commission depends upon a number of factors, some of which are not in the control of the Commission. Some of these factors include a decline in traffic on the toll bridges due to general economic conditions, diversion of traffic to alternative non-toll routes, increased fuel costs, availability of alternate forms of travel and shipping, and government regulations, such as Clean Air Act requirements, increased mileage standards or higher fuel taxes, which could significantly restrict motor vehicle use. Although the Commission has covenanted in the Indenture that it will establish and maintain a schedule of Tolls for vehicular traffic over the System, and will collect Tolls, so that the Net Revenues of the System in each Fiscal Year will at all times be at least sufficient to meet certain debt service coverage ratios, there can be no assurance that the traffic on the System will continue to be sufficient for the Commission to generate the necessary revenues to meet its obligations under the Indenture.

### **Adverse Changes to Third-Party Financial Institutions**

Adverse changes in the financial condition of certain third-party financial institutions may adversely affect the Commission's financial position. Different types of investment and contractual arrangements may create exposure for the Commission to such institutions including: (i) risk to the Commission's investment portfolio due to defaults or changes in market valuation of the debt securities of such institutions; (ii) counterparty risk related to the Parity Swap Agreements used by the Commission to hedge its interest rate risks with respect to a portion of its Outstanding Bonds; and (iii) risk of rating changes of the Commission's credit enhancers or liquidity providers which may adversely affect the interest costs on the Commission's variable rate debt or render such variable rate debt unmarketable.

### **Failure to Remarket the Series 2007B-1 Bonds and the Series 2007B-2 Bonds**

The Series 2007B-1 Bonds and the Series 2007B-2 Bonds are subject to special mandatory purchase on May 1, 2017. If the Commission fails to remarket the Series 2007B-1 Bonds and Series 2007B-2 Bonds prior to such special mandatory purchase date, the Commission may be required to purchase such bonds with its own funds, or the Commission will be required to pay to the current holders of such bonds a higher interest rate and make principal payments over a three-year period. See "COMMISSION INDEBTEDNESS AND OTHER PARITY OBLIGATIONS – Parity Indebtedness – *Description of Series 2007B-1 Bonds and Series 2007B-2 Bonds.*"

### **Disruption of Capital Markets**

The credit markets may experience substantial disruption from time to time. There can be no assurance as to the timing of any such disruption or the extent of any recovery that may be made by the capital markets, and the effect on the Commission's capital program and remarketing of the Series 2007B-1 Bonds and the Series 2007B-2 Bonds.

### **Risks Associated With Parity Swap Agreements**

The Commission is currently not required to post collateral under the Series 2007B Swap Agreements. With respect to the Series 2007B Swap Agreements, the rating on the applicable Bonds would have to drop below "Baa2" from Moody's or below "BBB" from S&P for any collateral posting

requirements to be imposed upon the Commission under such agreements. If the Commission is required to post collateral under any such agreement, it could have a material adverse effect on the Commission's liquidity position.

The Commission is exposed to basis risk under the Series 2007B Swap Agreements as the variable rate received from the Counterparties under such Series 2007B Swap Agreements does not match the variable rate paid on the Bonds intended to be hedged by such Series 2007B Swap Agreements. There is also the risk of either Counterparty failing to make payments under the applicable Series 2007B Swap Agreement.

Each of the Series 2007B Swap Agreements provides that an automatic, immediate termination of such Agreement shall take place upon the occurrence of the dissolution, bankruptcy, insolvency, liquidation or any similar related events involving or related to the Counterparty under such Series 2007B Swap Agreement. If a Series 2007B Swap Agreement is automatically and immediately terminated as a result of any such event and the fair value of the Series 2007B Swap Agreement is negative to the Commission on the date of such automatic immediate termination, the Commission could be obligated to make a substantial termination payment to the Counterparty and the Commission's financial position could be materially adversely affected during the period in which such termination payment would be required to be paid by the Commission. See "COMMISSION INDEBTEDNESS AND OTHER PARITY OBLIGATIONS – Commission Payment Obligations Under Parity Swap Agreements" herein.

### **Costs of Construction of Projects Included in Capital Program**

In connection with the Project and the projects included in the Commission's Capital Program, there is a possibility of time delays and cost increases resulting from (i) design and construction problems and resulting change orders, (ii) environmental litigation or environmental administrative matters, (iii) the unavailability or cost of acquiring rights-of-way, (iv) archeological, historic and unidentified subsurface conditions, (v) utility relocation problems, (vi) hazardous materials, (vii) force majeure events, (viii) litigation, or (ix) inflation. As a result, there can be no assurance that the costs of completion for the Project or the other projects included in the Capital Program will not exceed current estimates, or that the completion of such projects will not be delayed beyond the scheduled completion date. Variations in cost estimates and delays in construction could be material.

There is also a possibility of insolvency or bankruptcy of the contractors during construction of the Project or one or more of the projects included in the capital improvement plan. While the contractors will be required to provide a performance bond and a payment bond, there can be no assurance that such bonds will be sufficient to assure timely completion of the Project or the other projects included in the Capital Program. Moreover, in the event that a default occurs under a construction contract by the contractor, there is a possibility of litigation between the Commission and the providers of the performance bonds and payment bonds and/or the contractor, which could further delay construction and the opening of the Project or the other projects included in the Capital Program. Any such delays and/or cost overruns could result in a substantial increase in the costs of the Capital Program.

### **Litigation and Other Actions Against the Commission**

The Commission is subject to certain pending litigation and may from time to time be subject to additional litigation and other actions in the future, any of which might adversely affect the Commission or the Project. The Commission cannot predict when or if any additional litigation or action might be brought against the Commission in the future, or whether any pending or potential future action would be successful or result in monetary damages or other relief being imposed upon the Commission. See "LITIGATION" herein.

## **Other Factors**

Additional factors which may affect the financial condition of the Commission and the future operation of the System include: (i) increased and/or unanticipated costs of operating the System; (ii) work stoppage, slowdown or action by Commission employees; (iii) more and expanded mass transit systems; (iv) natural disasters; (v) complete or partial destruction or temporary closure of the System for extended periods of time; (vi) increased pension costs, unfunded healthcare and other non-pension postemployment benefits; (vii) decreased toll revenues due to decline in traffic; (viii) cyber-attacks or other malicious activities; (ix) increased use of telecommuting, which leads to less traffic; and (x) increases in fixed costs.

## **LITIGATION**

### **General**

There is not now pending or threatened any litigation seeking to restrain or enjoin the issuance or delivery of the Series 2017 Bonds, questioning or affecting the validity of the Series 2017 Bonds or the Indenture, or the proceedings and authority pursuant to which the Series 2017 Bonds are to be issued, contesting the creation, organization or existence of the Commission or the title of the present members or other officers of the Commission to their respective offices or which might affect its ability to pay debt service or meet the Rate Covenant. Except as set forth below, there is not now pending or threatened any litigation which might materially adversely affect the financial condition of the Commission.

### **Harms Litigation**

On November 16, 2016, the Commission received correspondence from counsel for George Harms Construction Co, Inc. (“Harms”), a potential bidder with respect to constructing the Project. Harms challenged the inclusion of the Project Labor Agreement (“PLA”) (see “THE PROJECT – Project Contracts – *Construction Contract*” herein) in the bid specifications and demanded that the Commission either remove the PLA from the bid specifications or include The United Steel Workers, an organization with which Harms is affiliated, as part of the PLA. Counsel for Harms indicated that, if the Commission did not agree with Harms’ request, Harms would seek an injunction to prevent the Project from going forward.

On December 2, 2016, the Commission filed a Verified Complaint in the New Jersey Superior Court (the “Court”), seeking a declaratory judgment that the Commission was entitled to proceed with receipt of the bids and award the contract to construct the Project. In response, Harms filed a counterclaim for damages in connection with alleged violations of Harms’ constitutional rights (“Counterclaims”) and sought a preliminary injunction to prevent the receipt of bids. On January 5, 2017, the Court denied Harms’ application for a preliminary injunction. The Court found that Harms was unlikely to succeed on the merits of its claim and that the balancing of the equities favored the Commission, and ruled that the Commission was entitled to proceed with the receipt and opening of bids.

On January 26, 2017, Harms filed a motion for reconsideration with the Court, seeking to enjoin the award of the contract to the General Contractor and to extend the period of time for receipt of bids. On February 6, 2017, the Court again denied Harms’ application for injunctive relief, finding that Harms was unlikely to succeed on the merits of its action, and that the balancing of the equities favored the Commission. The Court’s decision is not subject to automatic appeal; however, nothing precludes Harms from seeking permission from the appellate court to appeal the denial of the preliminary injunction. An injunction, if granted after a successful appeal and reconsideration by the Superior Court, could impair the Project. The Commission cannot predict whether any further action will be taken and, if taken, the

outcome. The Harms litigation remains outstanding solely related to Harms' Counterclaims and no outcome to such litigation can be predicted at this time. The Commission, however, believes that such Counterclaims have no merit and intends to vigorously defend such Counterclaims. In addition, the Commission believes that resolution of the Counterclaims will not have any effect on the Commission's ability to enter into the Construction Contract and to construct the Project.

## **TAX MATTERS**

### **Federal Tax Exemption**

Co-Bond Counsel will deliver, concurrently with the issuance of the Series 2017 Bonds, their opinion to the effect that under existing statutes, regulations, rulings and court decisions, interest on the Series 2017 Bonds is excludable from the gross income of the holders of the Series 2017 Bonds for federal income tax purposes. Interest paid on the Series 2017 Bonds will not be treated as an item of tax preference for purposes of determining either individual or corporate alternative minimum taxable income; however, interest on the Series 2017 Bonds is included in determining the adjusted current earnings of corporations for purposes of computing the alternative minimum tax imposed on corporations. In addition, interest on the Series 2017 Bonds may be included in a foreign corporation's effectively connected earnings and profits upon which certain foreign corporations are required to pay the foreign branch profits tax imposed under Section 884 of the Internal Revenue Code of 1986, as amended (the "Code").

Certain maturities of the Series 2017 Bonds have been offered at a discount ("original issue discount") equal generally to the difference between public offering price and principal amount. For federal income tax purposes, original issue discount on a Series 2017 Bond accrues periodically over the term of the Series 2017 Bond as interest with the same tax exemption and alternative minimum tax status as regular interest. The accrual of original issue discount increases the holder's tax basis in the Series 2017 Bond for determining taxable gain or loss from sale or from redemption prior to maturity. Prospective purchasers of the Series 2017 Bonds should consult their tax advisors for an explanation of the treatment of original issue discount.

Certain maturities of the Series 2017 Bonds have been offered at a premium ("original issue premium") over their principal amount. For federal income tax purposes, original issue premium is amortizable periodically over the term of a Series 2017 Bond through reductions in the holder's tax basis for the Series 2017 Bond for determining taxable gain or loss from sale or from redemption prior to maturity. Amortizable premium is accounted for as reducing the tax-exempt interest on the Series 2017 Bond rather than creating a deductible expense or loss. Prospective purchasers of the Series 2017 Bonds should consult their tax advisors for an explanation of the treatment of original issue premium.

The Code imposes various restrictions, conditions and requirements relating to the exclusion from gross income for federal income tax purposes of interest on obligations such as the Series 2017 Bonds. Ongoing requirements include, among other things, the provisions of Section 148 of the Code which prescribe yield and other limits within which the proceeds of the Series 2017 Bonds are to be invested and which may require that certain excess earnings on investments made with the proceeds of the Series 2017 Bonds be rebated on a periodic basis to the United States. The Commission has made certain representations and undertaken certain agreements and covenants in the Indenture and in its tax compliance agreement to be delivered concurrently with the issuance of the Series 2017 Bonds designed to ensure compliance with the applicable provisions of the Code. The inaccuracy of these representations or the failure on the part of the Commission to comply with such covenants and agreements could result in the interest on the Series 2017 Bonds being included in the gross income of a holder for federal income tax purposes, in certain cases retroactive to the date of original issuance of the Series 2017 Bonds.

The opinion of Co-Bond Counsel assumes the accuracy of these representations and the future compliance by the Commission with its covenants and agreements. Moreover, Co-Bond Counsel has not undertaken to evaluate, determine or inform any person, including any holder of the Series 2017 Bonds, whether any actions taken or not taken, events occurring or not occurring, or other matters that might come to the attention of Co-Bond Counsel would adversely affect the value of, or tax status of the interest on, the Series 2017 Bonds.

Ownership of the Series 2017 Bonds may result in collateral federal tax consequences to certain taxpayers, including, without limitation, financial institutions, S corporations with excess net passive income, property and casualty companies, individual recipients of social security or railroad retirement benefits and taxpayers who may be deemed to have incurred indebtedness to purchase or carry the Series 2017 Bonds. Co-Bond Counsel will express no opinion with respect to these or any other collateral tax consequences of the ownership of the Series 2017 Bonds. The nature and extent of the tax benefit to a taxpayer of ownership of the Series 2017 Bonds will generally depend upon the particular nature of such taxpayer or such taxpayer's own particular circumstances, including other items of income or deduction. Accordingly, prospective purchasers of the Series 2017 Bonds should consult their tax advisors.

There can be no assurance that currently existing or future legislative proposals by the United States Congress limiting or further qualifying the excludability of interest on tax-exempt bonds from gross income for federal tax purposes, or changes in federal tax policy generally, will not adversely affect the tax status of the interest on, or the market for, the Series 2017 Bonds.

### **State Tax Exemption**

*Pennsylvania.* Dilworth Paxson LLP will also deliver an opinion to the effect that under existing law as enacted and construed on the date of such opinion, the Series 2017 Bonds are exempt from personal property taxes in Pennsylvania, and interest on the Series 2017 Bonds is exempt from the Pennsylvania personal income tax and the Pennsylvania corporate net income tax. Further, under the Compact and laws of the Commonwealth as presently enacted and construed, any profits, gains or income derived from the sale, exchange or other disposition of the Series 2017 Bonds will not be subject to Pennsylvania taxes within the Commonwealth.

*New Jersey.* Gibbons P.C. will also deliver an opinion to the effect that under existing law, interest on the Series 2017 Bonds and net gains from the sale of the Series 2017 Bonds are exempt from the tax imposed by the New Jersey Gross Income Tax Act.

*Other.* The Series 2017 Bonds and the interest thereon may be subject to state or local taxes in jurisdictions other than the Commonwealth of Pennsylvania and the State of New Jersey under applicable state or local tax laws.

**PROSPECTIVE PURCHASERS OF THE SERIES 2017 BONDS SHOULD CONSULT THEIR TAX ADVISORS WITH RESPECT TO THE FEDERAL, STATE AND LOCAL INCOME TAX CONSEQUENCES OF OWNERSHIP OF THE SERIES 2017 BONDS AND ANY CHANGES IN THE STATUS OF PENDING OR PROPOSED TAX LEGISLATION.**

### **Other Tax Matters with Respect to the Series 2017 Bonds**

Ownership of the Series 2017 Bonds may result in collateral federal tax consequences to certain taxpayers, including, without limitation, financial institutions, S corporations with excess net passive income, property and casualty companies, individual recipients of social security or railroad retirement benefits and taxpayers who may be deemed to have incurred indebtedness to purchase or carry the Series

2017 Bonds. Co-Bond Counsel will express no opinion with respect to these or any other collateral tax consequences of the ownership of the Series 2017 Bonds. The nature and extent of the tax benefit to a taxpayer of ownership of the Series 2017 Bonds will generally depend upon the particular nature of such taxpayer or such taxpayer's own particular circumstances, including other items of income or deduction. Accordingly, prospective purchasers of the Series 2017 Bonds should consult their own tax advisors.

Future legislation, if enacted into law, or clarification of the Code may cause interest on the Series 2017 Bonds to be subject, directly or indirectly, to federal income taxation, or otherwise prevent Beneficial Owners from realizing the full current benefit of the tax status of such interest. The introduction or enactment of any such future legislation or clarification of the Code may also affect the market price for, or marketability of, the Series 2017 Bonds. PROSPECTIVE PURCHASERS OF THE SERIES 2017 BONDS SHOULD CONSULT THEIR OWN TAX ADVISORS REGARDING ANY PROPOSED FEDERAL TAX LEGISLATION.

The opinions of Co-Bond Counsel are based on current legal authority, cover certain matters not directly addressed by such authorities, and represent Co-Bond Counsel's judgment as to the proper treatment of the Series 2017 Bonds for federal income tax purposes. The opinions are not binding on the Internal Revenue Service or the courts.

### **CONTINUING DISCLOSURE**

The Commission has undertaken to file annual financial information and operating data and notice of certain enumerated events, pursuant to a Continuing Disclosure Agreement for the Series 2017 Bonds in the form attached as Appendix E to this Official Statement. Digital Assurance Certification, L.L.C. is currently the Dissemination Agent for the Commission.

### **LEGALITY FOR INVESTMENT**

As provided by the Compact, the Series 2017 Bonds are authorized securities in which all state and municipal officers and bodies of the Commonwealth of Pennsylvania and the State of New Jersey, and all banks, bankers, trust companies, savings banks, savings and loan associations, investment companies and other persons carrying on a banking business, or insurance companies, insurance associations and other persons carrying on an insurance business, and all administrators, executors, guardians, trustees and other fiduciaries, and all other persons whatsoever who now or may hereafter be authorized to invest in bonds or other obligations of the Commonwealth of Pennsylvania or of the State of New Jersey may properly and legally invest funds, including capital belonging to them or within their control; and the Series 2017 Bonds are also securities which may properly and legally be deposited with and received by any state or municipal officer or agency of the Commonwealth of Pennsylvania and the State of New Jersey, for any purpose for which the deposit of bonds or other obligations either of the Commonwealth of Pennsylvania or of the State of New Jersey is now or may hereafter be authorized.

### **CERTAIN LEGAL MATTERS**

Legal matters relating to the authorization, issuance, sale and delivery of the Series 2017 Bonds are subject to the approval of Dilworth Paxson LLP, Philadelphia, Pennsylvania, and Gibbons P.C., Newark, New Jersey, Co-Bond Counsel, whose approving opinions in substantially the forms attached hereto as Appendix D will be delivered with the Series 2017 Bonds. Certain legal matters will be passed upon for the Commission by its Co-Counsel, Florio Perrucci Steinhart & Fader LLC, Phillipsburg, New Jersey, and Stradley Ronon Stevens & Young, LLP, Philadelphia, Pennsylvania, and for the Underwriters by their Co-Counsel, Cozen O'Connor, Philadelphia, Pennsylvania, and Gluck Walrath LLP, Red Bank, New Jersey. Certain other legal matters respecting the Series 2017 Bonds will be passed upon for the

Commission by Greenberg Traurig, LLP, Philadelphia, Pennsylvania, and McManimon, Scotland & Baumann, LLC, Roseland, New Jersey, Co-Disclosure Counsel.

### **FINANCIAL ADVISOR**

Phoenix Capital Partners, Philadelphia, Pennsylvania, has acted as financial advisor to the Commission in connection with the preparation of this Official Statement and the issuance of the Series 2017 Bonds. The financial advisor is not obligated to undertake, and has not undertaken to make, an independent verification or to assume responsibility for the accuracy, completeness or fairness of the information in this Official Statement.

### **INDEPENDENT AUDITORS**

The financial statements of the Commission for the years ended December 31, 2015 and 2014, included in Appendix B to this Official Statement, have been audited by Zelenkofske Axelrod LLC, independent auditors, as stated in their report with respect to such financial statements, which report also appears in Appendix B.

### **UNDERWRITING**

The Series 2017 Bonds are being purchased by the underwriters listed on the cover of this Official Statement (the “Underwriters”), for whom Merrill Lynch, Pierce, Fenner & Smith Incorporated is acting as representative. Subject to the terms and conditions set forth in a Bond Purchase Agreement with the Commission, the Underwriters have agreed to purchase the Series 2017 Bonds at a purchase price of \$471,108,749.86, which represents the par amount of the Series 2017 Bonds, plus net original issue premium in the amount of \$42,974,745.00 and less an Underwriters’ discount in the amount of \$2,115,995.14. The Bond Purchase Agreement for the Series 2017 Bonds provides that the Underwriters will purchase all the Series 2017 Bonds, if any are purchased. The Underwriters may change the initial offering prices from time to time, and may offer and sell the Series 2017 Bonds to certain dealers (including dealers depositing the Series 2017 Bonds into unit investment trusts certain of which may be sponsored or managed by the Underwriters) and others at prices lower than the initial offering prices. The Commission suggested to the Underwriters that they consider retaining the law firms of Cozen O’Connor and Gluck Walrath LLP (“Co-Underwriters’ Counsel”) in connection with the issuance of the Series 2017 Bonds. The ultimate selection of Co-Underwriters’ Counsel was an independent determination of the Underwriters.

Certain of the Underwriters have entered into distribution agreements with other broker-dealers (that have not been designated by the Commission as Underwriters) for the distribution of the Series 2017 Bonds at the original issue prices set forth on the inside cover page hereof. Such agreements generally provide that the Underwriters will share a portion of its underwriting compensation or selling concession with such broker-dealers.

### **RATINGS**

Moody’s, S&P and Fitch have assigned ratings of “A1”, “A” and “A+”, respectively, to the Series 2017 Bonds. Such ratings reflect only the respective views of such organizations, and an explanation of the significance of a rating may be obtained only from the rating agency furnishing the same. There is no assurance that such ratings will be retained for any given period of time or that they will not be revised downward or withdrawn entirely by Moody’s, S&P or Fitch, respectively, if in the judgment of any such rating agency, circumstances so warrant. Any such downward revision or withdrawal of such underlying ratings may have an adverse effect on the market price of the Series 2017 Bonds.



## **FORWARD-LOOKING STATEMENTS**

The statements and projections contained in this Official Statement and the Traffic and Revenue Report included as Appendix A to this Official Statement that are not purely historical are forward-looking statements, including statements regarding the Commission's expectations, hopes, intentions, strategies regarding the future. Readers should not place undue reliance on forward-looking statements. All forward-looking statements included in this Official Statement are based on information available to the Commission on the date hereof, and the Commission assumes no obligation to update any such forward-looking statements. It is important to note that the actual results of the System could differ materially from those in such forward-looking statements.

The forward-looking statements herein are necessarily based on various assumptions and estimates and are inherently subject to various risks and uncertainties, including risks and uncertainties relating to the possible invalidity of the underlying assumptions and estimates and possible changes or developments in social, economic, business, industry, market, legal and regulatory circumstances and conditions and actions taken or omitted to be taken by third-parties, including customers, contractors, suppliers, developers and operators of competing facilities, and legislative, judicial and other governmental authorities and officials. Assumptions related to the foregoing involve judgments with respect to, among other things, future economic, competitive and market conditions and future business decisions, all of which are difficult or impossible to predict accurately and many of which are beyond the control of the Commission. Any of such assumptions could be inaccurate and, therefore, there can be no assurance that the forward-looking statements included in this Official Statement would prove to be accurate.

## **CERTAIN RELATIONSHIPS**

Greenberg Traurig, LLP and McManimon Scotland & Baumann, LLC, Co-Disclosure Counsel, represent some of the Underwriters of the Series 2017 Bonds, from time to time, in matters unrelated to the issuance of the Series 2017 Bonds.

Two of the Underwriters of the Series 2017 Bonds, Merrill Lynch, Pierce, Fenner & Smith Incorporated and Morgan Stanley & Co., LLC, are affiliates of the Counterparties to the Series 2007B Swap Agreements.

## **MISCELLANEOUS**

All references to, quotations from, and summaries and explanations of the Compact, the 2015 Bridge Inspection Report, the Traffic and Revenue Report and the Indenture contained herein do not purport to be complete and reference is made to said laws and documents for full and complete statements of their provisions. The agreements of the Commission with the owners of the Series 2017 Bonds are fully set forth in the Indenture, and neither any advertisement of the Series 2017 Bonds nor this Official Statement are to be construed as constituting an agreement with the owners of the Series 2017 Bonds. So far as any statements are made in this Official Statement involving matters of opinion, whether or not expressly so stated, they are intended merely as such and not as representations of fact. Copies of the documents mentioned in this paragraph are on file at the office of the Commission in New Hope, Pennsylvania.

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The execution and delivery of this Official Statement have been duly authorized by the Commission.

DELAWARE RIVER JOINT TOLL BRIDGE  
COMMISSION

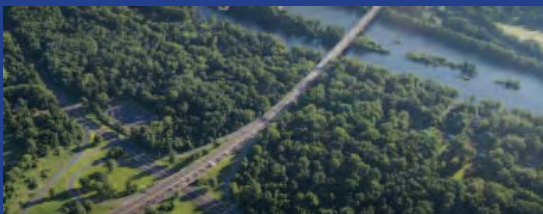
Date: February 14, 2017

By: /s/ Joseph J. Resta  
Joseph J. Resta,  
Executive Director

## **APPENDIX A**

### **TRAFFIC AND REVENUE REPORT**

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*Submitted to:*



# Long Term Traffic and Revenue Report

## Existing Toll Bridges & Scudder Falls Bridge

February 7, 2017

*Submitted by:*

**Jacobs Engineering Group Inc.**

5 Neshaminy Interplex, Hilton Dr., Suite 205  
Trevose, Pennsylvania 19053

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## EXECUTIVE SUMMARY

Jacobs Engineering Group, Inc. (“Jacobs”) was retained by the Delaware River Joint Toll Bridge Commission (the “Commission” or “DRJTBC”) to prepare Level 3 – Investment Grade Traffic and Revenue Forecasts for the tolling of the new Scudder Falls Bridge in the Pennsylvania-bound direction (southbound direction of I-95) and for the Commission’s seven (7) existing toll bridges which are tolled only in the Pennsylvania-bound (westbound) direction. The bridges span the Delaware River linking the states of New Jersey and Pennsylvania and provide services for local, daily commuters and commercial, through-traffic as well as many other travelers.

The DRJTBC does not collect tolls on the existing Scudder Falls Bridge, which is designated a “toll-supported” facility by the Commission. Therefore, separate approaches to the analyses documented in this report have been conducted: the approach to the new Scudder Falls Bridge with tolling, which has no direct tolling history, and the approach to the seven (7) existing toll bridges with tolling history. The different approaches are described independently in this report. The analyses overall, however, consider the entire system and are reflected in the results.

The conversion of the Scudder Falls Bridge from a toll-supported facility to a tolled facility would coincide with the replacement of the existing bridge which carries Interstate 95 over the Delaware River and has been in operation for over 55 years attaining an existing customer base. Tolls would be collected southbound using All Electronic Toll Collection (AET) technology, whereby customers will either pay tolls through E-ZPass or be identified by their license plate (“Toll-by-Plate”) and sent a toll invoice. Tolling for the southbound direction of travel is expected to begin on the Scudder Falls Bridge on June 1, 2019, after the anticipated completion of the first span on May 1, 2019. Traffic and revenue forecasts have been prepared with the Commission’s 9/26/16 approved set of toll rates for the years 2019 through 2026. In addition, Jacobs has estimated the toll collection costs with AET, and traffic and revenue effects of Scudder Falls Bridge tolling on the nearby Trenton-Morrisville Toll Bridge. To conduct the analysis for the new Scudder Falls Bridge, we used our traffic and toll revenue model developed in 2014 for our previous Scudder Falls Bridge Level 3 Study and updated it with the appropriate recent data and parameters.

To conduct the analysis for the seven (7) existing toll bridges, we used our traffic and toll revenue model developed for our forecasts presented in 2014 and updated it with the appropriate recent data and parameters. Jacobs analyzed historical traffic and toll revenue data for the existing toll bridges to determine historical trends; correlated traffic with key economic indicators; and researched demographic data and other key factors that have affected recent traffic patterns and that will affect future traffic behavior. The traffic and

revenue forecasts for the seven (7) existing toll bridges are based on the current toll and fee schedules. The data and analyses were used to develop a traffic and revenue model to estimate annual trips and gross toll revenue for the period through 2026.

The models have the ability to adjust projections based on toll rates, economic parameters by vehicle type, E-ZPass and commuter E-ZPass share, and various factors affecting the collectability of Toll-by-Plate tolls. The traffic and revenue projections presented in this report assume neither toll increases at the currently-tolled bridges, nor any toll increases at the Scudder Falls Bridge after tolling commences in 2019.

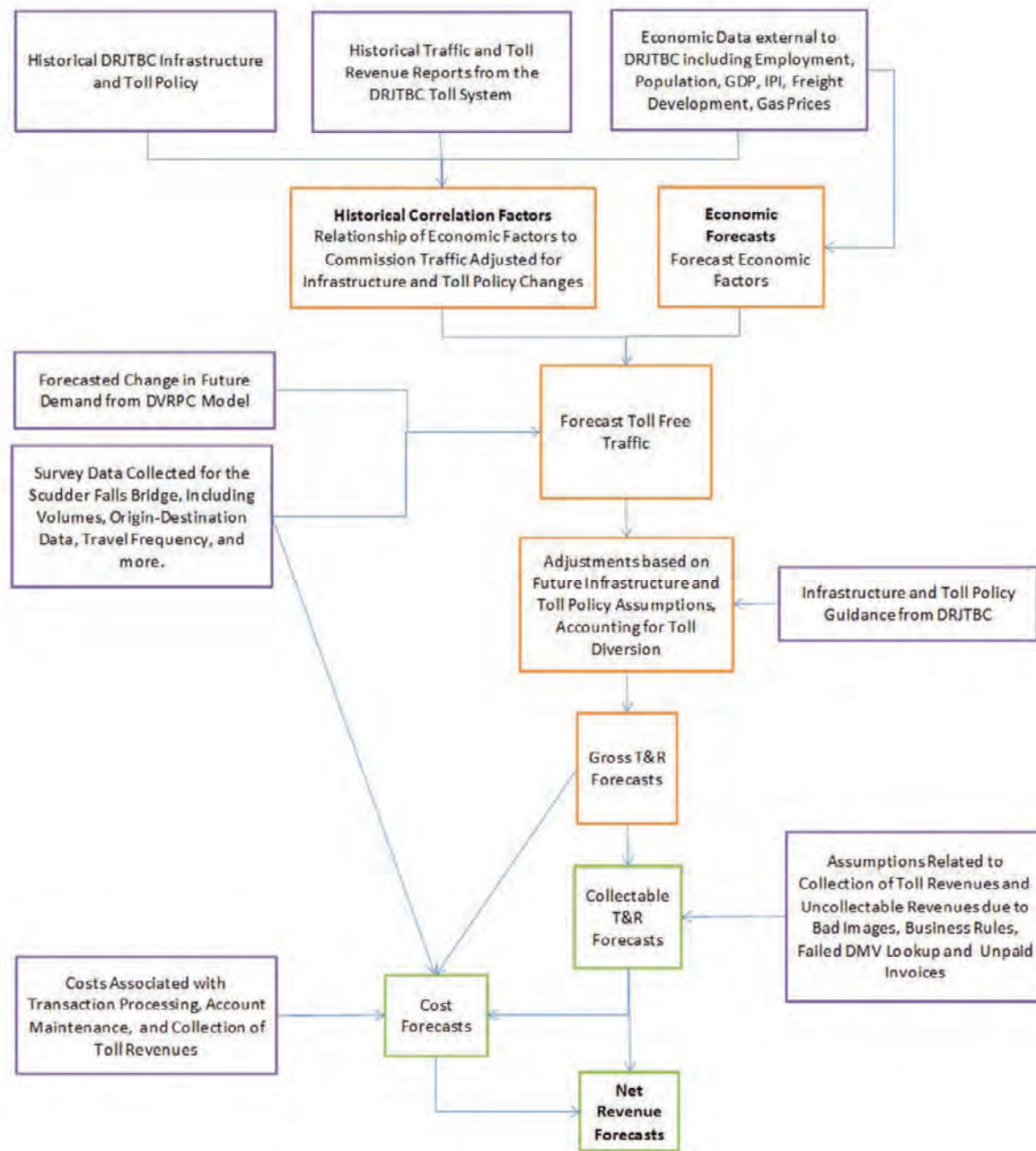
In preparing these Level 3 – Investment Grade Traffic and Revenue Forecasts, Jacobs developed modeling assumptions that are intended to achieve a 90 percent confidence level in the forecast. Expressed in simple terms, our goal is that the forecasted revenue levels would be achieved in nine of the ten years of the forecast.

This executive summary presents the results of our work efforts, including a review of the overall forecasting methodology and a presentation of the final forecasts. The work, analyses, and forecasts for the Commission are of investment-grade quality and are suitable for financing.

## **T&R Study Methodology**

Jacobs' forecasting model for the new Scudder Falls Bridge uses historical correlations between economic and demographic factors and adjusts those correlation factors for the forecast when structural changes in relationships become apparent, and then predicts background traffic growth as a function of forecasted economic and demographic factors. These forecasts were then adjusted to reflect the improvements to the Scudder Falls Bridge and to the nearby Pennsylvania Turnpike / I-95 Interchange based upon the Delaware Valley Regional Planning Commission (DVRPC) regional transportation model that had been run by DVRPC staff specifically for this purpose. Estimates of potential traffic diversion off of the Scudder Falls Bridge due to tolling were developed from the 2014 survey results and also from toll elasticity factors developed from Jacobs' experience with other toll facilities. These factors were then applied to determine the amount of traffic that would remain on the Scudder Falls Bridge based on the toll rates. Using actual data from other AET facilities, we estimated the factors that affect the collectability of Toll-by-Plate tolls (e.g., accounting for bad license plate images, bad addresses or DMV records, and the share of transactions paid on each level of invoicing) in order to calculate Toll-by-Plate revenues from tolls and late/violation fees. Toll collection costs were estimated and used to determine and justify the higher toll rate for Toll-by-Plate transactions. Figure ES-1 diagrams the Scudder Falls Bridge modeling process.

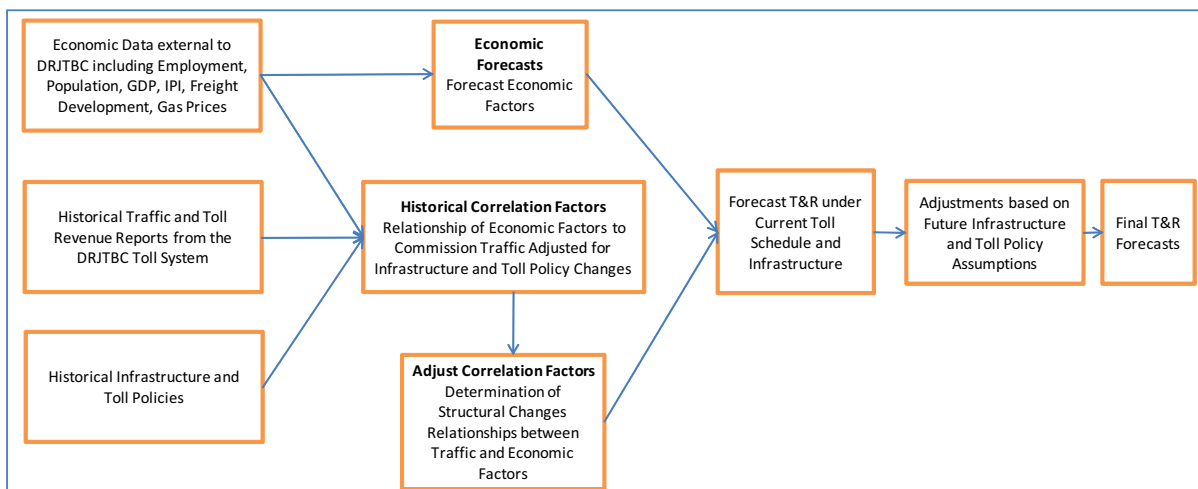
**Figure ES-1: Scudder Falls Bridge Model Methodology**





The forecasting model for the seven (7) existing toll bridges also uses historical correlations between economic and demographic factors and normalized traffic levels on the toll facilities by vehicle and payment class; adjusts those correlation factors for the forecast when structural changes in relationships are becoming apparent; and then predicts traffic as a function of forecasted economic and demographic factors. These forecasts are then adjusted to reflect DRJTBC and non-DRJTBC system infrastructure construction and improvement projects. Figure ES-2 diagrams the modeling process used for the existing toll bridges.

**Figure ES-2: DRJTBC Existing Toll Bridges Model Methodology**



The economic and demographic factors that were analyzed for the existing toll bridges include the following:

- Population by region
- Employment by region
- Real Gross Domestic Product (GDP) by region
- Industrial Production Index (IPI)
- Manufacturing levels by region
- Freight movement
- Gas prices
- National, regional, state vehicle miles traveled (VMT)
- Specific developments in the area of the bridges (housing, retail, etc.)
- Other demographic and socio-economic factors

Combining the forecast of economic factors and correlation factors provides DRJTBC traffic forecasts for existing infrastructure and toll policy. Population, GDP and IPI were considered to be the most relevant from our correlation analysis of traffic to demographic and socio-economic factors.

## **Toll Rates**

Jacobs' traffic and revenue model for the new Scudder Falls Bridge was used to test various toll rates to attempt to meet the Commission's revenue and tolling policy goals and to conduct the analyses. The toll rate schedule approved by the Commission on September 26, 2016 is shown in Table ES-1. This schedule meets the Commission's primary goal that the extra price charged to Toll-by-Plate customers would cover the additional costs incurred by Toll-by-Plate over E-ZPass transactions.



**Table ES 1: Scudder Falls Bridge Toll Rate Schedule-Approved September 26, 2016**

VEHICLE TYPE	
<b>Passenger Vehicles</b>	
Vehicles with up to two axles and less than 8-feet in height.	
<b>CLASS 1</b>	
2-axle Class 1 vehicle with <i>E-ZPass</i>	\$1.25
<i>E-ZPass</i> Class 1 Commuter Discount Toll	\$0.75
Discount available for customers with passenger-vehicle transponders issued by the New Jersey <i>E-ZPass</i> Group.	40% Discount credited to eligible <i>E-ZPass</i> equipped vehicles that record 16 or more trips during a calendar month.
2-axle Class 1 vehicle Toll-by-Plate	\$2.60
<b>Light Trucks</b>	
Vehicles with two axles and eight feet and above in height.	
<b>CLASS 2</b>	
2-axle Class 2 vehicle with <i>E-ZPass</i>	\$7.00
2-axle Class 2 vehicle with <i>E-ZPass</i> Off-Peak Discount	\$6.30
2-axle Class 2 vehicle Toll-by-Plate	\$8.35
<b>Heavy Trucks</b>	
Vehicle-types with three or more total axles.	
<b>CLASS 3</b>	
3-axle vehicle with <i>E-ZPass</i>	\$12.75
3-axle vehicle with <i>E-ZPass</i> Off-Peak Discount	\$11.48
3-axle vehicle Toll-by-Plate	\$14.25
<b>CLASS 4</b>	
4-axle vehicle with <i>E-ZPass</i>	\$17.00
4-axle vehicle with <i>E-ZPass</i> Off-Peak Discount	\$15.30
4-axle vehicle Toll-by-Plate	\$19.00
<b>CLASS 5</b>	
5-axle vehicle with <i>E-ZPass</i>	\$21.25
5-axle vehicle with <i>E-ZPass</i> Off-Peak Discount	\$19.13
5-axle vehicle Toll-by-Plate	\$23.75
<b>CLASS 6</b>	
6-axle vehicle with <i>E-ZPass</i>	\$25.50
6-axle vehicle with <i>E-ZPass</i> Off-Peak Discount	\$22.95
6-axle vehicle Toll-by-Plate	\$28.50
<b>CLASS 7</b>	
7-axle vehicle with <i>E-ZPass</i>	\$29.75
7-axle vehicle with <i>E-ZPass</i> Off-Peak Discount	\$26.78
7-axle vehicle Toll-by-Plate	\$33.25
Off-Peak Hours: 9:01 PM to 5:59 AM	
<i>E-ZPass</i> per-axle truck rate is \$4.25; Toll-by-Plate per-axle rate is \$4.75	
Class 1 Passenger vehicles with a trailer will be charged an additional \$1.00.	
Class 2 through Class 7 vehicles with a trailer and/or towed vehicle will be charged for the total combined axles at the current per axle rate.	
Vehicles with a fifth wheel/gooseneck trailer will be charged for the total combined axles at the current per axle rate.	

Jacobs' traffic and revenue model for the seven (7) existing toll bridges uses the current DRJTBC toll rates to conduct the analyses on these facilities. The current toll policy for the DRJTBC has been in effect since June 30, 2011 and the current toll rates at each of the seven (7) toll bridges are shown in Table ES-2.

**Table ES-2: Current DRJTBC Toll Rates**  
(tolls charged in the westbound direction only)

	Class	Cash and Full Fare E-ZPass		Discounted E-ZPass**		
		Trip	Multiplier over Class 1	Trip	Multiplier over Class 1	Trip Discount
Auto	1*	\$1.00		\$0.60		40%
Commercial	2	\$6.50	6.5	\$5.85	9.75	10%
	3	\$12.00	12	\$10.80	18	10%
	4	\$16.00	16	\$14.40	24	10%
	5	\$20.00	20	\$18.00	30	10%
	6	\$24.00	24	\$21.60	36	10%
	7	\$28.00	28	\$25.20	42	10%

\* Class 1 vehicles pulling trailers are charged \$2.00

\*\* There is a discount of 10% for off-peak travel for E-ZPass commercial vehicles, and 40% for autos at all time periods for 16 or more trips per month for those with NJ E-ZPass Regional Consortium accounts.

The current toll rate for Class 1 vehicles (2-axle automobiles) is \$1.00 at each of the seven (7) toll bridges. Class 2 vehicles (2-axle commercial trucks) are charged \$3.25 per axle or \$6.50 per trip. Classes 3 through 7 vehicles (3 to 7 axle commercial trucks) are assessed a rate of \$4.00 per axle.

## Forecasted Traffic and Revenue

Scudder Falls Bridge average annual daily traffic (AADT) forecasts with the approved toll rates are shown in Table ES-3. Also included in Table ES-3 is the additional traffic forecasted to cross the Trenton-Morrisville Bridge. With the onset of tolling of the Scudder Falls Bridge, some customers who had been avoiding the Trenton-Morrisville Bridge due to its toll (and thereby using the currently-free existing Scudder Falls Bridge) would switch their trip back to the Trenton-Morrisville Toll Bridge, thus increasing traffic and revenue on that bridge.

**Table ES-3: Scudder Falls Bridge Average Annual Daily Toll Traffic Forecasts**

Year	Scudder Falls Bridge AADT	Growth	Additional AADT on Trenton-Morrisville Bridge*
2019	27,624		1,805
2020	27,968	1.2%	1,761
2021	28,225	0.9%	1,751
2022	28,464	0.8%	1,743
2023	28,689	0.8%	1,740
2024	28,905	0.8%	1,736
2025	29,114	0.7%	1,744
2026	29,317	0.7%	1,750

*\*Traffic shift due to Scudder Falls Bridge tolling*

The forecasted revenues with the approved toll rate schedule, netting out the costs of toll collection, for the new Scudder Falls Bridge and additional traffic forecasted for the Trenton-Morrisville Bridge, are presented in Table ES-4.

**Table ES-4: Scudder Falls Bridge Net Revenues (\$millions per year)**

Year	SFB E-ZPass Tolls	SFB Toll-by-Plate Tolls	Total Collected SFB Toll Revenue	SFB TBP Viol. & Late Fees	TOTAL SFB REV	Trenton-Morrisville Add'l Toll Revenue*	TOTAL GROSS REVENUE	SFB Toll Collection Cost	NET REVENUE
2019	\$8.8	\$1.3	\$10.1	\$0.9	<b>\$10.9</b>	\$0.9	<b>\$11.9</b>	\$(2.4)	<b>\$9.5</b>
2020	\$15.8	\$3.4	\$19.1	\$2.2	<b>\$21.3</b>	\$1.6	<b>\$22.9</b>	\$(3.7)	<b>\$19.2</b>
2021	\$16.2	\$3.1	\$19.3	\$2.0	<b>\$21.3</b>	\$1.6	<b>\$22.9</b>	\$(3.5)	<b>\$19.4</b>
2022	\$16.6	\$2.9	\$19.5	\$1.8	<b>\$21.3</b>	\$1.6	<b>\$23.0</b>	\$(3.3)	<b>\$19.6</b>
2023	\$16.9	\$2.7	\$19.7	\$1.7	<b>\$21.4</b>	\$1.6	<b>\$23.1</b>	\$(3.2)	<b>\$19.9</b>
2024	\$17.2	\$2.6	\$19.9	\$1.7	<b>\$21.5</b>	\$1.7	<b>\$23.2</b>	\$(3.1)	<b>\$20.1</b>
2025	\$17.5	\$2.6	\$20.1	\$1.6	<b>\$21.7</b>	\$1.7	<b>\$23.3</b>	\$(3.0)	<b>\$20.3</b>
2026	\$17.7	\$2.5	\$20.3	\$1.6	<b>\$21.8</b>	\$1.7	<b>\$23.5</b>	\$(3.0)	<b>\$20.5</b>

*\*Due to traffic shifting to the Trenton-Morrisville Bridge from the Scudder Falls Bridge when it is tolled*

The estimates of future annual gross toll revenue for the DRJTBC's seven (7) existing toll bridges are presented in Table ES-5. The estimates of gross toll revenue are of a 90 percent confidence level suitable for financing.

The toll traffic and revenue forecasts were developed with the aid of a computerized modeling platform created specifically for the DRJTBC. The base function of this model is to take current traffic volumes by class and payment type for each DRJTBC toll facility and adjust them in the future years for various factors such as underlying socio-economic/demographic growth in the corridor.

**Table ES-5: DRJTBC Gross Toll Revenues in millions, 2016 to 2026**

Facility	Delaware River Joint Toll Bridge Commission - Toll Revenue Projections										
	2016	2017	2018	2019	2020	2021	2022	2023	2024	2025	2026
<b>Trenton-Morrisville</b>											
Cars	\$8.50	\$8.64	\$8.70	\$8.75	\$8.80	\$8.84	\$8.89	\$8.94	\$8.99	\$9.04	\$9.09
Trucks	\$7.56	\$7.53	\$7.59	\$7.71	\$7.83	\$7.95	\$8.08	\$8.21	\$8.34	\$8.47	\$8.61
<b>Total</b>	<b>\$16.06</b>	<b>\$16.17</b>	<b>\$16.29</b>	<b>\$16.46</b>	<b>\$16.63</b>	<b>\$16.79</b>	<b>\$16.97</b>	<b>\$17.15</b>	<b>\$17.33</b>	<b>\$17.51</b>	<b>\$17.70</b>
<b>New Hope-Lambertville</b>											
Cars	\$1.80	\$1.82	\$1.83	\$1.84	\$1.84	\$1.85	\$1.86	\$1.87	\$1.88	\$1.89	\$1.90
Trucks	\$1.44	\$1.45	\$1.47	\$1.49	\$1.51	\$1.53	\$1.55	\$1.57	\$1.59	\$1.61	\$1.63
<b>Total</b>	<b>\$3.24</b>	<b>\$3.27</b>	<b>\$3.30</b>	<b>\$3.33</b>	<b>\$3.35</b>	<b>\$3.38</b>	<b>\$3.41</b>	<b>\$3.44</b>	<b>\$3.47</b>	<b>\$3.50</b>	<b>\$3.53</b>
<b>I-78</b>											
Cars	\$9.63	\$10.52	\$10.64	\$10.74	\$10.85	\$10.96	\$11.07	\$11.18	\$11.29	\$11.40	\$11.52
Trucks	\$52.23	\$52.43	\$52.94	\$53.34	\$53.74	\$54.15	\$54.57	\$54.98	\$55.41	\$55.83	\$56.26
<b>Total</b>	<b>\$61.86</b>	<b>\$62.95</b>	<b>\$63.58</b>	<b>\$64.08</b>	<b>\$64.59</b>	<b>\$65.11</b>	<b>\$65.64</b>	<b>\$66.16</b>	<b>\$66.70</b>	<b>\$67.23</b>	<b>\$67.78</b>
<b>Easton-Phillipsburg</b>											
Cars	\$5.24	\$5.04	\$5.05	\$5.06	\$5.07	\$5.08	\$5.09	\$5.10	\$5.11	\$5.12	\$5.13
Trucks	\$4.29	\$4.23	\$4.24	\$4.25	\$4.25	\$4.26	\$4.27	\$4.28	\$4.29	\$4.30	\$4.31
<b>Total</b>	<b>\$9.53</b>	<b>\$9.27</b>	<b>\$9.29</b>	<b>\$9.31</b>	<b>\$9.32</b>	<b>\$9.34</b>	<b>\$9.36</b>	<b>\$9.38</b>	<b>\$9.40</b>	<b>\$9.42</b>	<b>\$9.44</b>
<b>Portland-Columbia</b>											
Cars	\$1.27	\$1.21	\$1.22	\$1.23	\$1.23	\$1.24	\$1.25	\$1.26	\$1.26	\$1.27	\$1.28
Trucks	\$1.35	\$1.28	\$1.29	\$1.29	\$1.30	\$1.30	\$1.31	\$1.31	\$1.32	\$1.32	\$1.32
<b>Total</b>	<b>\$2.62</b>	<b>\$2.49</b>	<b>\$2.51</b>	<b>\$2.52</b>	<b>\$2.53</b>	<b>\$2.54</b>	<b>\$2.56</b>	<b>\$2.57</b>	<b>\$2.58</b>	<b>\$2.59</b>	<b>\$2.60</b>
<b>Delaware Water Gap</b>											
Cars	\$8.47	\$8.92	\$9.03	\$9.11	\$9.19	\$9.28	\$9.36	\$9.44	\$9.53	\$9.62	\$9.71
Trucks	\$25.18	\$25.31	\$25.52	\$25.71	\$25.89	\$26.08	\$26.27	\$26.46	\$26.65	\$26.84	\$27.04
<b>Total</b>	<b>\$33.66</b>	<b>\$34.23</b>	<b>\$34.55</b>	<b>\$34.82</b>	<b>\$35.08</b>	<b>\$35.36</b>	<b>\$35.63</b>	<b>\$35.90</b>	<b>\$36.18</b>	<b>\$36.46</b>	<b>\$36.75</b>
<b>Milford Montague</b>											
Cars	\$1.28	\$1.31	\$1.31	\$1.31	\$1.32	\$1.32	\$1.32	\$1.33	\$1.33	\$1.33	\$1.33
Trucks	\$0.40	\$0.39	\$0.39	\$0.39	\$0.39	\$0.39	\$0.39	\$0.39	\$0.40	\$0.40	\$0.40
<b>Total</b>	<b>\$1.69</b>	<b>\$1.70</b>	<b>\$1.70</b>	<b>\$1.70</b>	<b>\$1.71</b>	<b>\$1.71</b>	<b>\$1.71</b>	<b>\$1.72</b>	<b>\$1.73</b>	<b>\$1.73</b>	<b>\$1.73</b>
<b>Legacy Toll Bridges - SubTotal</b>											
Cars	\$36.19	\$37.46	\$37.78	\$38.04	\$38.30	\$38.57	\$38.84	\$39.12	\$39.39	\$39.67	\$39.96
Trucks	\$92.46	\$92.62	\$93.44	\$94.18	\$94.91	\$95.66	\$96.44	\$97.20	\$98.00	\$98.77	\$99.57
<b>Total</b>	<b>\$128.65</b>	<b>\$130.08</b>	<b>\$131.22</b>	<b>\$132.22</b>	<b>\$133.21</b>	<b>\$134.23</b>	<b>\$135.28</b>	<b>\$136.32</b>	<b>\$137.39</b>	<b>\$138.44</b>	<b>\$139.53</b>
<b>Scudder Falls</b>											
Toll Revenue				\$10.06	\$19.12	\$19.31	\$19.49	\$19.68	\$19.88	\$20.07	\$20.27
Late Fees				\$0.87	\$2.20	\$2.00	\$1.85	\$1.74	\$1.65	\$1.60	\$1.55
Trenton-Morrisville Additional Revenue				\$0.94	\$1.61	\$1.62	\$1.63	\$1.64	\$1.65	\$1.67	\$1.68
Adtl Costs				-\$2.42	-\$3.72	-\$3.49	-\$3.32	-\$3.20	-\$3.11	-\$3.05	-\$3.01
<b>Total</b>				<b>\$9.46</b>	<b>\$19.22</b>	<b>\$19.44</b>	<b>\$19.65</b>	<b>\$19.86</b>	<b>\$20.07</b>	<b>\$20.29</b>	<b>\$20.50</b>
<b>All Toll Bridges</b>											
<b>Total</b>	<b>\$128.65</b>	<b>\$130.08</b>	<b>\$131.22</b>	<b>\$141.68</b>	<b>\$152.43</b>	<b>\$153.67</b>	<b>\$154.93</b>	<b>\$156.18</b>	<b>\$157.46</b>	<b>\$158.73</b>	<b>\$160.03</b>

Note: 2016 data shown is unaudited.

## 1.0 INTRODUCTION

Jacobs Engineering Group, Inc. (“Jacobs”) was retained by the Delaware River Joint Toll Bridge Commission (the “Commission” or “DRJTBC”) to prepare Level 3 – Investment Grade Traffic and Revenue Forecasts for the tolling of the new Scudder Falls Bridge and the Commission’s seven (7) existing toll bridges. All tolls are one-way, in the Pennsylvania-bound direction, which is considered “westbound” for the existing toll bridges and “southbound” for the Scudder Falls Bridge because it is located on I-95, a north-south interstate route. The bridges span the Delaware River linking the states of New Jersey and Pennsylvania and provide services for local, daily commuters and commercial, through-traffic as well as many other travelers.

The ‘new’ Scudder Falls Bridge will be a replacement of the existing bridge carrying Interstate 95 over the Delaware River which has been in operation for over 55 years and as such, already has an existing customer base. Tolls would be collected southbound using All Electronic Toll Collection (AET) technology, whereby customers will either pay tolls through E-ZPass or be identified by their license plate (“Toll-by-Plate”) and sent a toll invoice. Tolling for the southbound direction of travel is expected to begin on the bridge on June 1, 2019, after the anticipated completion of the first span on May 1, 2019. Traffic and revenue forecasts have been prepared with the Commission’s approved set of toll rates for the years 2019 through 2026. In addition, Jacobs has estimated the toll collection costs with AET, and traffic and revenue effects of Scudder Falls Bridge tolling on the nearby Trenton-Morrisville Toll Bridge.

The DRJTBC does not collect tolls on the existing Scudder Falls Bridge, which is designated a “toll-supported” facility by the Commission. The conversion of this bridge from a toll-supported facility to a tolled facility would coincide with the completion of the first (southbound) span of the new Scudder Falls Bridge, a wider bridge with improvements to the approaches and adjacent interchanges.

Jacobs conducted extensive research into the most relevant historic and forecasted socio-economic parameters in order to make a viable estimate of future traffic and toll revenues. We analyzed historical traffic and toll revenue data for the Commission’s existing toll facilities to determine historical trends; correlated traffic with key economic indicators; and researched demographic data and other key factors that have affected recent traffic patterns and that will affect future traffic behavior. A complete set of available traffic and economic data, including historical trips and toll revenue data, were compiled from the DRJTBC for all toll trips on the Commission’s existing toll facilities by month, detailing payment type and vehicle class.

The traffic and revenue model developed for the DRJTBC's seven (7) existing toll bridges with resulting toll trips and toll revenue projections was based on historical traffic and toll revenue data through the full year 2015. As part of the analysis, a static trend line-based traffic and toll revenue model was developed which has the ability to adjust projections based on various economic parameters and is segmented by vehicle class and payment type. The traffic and revenue projections presented in this report assume neither toll increases at the currently-tolled bridges, nor any toll increases at the Scudder Falls Bridge after tolling commences in 2019.

The work, analyses and results presented herein for the new Scudder Falls Bridge and the seven (7) existing toll bridges are of investment-grade quality and are suitable for financing.

## **1.1 History of Jacobs' Tolling Analyses**

Jacobs completed a Traffic and Revenue Study for the Commission in 2009. This study consisted of two parts: (1) a ten-year forecast of traffic and revenue for the Commission's seven (7) existing toll bridges, of investment-grade quality and suitable for financing; and (2) Level 2 traffic and revenue estimates for the proposed tolling of the currently toll-supported Scudder Falls Bridge.

As part of the Level 2 study, we also conducted a tolling policy forum with the Commission in October 2008 in regards to the various policies associated with AET (Toll-by-Plate and E-ZPass tolling), and developed a basic set of policy and business rules including toll rates and how to define and handle violators; the Commission made some policy decisions based on these.

In 2011, Jacobs completed a toll diversion study for the Scudder Falls Bridge to determine the effects of widening and tolling this bridge on other area facilities. This study helped support the favorable Record of Decision by the National Environmental Policy Act (NEPA) for the planned replacement bridge.

In 2014, Jacobs held another tolling policy forum to discuss and update the Commission's goals related to AET and the tolling of the new Scudder Falls Bridge. We then completed a Level 3 investment-grade traffic and revenue study for the seven (7) existing toll bridges and a separate Level 3 study for the new Scudder Falls Bridge. The new Scudder Falls Bridge study involved a large survey and data collection effort by Jacobs, as well as detailed estimates of costs and un-collectability of revenues related to AET.

This current study updates the previous Scudder Falls Bridge study with recent data, socioeconomic inputs, policy decisions made at a third tolling policy forum held in March

2016, and the September 2016 approved toll schedule for the Scudder Falls Bridge. The current study also incorporates updates to the March 2014 long term traffic and revenue study of the seven (7) existing toll bridges.

There have been no institutional changes in the roadway network since these earlier studies have been conducted; the data used in this study are recent and sufficient for use in this Investment-grade analysis.

## **1.2 Existing Toll Bridges Analyses**

This section describes the approach to the analyses of the seven (7) existing toll bridges under jurisdiction of the DRJTBC.

The forecasting model uses historical correlations between economic and demographic factors and normalized traffic levels on the Commission's toll facilities by vehicle and payment class, adjusts those correlation factors for the forecast when structural changes in relationships are becoming apparent, and then predicts traffic as a function of forecasted economic and demographic factors. These forecasts are then adjusted to reflect DRJTBC and non-DRJTBC system infrastructure construction and improvement projects.

## **1.3 Scudder Falls Bridge Analyses**

This section of the report discusses the approach to the analyses of the new Scudder Falls Bridge, a replacement of the currently non-tolled bridge over the Delaware River with a wider bridge including improvements to the approaches and adjacent interchanges, which will be tolled in the southbound direction.

### **1.3.1 General Work Scope**

The existing Scudder Falls Bridge opened in 1961 and has over 55 years of traffic history. The customer base for this bridge already exists, and we have used the extensive historical traffic data as a starting point for our analyses.

There is, however, no history of tolling on the Scudder Falls Bridge, and tolling is planned to be all-electronic tolling collection (AET) with no cash payment option. As part of this study, we built upon our Level 2 and Level 3 traffic and revenue studies completed previously.

To satisfy the objectives of a Level 3, investment-grade study, it is necessary to develop a full understanding of the patrons of the existing Scudder Falls Bridge – such as where they reside, how often they use the facility, and how they would potentially pay their tolls. The group of customers that is likely to choose Toll-by-Plate over E-ZPass in an AET

environment would come from the existing motorists that do not have a transponder and, therefore, it is very important to determine the travel characteristics of these customers.

Jacobs developed the model for the Scudder Falls Bridge based on the most recent traffic data available from the Commission, plus the results of an extensive recent data collection effort performed by Jacobs for this project in 2014. Data collected and incorporated into the model included traffic volumes segmented by class of vehicle, direction of travel, and time and day of travel.

To estimate the impact of tolling the Scudder Falls Bridge, Jacobs reviewed historical traffic and revenue data from nearby DRJTBC toll facilities to understand past trends. Jacobs also correlated historical traffic data with key economic indicators and researched relevant demographic and other factors that have affected recent traffic patterns and that may affect future driver behavior. In addition, results from the Delaware Valley Regional Planning Commission (DVRPC), who ran their regional transportation model as part of the Jacobs team for the previous study in 2014, were used to estimate the effects of widening the Scudder Falls Bridge and the completion of a new I-95/Pennsylvania Turnpike interchange on Scudder Falls Bridge traffic volumes. Jacobs used this information and associated analyses to develop a traffic and revenue model to estimate annual trips, gross toll revenue, fee revenue, and toll collection costs on the Scudder Falls Bridge from 2019 to 2026.

### **1.3.2 Data Sources**

Jacobs compiled historical traffic and revenue data from the DRJTBC toll facilities through early 2016. In addition, as part of our investment-grade traffic and revenue study in 2014, Jacobs had conducted an extensive data collection program in and around the Scudder Falls Bridge specifically for this project. As there have been no institutional changes in the roadway network or socio-economic parameters in the past 2 years, these data collected are recent and sufficient for use in this Investment-Grade analysis. Data collection included:

- hourly traffic counts,
- license plate surveys,
- counts of vehicles equipped with E-ZPass,
- travel time surveys, and
- Scudder Falls Bridge customer characteristic surveys via Jacobs-designed online surveys.

A review by Jacobs revealed that there have not been any major changes to the regional transportation network, land use, or socio-economic parameters in the past two years;



therefore, no further field surveys were performed. The results of these data collection efforts have been incorporated into Jacobs' traffic and revenue forecasting model, and are discussed and presented herein.

### **1.3.3 Policy Workshop / Discussion**

A new AET tolling policy forum was conducted with DRJTBC on March 22, 2016 to revisit and revise the policy decisions for AET made in the October 2008 and January 2014 policy forums. Choices on policy can significantly influence toll revenues; for example, the inclusion of a higher rate for Toll-by-Plate vehicles. We worked with the DRJTBC staff to determine the most likely scenario(s), and incorporated these in the development of the Investment Grade Analysis for the Scudder Falls Bridge.

### **1.3.4 Operating Costs for AET**

We researched and compiled data from the NJ E-ZPass Regional Consortium (a group of regional E-ZPass agencies) and existing AET facilities, as well as the Commission's collection costs on its current toll bridges, in order to arrive at estimated operating costs for AET so that the Commission can prepare its budget and potential associated fee structure, and also to estimate expenses that the Commission would want to recover through a higher toll rate charged to Toll-by-Plate customers. These resulting estimated toll collection operating costs allowed us to calculate net toll revenues for the Scudder Falls Bridge.

### **1.3.5 Scudder Falls' Model Development**

Because the existing Scudder Falls Bridge is not currently tolled, it is not suited to a typical trend line analysis for forecasting purposes. In addition, the new Scudder Falls Bridge will be an AET facility with no cash toll collection. Because of these factors, a much more comprehensive analysis of the facility was required to achieve the depth and quality of report required for an investment-grade study.

In order to determine future background growth (i.e., growth in traffic without tolling or any other changes), Jacobs used historical DRJTBC traffic data, correlated it to Gross Domestic Product (GDP) and Industrial Production Index (IPI), then used forecasts of future GDP and IPI to estimate traffic growth rates. We used results from the regional DVRPC model as run by DVRPC staff to estimate traffic changes due to the replacement of the Scudder Falls Bridge with a wider bridge, and also due to the new I-95/Pennsylvania Turnpike interchange.

Estimates of toll diversions from previous Jacobs studies were refined based on differences in Pennsylvania-bound vs. New Jersey-bound traffic in the area, travel times using the Scudder Falls Bridge versus alternative crossings, and origin-destination patterns from the

online survey results. Survey data was also used to develop a customer profile, such as state of vehicle registration and frequency of travel, which enables us to estimate the number of Toll-by-Plate toll accounts and the number of invoices to be mailed to customers.

Data on Toll-by-Plate collection costs and uncollectable revenues from existing AET facilities throughout the country were incorporated into our models. As part of the Tolling Policy, DRJTBC chose to set the Toll-by-Plate rate to cover the additional cost of collecting these types of tolls over the cost of collecting E-ZPass tolls. Part of our modeling process was to estimate this Toll-by-Plate rate. In addition, a \$5 late fee will be charged on the second bill (regardless of the number of toll transactions) to all customers who did not pay their first invoice within 30 days. A \$30 violation fee per transaction will be imposed on the third Toll-by-Plate invoice if the first two invoices are not paid, which is consistent with the Commission's current violation fee. The revenues from late and violation fees were also estimated by Jacobs for each year of the forecast.

Our model is segmented by vehicle classification (truck vs. passenger car), travel frequency, and payment type. It is important to note that there may be some customers currently utilizing the existing Scudder Falls Bridge simply because it is free; once tolling is introduced it is probable that some of them will move to other tolled facilities such as the Trenton-Morrisville Toll Bridge because it is cheaper or more convenient than a tolled Scudder Falls Bridge. Jacobs has developed estimates of the shift of traffic from the future-tolled Scudder Falls Bridge to the Trenton-Morrisville Toll Bridge, and the additional revenue this produces at the Trenton-Morrisville Toll Bridge.

The work, analyses, and results for the DRJTBC included in this report are of investment-grade quality and are suitable for financing. The background and methodology for Jacobs' traffic and toll revenue projections for the DRJTBC are presented herein.

## 1.4 Report Structure

The following is a brief outline of the remaining chapters in this report:

- Introduction and History of Jacobs' Tolling Analyses for the Commission
- Description of the Bridges
  - DRJTBC's Existing Seven Toll Bridges
  - Scudder Falls Bridge
- Historical Traffic and Revenues for Existing Seven Toll Bridges
- Analysis of Collected Data for Scudder Falls Bridge
- Economic Backdrop and Outlook for the Future

- Toll Traffic and Toll Revenue Forecasts
  - DRJTBC's Existing Seven Toll Bridges
  - Scudder Falls Bridge
- Toll Operation Costs and Uncollectable Tolls
- Net Revenues and Debt Service Coverage Ratios.

## **2.0 THE TOLL BRIDGES**

This section of the report provides a description of the toll bridges under study.

### **2.1 DRJTBC's Existing Seven Toll Bridges**

This section of the report provides a description of the DRJTBC seven (7) existing toll bridges, along with a historical overview of the toll collection on the DRJTBC, and is followed by a description of the existing toll rate schedule.

#### **2.1.1 Description of DRJTBC Existing Seven Toll Bridges**

The DRJTBC owns and operates 20 bridges that span the Delaware River linking the states of New Jersey and Pennsylvania. They are located from as far south as the Bucks County, PA – Philadelphia line to as far north as the New York State border. Figure 2-1 provides an overview of all DRJTBC facilities, which range in utilization from a pedestrian-only bridge crossing the river to the I-78 Toll Bridge that supports over 60,000 daily crossings. Seven (7) of these bridges are tolled and comprise a unique mix of local and through crossings. This unique mix of facilities provides service for local, daily commuters and commercial, through-traffic crossing the Delaware River, as well as many other travelers. For all the toll bridges, tolls are collected in the westbound direction only.

I-78 and I-80 (Delaware Water Gap) are major east-west corridors for long distance truck traffic. I-95 (Scudder Falls) is a major north-south corridor that also includes a significant mix of local commuting traffic between Trenton and the Bucks County suburbs of Philadelphia. Many of the remaining facilities also have components of traffic that include commuting and recreational trips.

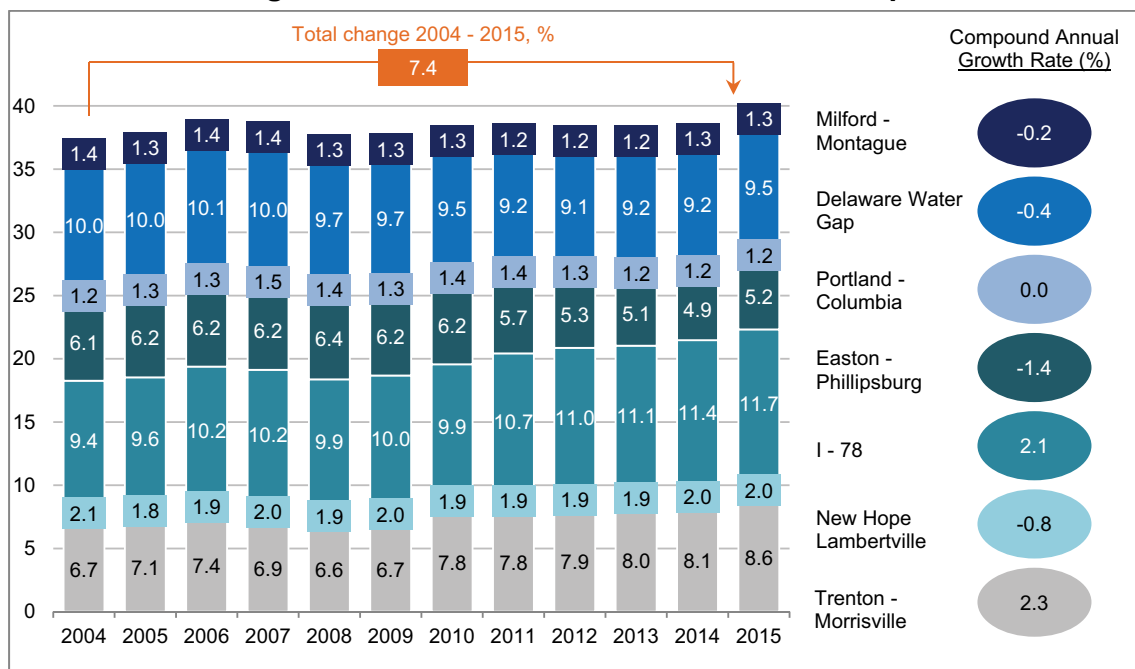
**Figure 2-1: DRJTBC System**



Source: DRJTBC

Figure 2-2 displays annual toll traffic on the seven DRJTBC bridges that collect tolls. As shown in the figure, the I-78, Delaware Water Gap, and Trenton-Morrisville toll facilities attract the most toll traffic. Total toll traffic on all toll bridges increased by a total of 7.4 percent from 2004 to 2015, but growth was not distributed equally among the toll bridges. Of the seven toll facilities, only the Trenton-Morrisville and the I-78 bridges experienced increases in toll traffic over the twelve-year period.

**Figure 2-2: Annual Toll Traffic, Millions of Toll Trips**



## 2.1.2 Toll Collection Historical Overview

On each of the seven (7) existing toll bridges, tolls are collected in the westbound (Pennsylvania-bound) direction only, at toll plazas located on the Pennsylvania side of the Delaware River except for the Easton-Phillipsburg Toll Bridge where the toll plaza is located in New Jersey. Tolls are assessed based on the classification of each vehicle and the payment type. When the first toll bridge opened to traffic in 1938, tolls were collected manually via cash payment or in the form of commutation tickets that provided discounts to frequent bridge users. In the early 1970s, the Commission began utilizing automated coin and token collection devices at its toll plazas in an effort to increase vehicle throughput, with the tokens replacing the original commutation tickets.

However, beginning in 2002, the Commission began implementing transponder-based electronic toll collection in the form of E-ZPass at each of its seven (7) existing toll bridges. Although toll lane gates were installed at each toll plaza, the introduction of E-ZPass as a payment method significantly increased vehicle throughput over previous automated coin and token machines.

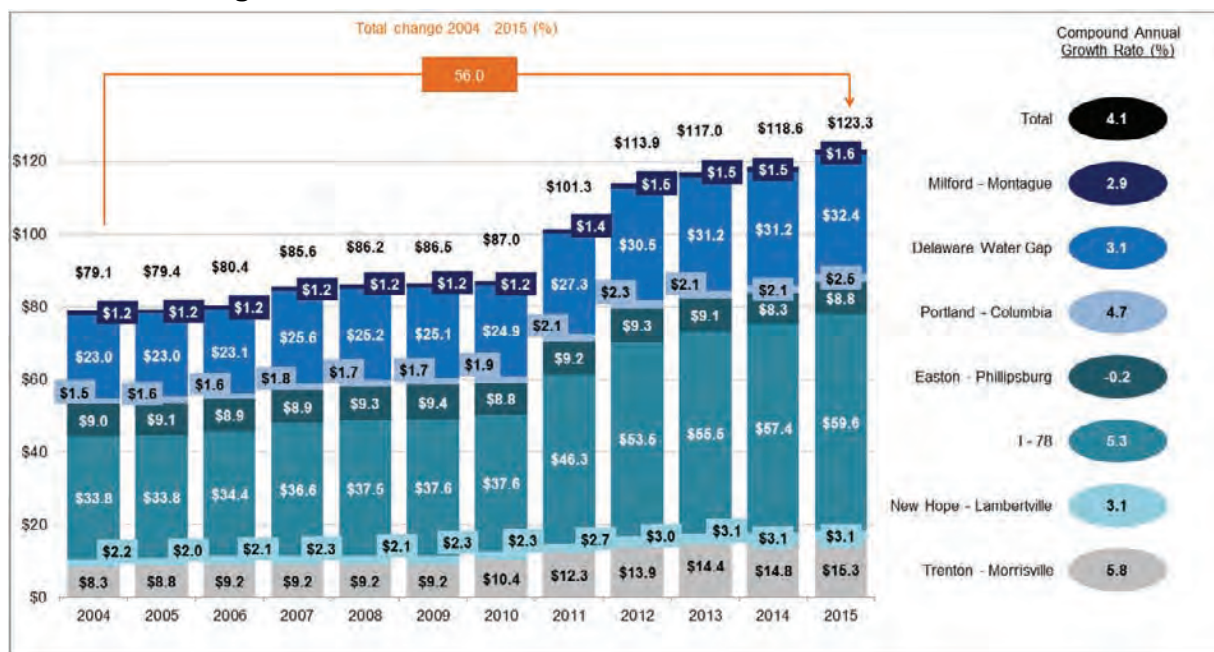
In 2010, the Commission removed the gates from the E-ZPass toll lanes at its seven (7) toll bridges which increased vehicle throughput even further. In addition, the Commission implemented Open Road Tolling in the form of highway speed Express E-ZPass lanes at

the I-78 Toll Bridge in May 2010 and at the Delaware Water Gap (I-80) Toll Bridge in November 2010.

The E-ZPass technology allows customers to travel seamlessly on toll facilities operated by 25 toll agencies in 15 states. These toll facilities include some of the toll facilities that feed directly or indirectly to the DRJTBC's toll bridges, including the Pennsylvania Turnpike, Ohio Turnpike and other tolled Delaware River crossings such as those operated by the Burlington County Bridge Commission, Delaware River Port Authority and the Delaware River and Bay Authority. In 2015, almost 65 percent of the Commission's revenue was collected by E-ZPass. The discounts previously offered through commutation tickets and tokens are still provided to motorists that use New Jersey E-ZPass Regional Consortium-issued transponders.

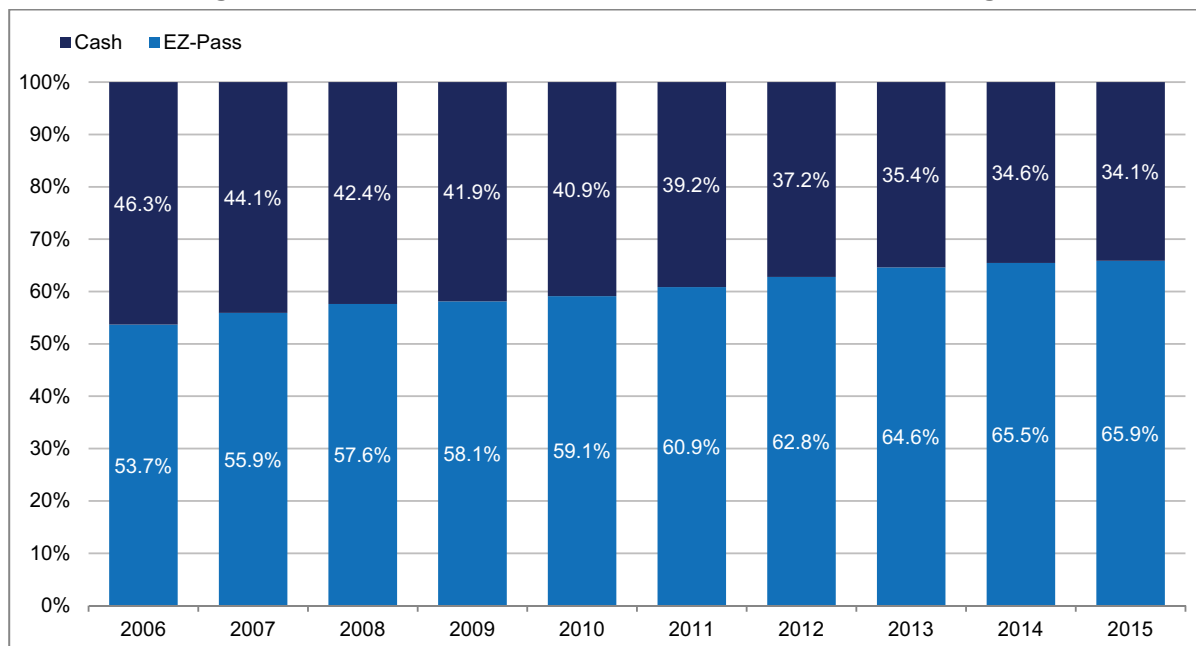
Figure 2-3 illustrates the total DRJTBC toll revenue trends over the twelve-year period from 2004 to 2015. Overall, total toll revenue grew by an average of 4.1 percent each year with toll revenue on the Trenton-Morrisville and I-78 bridges increasing the most over the period. Most of the recent revenue increase was due to a toll rate increase implemented in June 2011, where standard car tolls on each toll bridge increased from \$0.75 to \$1.00, discounted car E-ZPass tolls increased from \$0.45 to \$0.60, and truck tolls increased by \$0.75 per axle.

**Figure 2-3: Historical DRJTBC Total Toll Revenue, \$ Millions**



Utilization of E-ZPass as a method of payment has increased on DRJTBC toll bridges in the last 12 years. As illustrated in Figure 2-4, the percentage of trips paid for using an E-ZPass transponder increased from 53.7 percent in 2006 to 65.9 percent in 2015. Utilization rates have increased in each of the past 10 years.

**Figure 2-4: Annual E-ZPass Utilization on DRJTBC Toll Bridges**



*Note: totals may not add due to rounding*

### 2.1.3 Current Toll Rates on DRJTBC Toll Bridges

The current toll policy for the DRJTBC has been in effect since June 30, 2011 and the current toll rates at each of the seven (7) toll bridges are shown in Table 2-1.

The Commission offers automatic commuter discounts of 40 percent (i.e., a toll charged of \$0.60 per trip) to automobiles equipped with transponders attached to NJ E-ZPass Regional Consortium accounts, provided that they make at least 16 trips on a DRJTBC toll facility in a calendar month. This change went into effect in May 2014; the previous discount was applied to 20 trips in a 35-day period. Prior to May 2014, the discount was automatic for all customers with a DRJTBC account who met or exceeded the required number of trips, and those without a DRJTBC account could opt in to the program by creating a “companion account” with DRJTBC. Now, the discount is applied automatically to all automobiles with a



transponder that is attached to a NJ E-ZPass Regional Consortium account and that makes 16 or more trips in a month, and companion accounts have been discontinued.

All commercial vehicles (Class 2 through 7) equipped with E-ZPass transponders receive automatic discounts of 10 percent when traveling during the off-peak period of 9:01pm to 5:59am.

**Table 2-1: Current DRJTBC Toll Rates**  
(tolls charged in the westbound direction only)

	Class	Cash and Full Fare E-ZPass		Discounted E-ZPass**		
		Trip	Multiplier over Class 1	Trip	Multiplier over Class 1	Trip Discount
Auto	1*	\$1.00		\$0.60		40%
Commercial	2	\$6.50	6.5	\$5.85	9.75	10%
	3	\$12.00	12	\$10.80	18	10%
	4	\$16.00	16	\$14.40	24	10%
	5	\$20.00	20	\$18.00	30	10%
	6	\$24.00	24	\$21.60	36	10%
	7	\$28.00	28	\$25.20	42	10%

\* Class 1 vehicles pulling trailers are charged \$2.00

\*\* There is a discount of 10% for off-peak travel for E-ZPass commercial vehicles, and 40% for autos at all time periods for 16 or more trips per month for those with NJ E-ZPass Regional Consortium accounts.

## 2.1.4 Reasonableness of Toll Rates / Comparison to Other Facilities

Figure 2-5 compares the passenger car toll rates on the DRJTBC's toll facilities to other various E-ZPass toll crossings in the northeastern U.S. Standard cash and peak period E-ZPass toll rates are shown for each facility. Discounted peak-period E-ZPass and off peak E-ZPass toll rates are also shown. We can see that all of the other E-ZPass toll crossings shown have higher toll rates than the current DRJTBC rates. It can be said that the DRJTBC passenger car toll rates are very reasonable compared to rates at other E-ZPass toll facilities.

**Figure 2-5: Passenger Car Toll Rates on Select E-ZPass Toll Crossings as of December 2016**

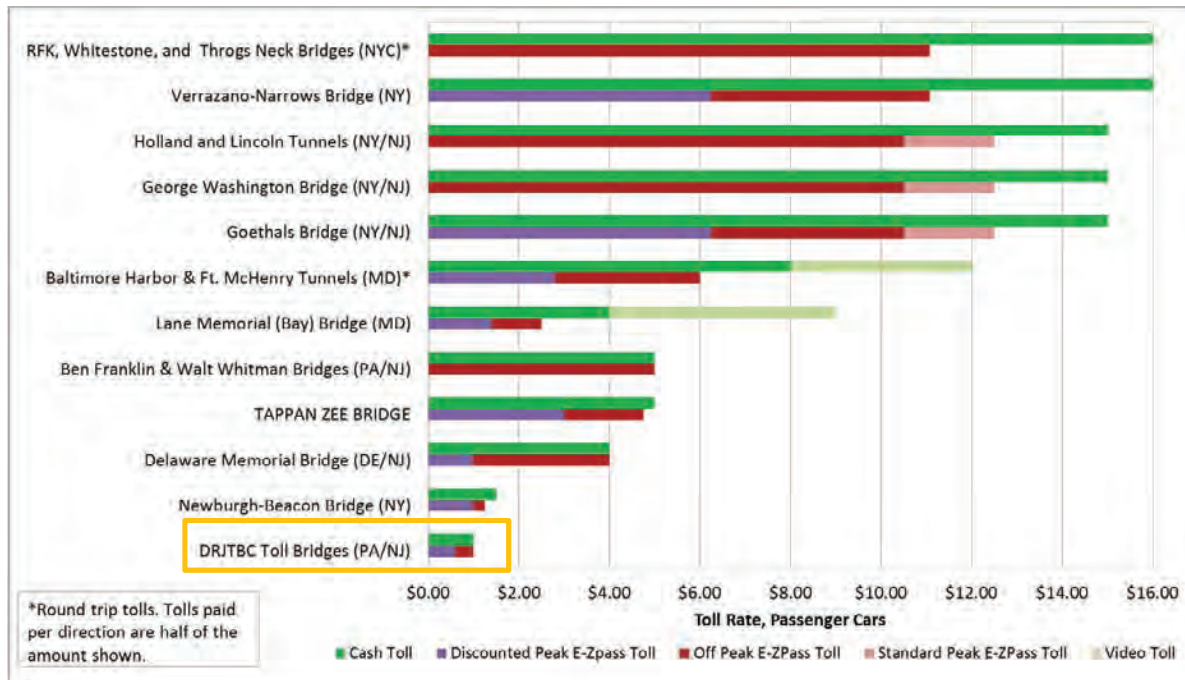
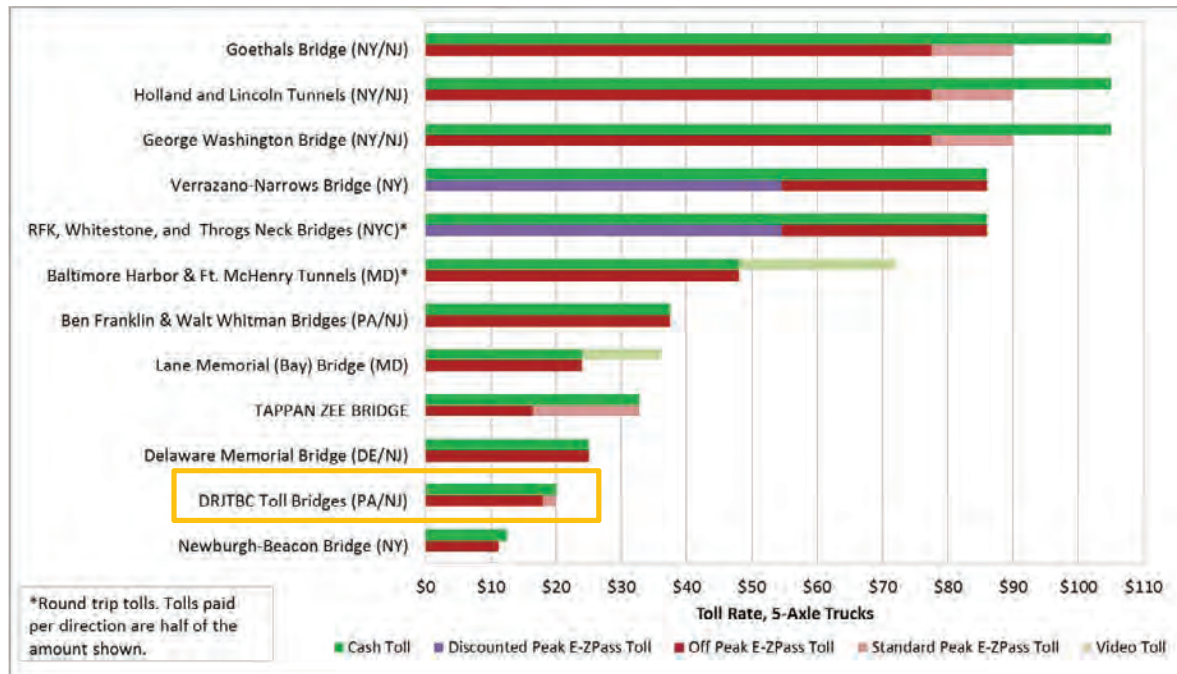


Figure 2-6 shows a similar comparison for 5-axle vehicles. All but one of the major E-ZPass toll crossings shown have higher 5-axle truck toll rates than the DRJTBC's current tolls. It can be said that the DRJTBC commercial vehicle toll rates are very reasonable compared to other E-ZPass toll facilities.

**Figure 2-6: 5-Axle Truck Toll Rates on Select E-ZPass Toll Crossings as of December 2016**



## 2.2 Scudder Falls Bridge

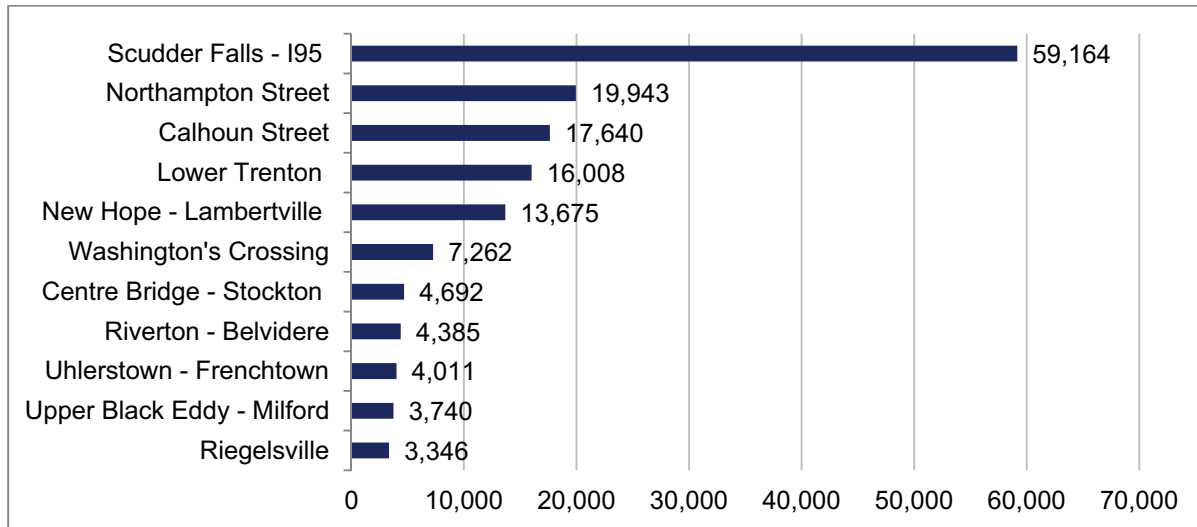
This section of the report provides a description of the Scudder Falls Bridge, along with a description of the bridge's competitors and recent traffic volumes.

The Scudder Falls Bridge is a toll-supported bridge located north of Trenton, NJ on I-95 crossing the Delaware River on the border between Pennsylvania and New Jersey. The segment of I-95 where the bridge is located is a major north-south corridor that accommodates a mix of through and local traffic traveling between Trenton, New Jersey, and the Bucks County suburbs of Philadelphia, Pennsylvania. The bridge currently experiences recurring traffic congestion during peak rush hours and is functionally obsolete. Consequently, the DRJTBC is in the process of making investments in the bridge to improve its performance. The I-95 / Scudder Falls Bridge Replacement Project will replace the current facility with a wider, improved bridge and approaches. Details can be found on the website <http://scudderfallsbridge.com/>. For this study, we are assuming that the first span of the facility will be completed by May 2019, followed by the commencement of southbound toll collection on the bridge in June 2019.

As shown in Figure 2-7, the Scudder Falls Bridge accommodates the most traffic of the DRJTBC toll-supported bridges. The bridge, on average, supported almost 60,000 vehicles

per day in 2015 – almost three times as much traffic as the next most utilized bridge at Northampton Street, making it a critical transportation asset for traffic traveling between Pennsylvania and New Jersey.

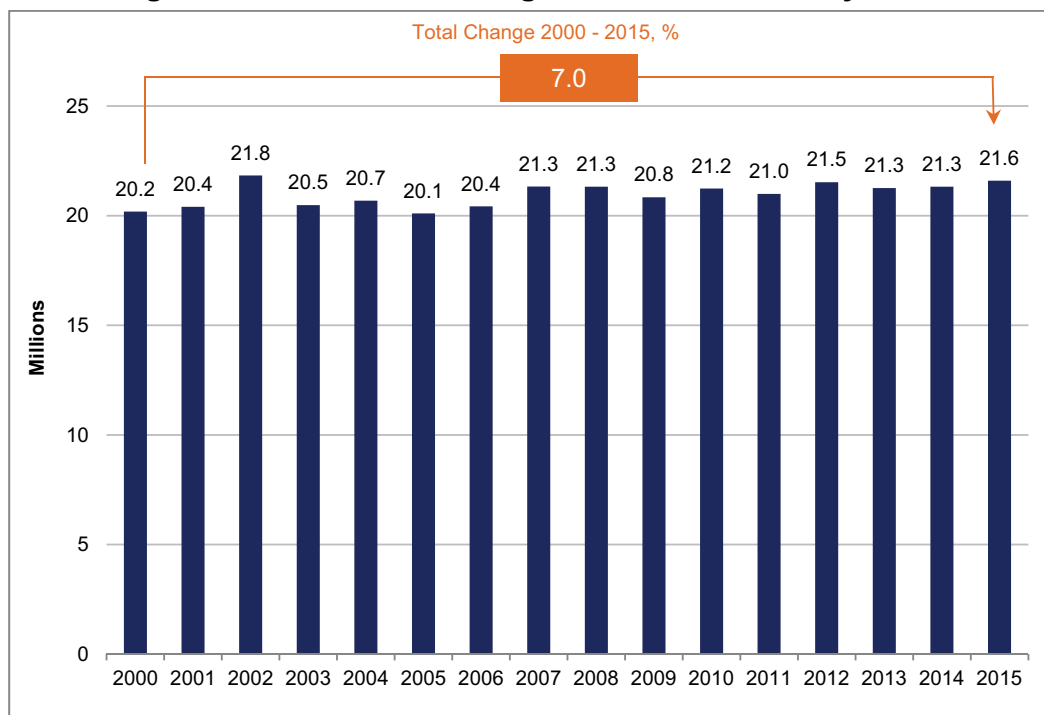
**Figure 2-7: 2015 Total Average Daily Two-way Traffic on Toll Supported Bridges\***



\*Note: most recent data available.

Since 2000, annual two-way traffic on the Scudder Falls Bridge has fluctuated between 20.1 and 21.8 million trips. From 2000 to 2015, traffic increased a total of 7.0 percent as seen in Figure 2-8. It should be noted, however, that annual traffic peaked at 21.8 million trips in 2002.

**Figure 2-8: Scudder Falls Bridge Total Annual Two-way Traffic**



NOTE: From 2006 to 2009 the Trenton-Morrisville Toll Bridge was under construction.

Source: DRJTBC

## 2.2.1 Alternate Routes to the Scudder Falls Bridge

While the Scudder Falls Bridge is a critical piece of transportation infrastructure in the region, the DRJTBC maintains a number of toll and toll-supported facilities in the vicinity of the bridge for travelers crossing the Delaware River. The Washington Crossing (non-tolled), Calhoun Street (non-tolled), Lower Trenton (non-tolled), and Trenton-Morrisville (tolled) bridges may serve as alternative routes for travelers who typically utilize the Scudder Falls Bridge. It should be noted that the Washington Crossing, Calhoun Street and Lower Trenton toll-supported bridges all have weight restrictions, therefore prohibiting truck traffic. Further to the south, the major toll bridges include the Pennsylvania Turnpike Bridge and the Delaware Memorial Bridge, both of which are potential alternate truck routes to the Scudder Falls Bridge. Figure 2-9 provides an overview of the bridges in the area.



Figure 2-9: Alternate Bridge Routes Near Scudder Falls Bridge

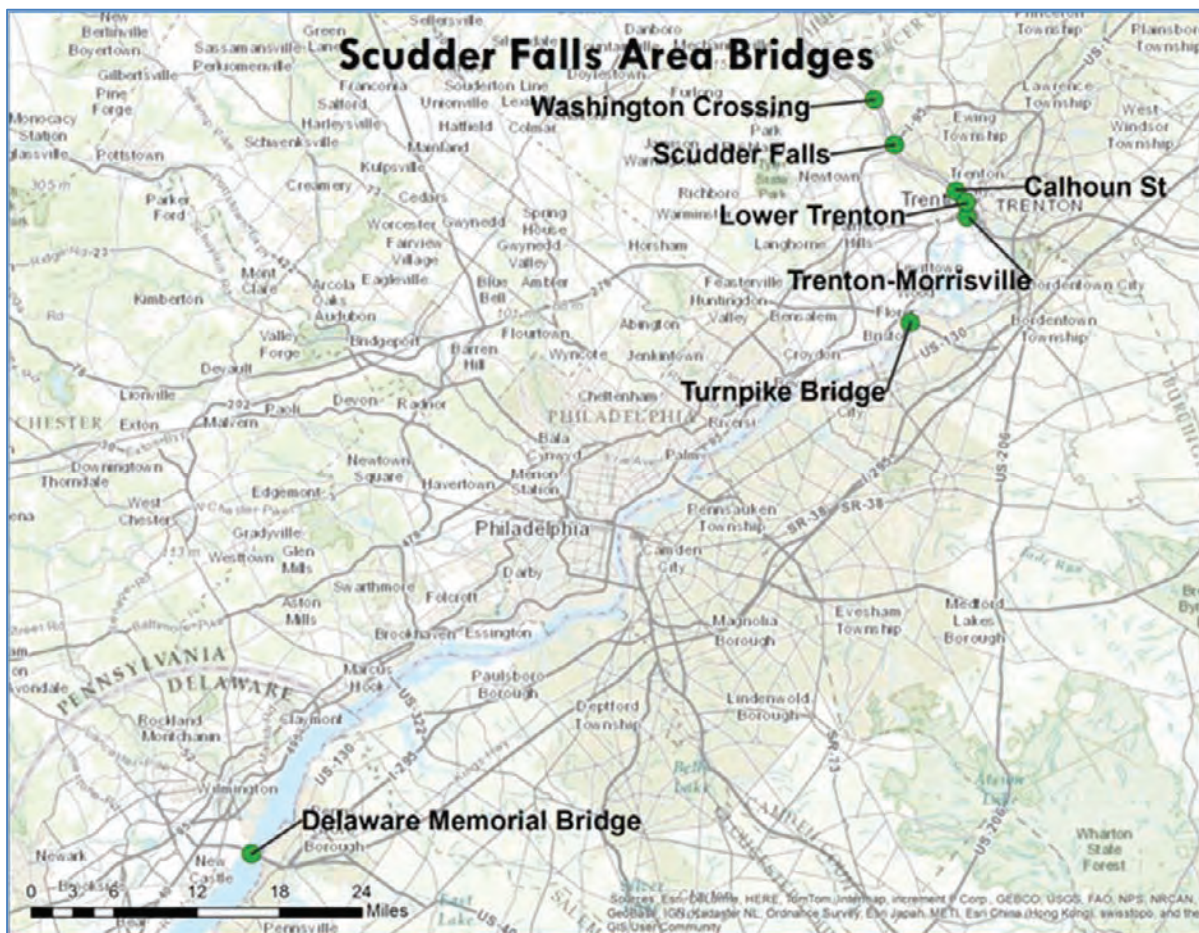
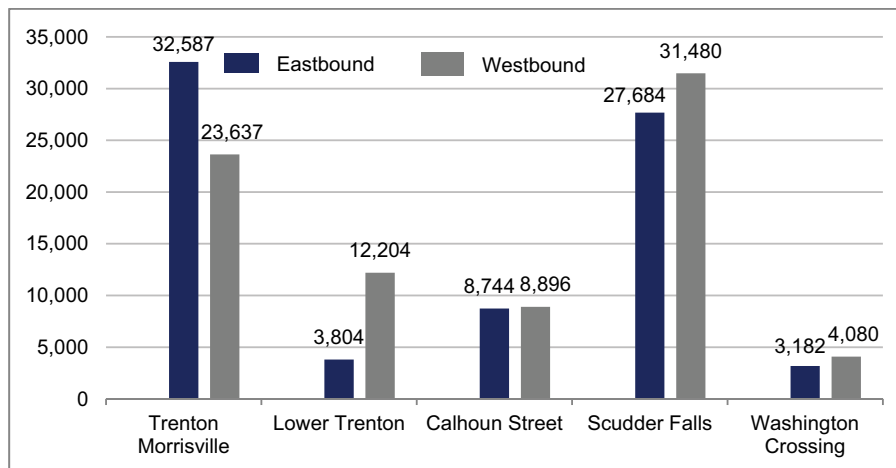


Figure 2-10 displays 2015 annual average daily traffic by direction – both northbound and southbound – for the Scudder Falls Bridge and those bridges most likely to serve as alternative travel routes to the Scudder Falls Bridge. Note that while some of these bridges operate on a north-south route, “westbound” refers to the Pennsylvania-bound direction, or the direction of tolling for the Trenton-Morrisville Toll Bridge, and starting in 2019, the new Scudder Falls Bridge. With the exception of the Trenton-Morrisville Toll Bridge, which is not tolled in the eastbound direction, the Scudder Falls Bridge accommodates the most traffic on an average daily basis. It is possible that some travelers utilizing the Scudder Falls Bridge in the southbound direction choose to use the existing Trenton-Morrisville Toll Bridge in the eastbound direction to avoid paying a toll.

**Figure 2-10: 2015 Average Daily Traffic (AADT) by Direction**

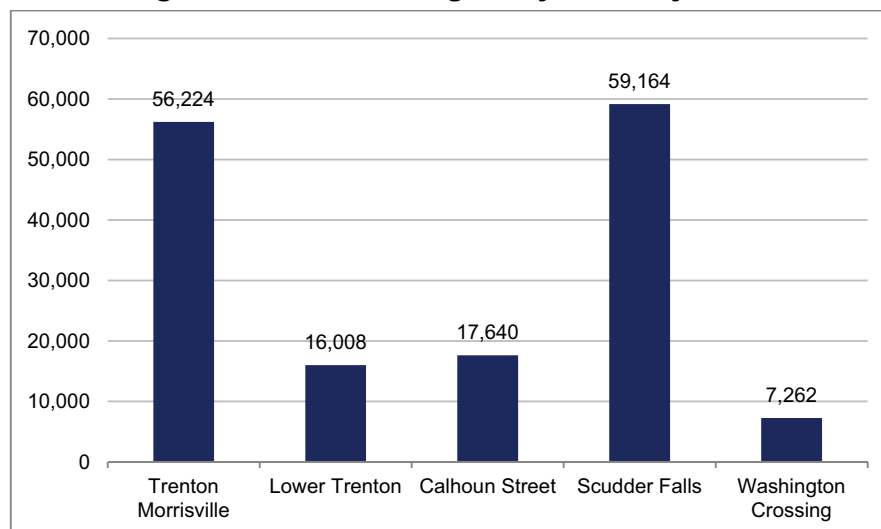


*Note: Traffic on the Trenton-Morrisville Toll Bridge is not tolled in the eastbound direction.*

*Source: DRJTBC*

In 2015, the existing Scudder Falls Bridge handled the most annual average daily traffic of the five bridges in the Scudder Falls area. As shown in Figure 2-11, the Scudder Falls Bridge accommodated almost 3,000 more vehicles on an average daily basis than the Trenton-Morrisville Toll Bridge, which is only tolled in the westbound direction. The other bridges – Lower Trenton, Calhoun Street, and Washington’s Crossing – experienced significantly less traffic.

**Figure 2-11: 2015 Average Daily Two-Way Traffic**

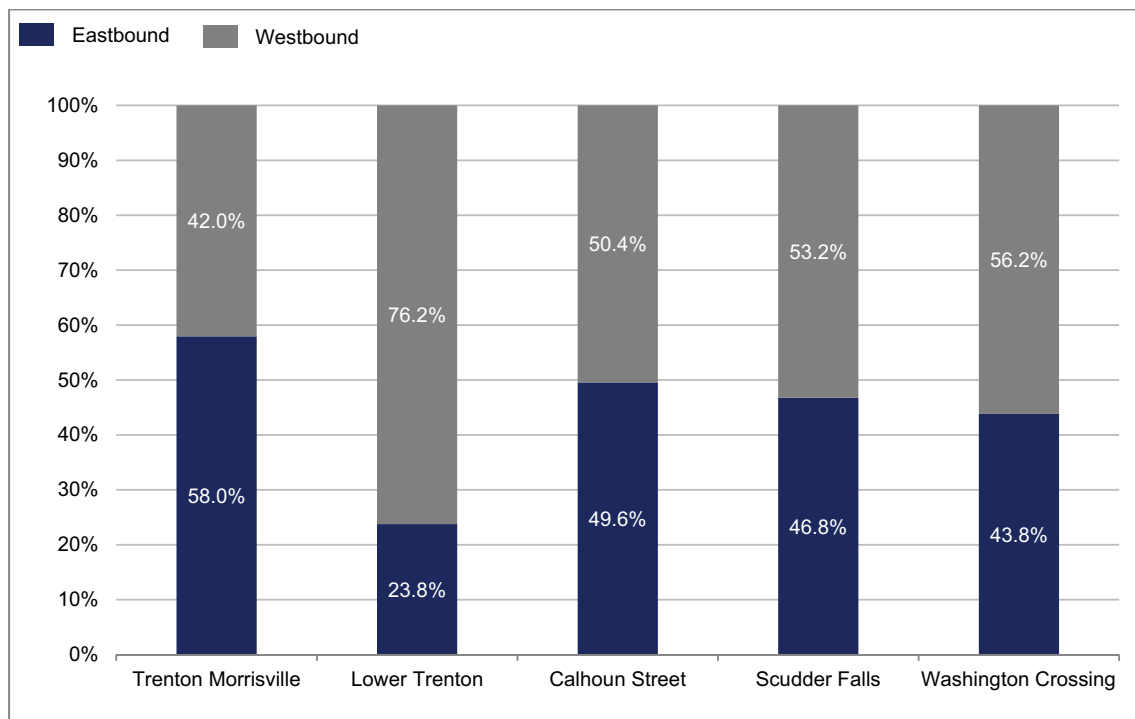


*Note: Traffic on the Trenton-Morrisville Toll Bridge is not tolled in the eastbound direction.*

*Source: DRJTBC*

Pennsylvania-bound and New Jersey-bound traffic is not distributed equally on the five bridges in the Scudder Falls Bridge area. As shown in Figure 2-12, the Scudder Falls Bridge and the Calhoun Street Bridge handle a relatively equal split of directional traffic. Conversely, westbound (Pennsylvania-Bound) traffic is predominant on both the Washington Crossing Bridge and especially the Lower Trenton Bridge (due to westbound tolling on the adjacent Trenton-Morrisville Toll Bridge). Eastbound traffic is more prevalent on the Trenton-Morrisville Toll Bridge as the DRJTBC does not toll traffic in that direction.

**Figure 2-12: 2015 Directional Distribution of Traffic**



*Note: Traffic on the Trenton-Morrisville Toll Bridge is not tolled in the eastbound direction.*

*Source: DRJTBC*



### 3.0 SEVEN EXISTING TOLL BRIDGES HISTORICAL TOLL TRIPS AND TOLL REVENUE TRENDS

This section discusses historical toll trips and toll revenue trends and pertains exclusively to the seven (7) existing toll bridges; the DRJTBC does not collect tolls on the existing Scudder Falls Bridge, which is designated a “toll-supported” facility by the Commission.

#### 3.1 Historical Toll Trips

Figure 3-1 illustrates passenger car toll traffic trends on the seven (7) existing toll bridges between 1987 and 2015. The number of passenger car toll transactions has reduced significantly from the high levels experienced during the late 1980s and early 1990s due to the conversion to one-way toll collection. The historical long term trend shows that passenger car toll traffic has increased steadily over the years with some years of negative traffic growth. We can see that passenger car toll traffic has been relatively flat to decreasing in recent years.

**Figure 3-1: Passenger Car Toll Traffic on DRJTBC Bridges, 1987 to 2015**

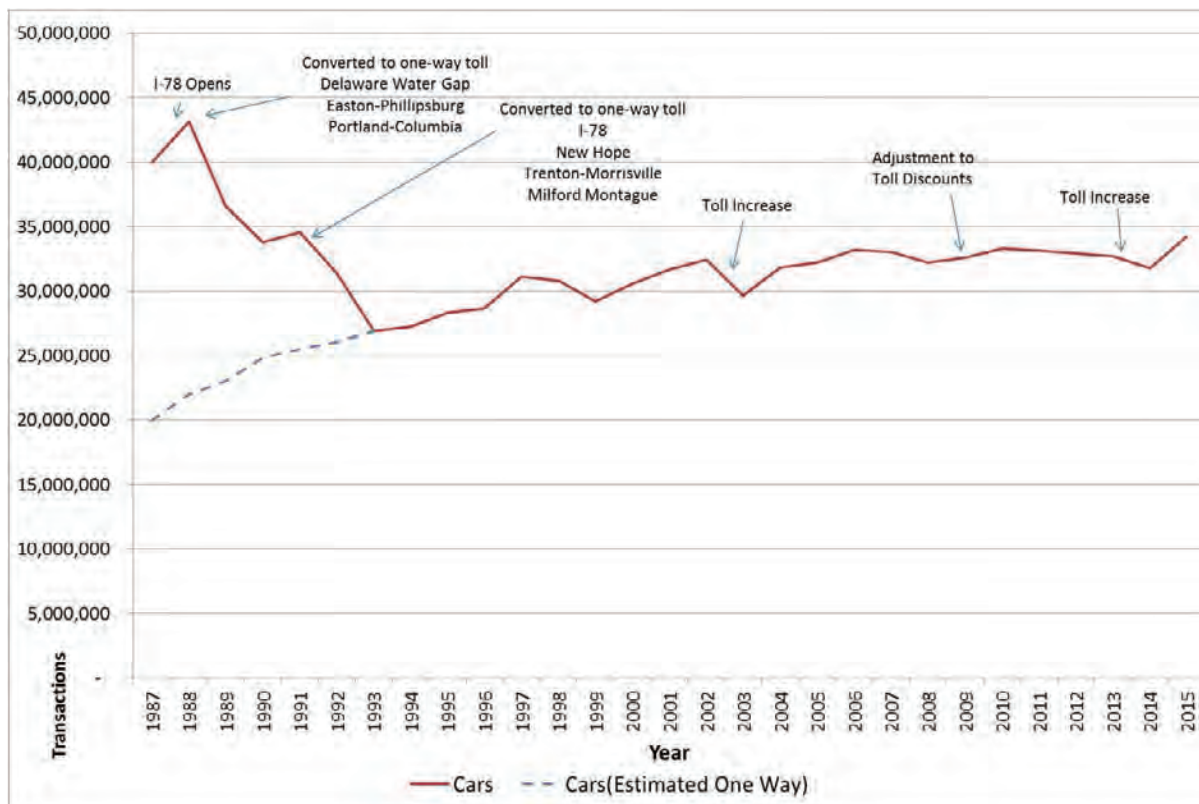


Table 3-1 shows annual passenger car toll trips from 2004 through 2015. Passenger car toll trips increased from 2004 to 2007, declined in 2007 and 2008, increased again from 2008 to 2010 and then slowly decreased through 2014. In 2015, total annual passenger car toll traffic increased by 7.8 percent overall. All seven toll bridges showed positive growth in 2015.

**Table 3-1: Historical DRJTBC Passenger Car Toll Trips, 2004 through 2015**

Bridge	Annual Passenger Car Toll Trips (in Thousand)											
	2004	2005	2006	2007	2008	2009*	2010	2011**	2012	2013	2014	2015
Milford - Montague	1,312	1,301	1,312	1,310	1,266	1,258	1,267	1,214	1,178	1,209	1,227	1,280
Delaware Water Gap	8,489	8,493	8,638	8,501	8,291	8,390	8,169	7,920	7,812	7,885	7,858	8,120
Portland - Columbia	1,163	1,218	1,237	1,365	1,275	1,243	1,319	1,288	1,212	1,120	1,113	1,146
Easton - Phillipsburg	5,551	5,691	5,708	5,743	5,925	5,755	5,739	5,346	5,009	4,794	4,632	4,919
I - 78	6,975	7,226	7,703	7,821	7,559	7,791	7,679	8,280	8,516	8,428	8,636	8,871
New Hope - Lambertville	2,027	1,700	1,737	1,895	1,759	1,853	1,805	1,809	1,773	1,814	1,842	1,844
Trenton - Morrisville	6,282	6,583	6,855	6,396	6,108	6,296	7,292	7,298	7,424	7,470	7,549	8,039
<b>Total</b>	<b>31,798</b>	<b>32,211</b>	<b>33,191</b>	<b>33,031</b>	<b>32,182</b>	<b>32,586</b>	<b>33,271</b>	<b>33,154</b>	<b>32,924</b>	<b>32,721</b>	<b>31,743</b>	<b>34,218</b>

\*Adjustments to Toll Discount

\*\*Passenger Car Toll Increase Year

Figure 3-2 illustrates passenger car toll traffic trends on the seven toll bridges between 2004 and 2015. Over the twelve year period, only the Trenton-Morrisville and I-78 bridges experienced positive growth in passenger car traffic while the remaining five bridges saw traffic levels contract.

**Figure 3-2: Passenger Car Traffic on DRJTBC Toll Bridges, Millions of Trips, 2004 to 2015**

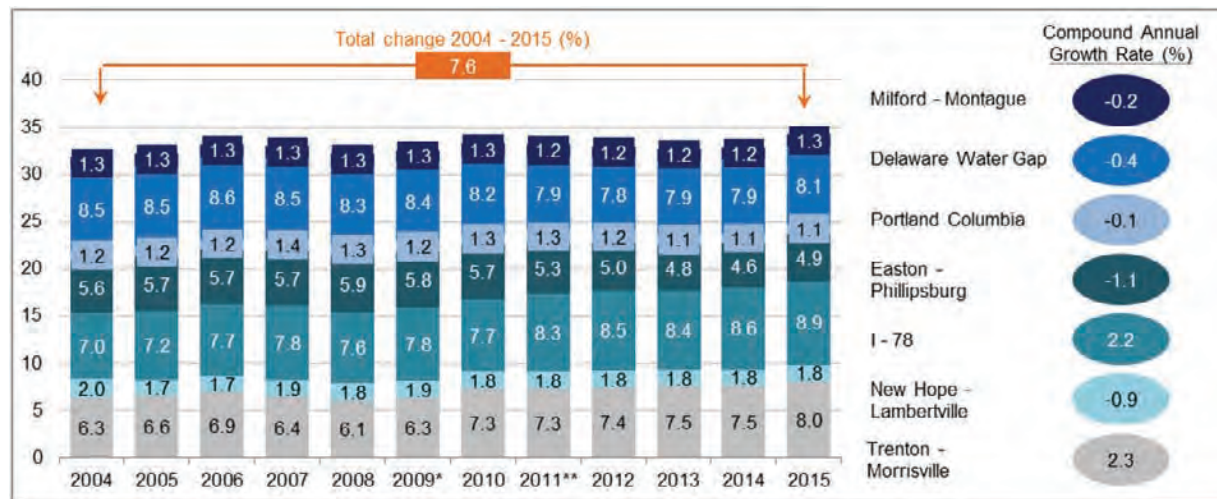


Figure 3-3 illustrates truck toll traffic trends on the seven (7) toll bridges between 1987 and 2015. Similar to passenger cars, the number of truck toll transactions has reduced significantly from the high levels experienced during the late 1980s and early 1990s due to

the conversion to one-way toll collection. The historical long term trend shows that truck toll traffic has generally been increasing over the years with some years of negative traffic growth. However, we can see that truck toll traffic has been increasing in recent years.

**Figure 3-3: Truck Toll Traffic on DRJTBC Bridges, 1987 to 2015**

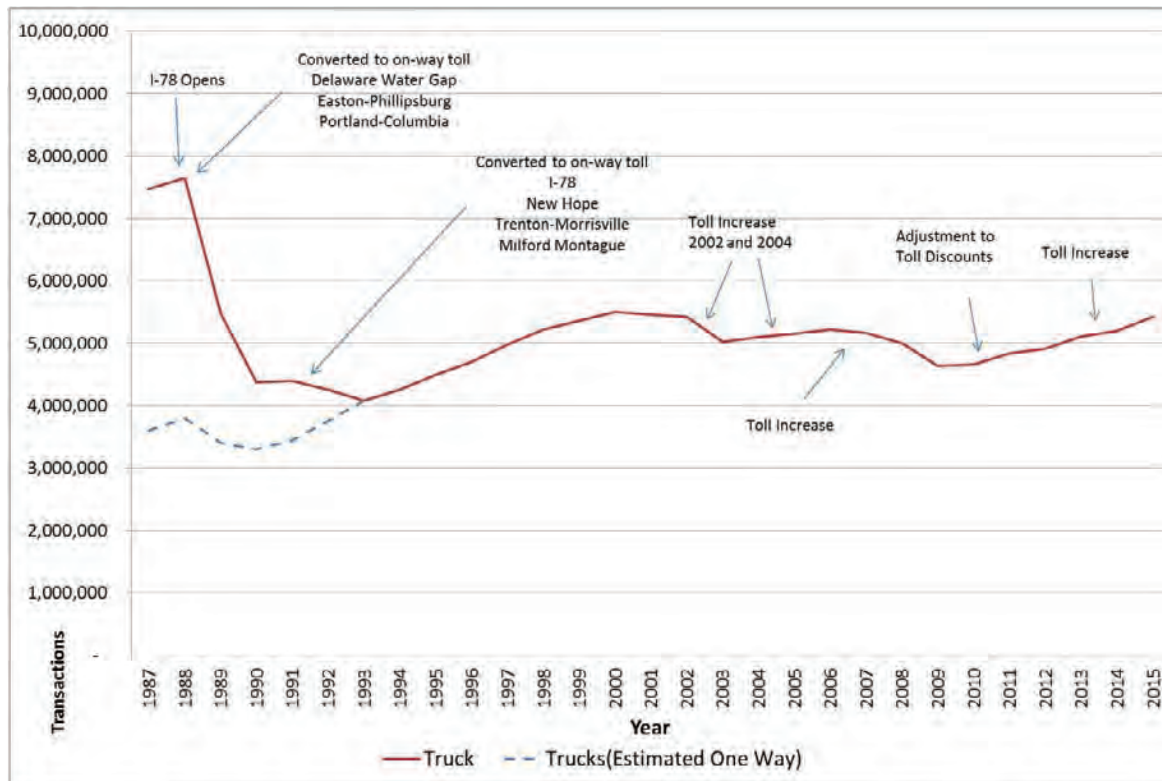


Table 3-2 shows annual truck toll trips from 2004 through 2015. Truck toll traffic increased in 2005 and 2006, declined from 2007 to 2009, and increased again annually from 2010 through 2015. In 2015, all seven bridges experienced increases in truck traffic; overall the increase was 4.5 percent over 2014 truck traffic.

**Table 3-2: Historical DRJTBC Truck Toll Trips, 2004 through 2015**

Bridge	Annual Truck Toll Trips (in Thousand)											
	2004	2005	2006	2007*	2008	2009**	2010	2011*	2012	2013	2014	2015
Milford - Montague	41	41	41	42	42	35	34	33	32	35	36	39
Delaware Water Gap	1,463	1,464	1,472	1,527	1,424	1,330	1,329	1,287	1,304	1,339	1,338	1,399
Portland - Columbia	79	82	84	85	84	77	85	84	82	73	77	99
Easton - Phillipsburg	543	550	534	498	501	459	418	384	338	341	296	314
I - 78	2,411	2,412	2,453	2,389	2,332	2,200	2,203	2,416	2,530	2,654	2,747	2,866
New Hope - Lambertville	112	112	121	123	112	109	108	111	112	119	118	119
Trenton - Morrisville	452	489	514	501	499	431	479	514	511	551	578	589
<b>Total</b>	<b>5,101</b>	<b>5,149</b>	<b>5,219</b>	<b>5,166</b>	<b>4,994</b>	<b>4,642</b>	<b>4,655</b>	<b>4,830</b>	<b>4,908</b>	<b>5,112</b>	<b>5,191</b>	<b>5,425</b>

\*Commercial Vehicle Toll Increase Year

\*\*Adjustment to Toll Discount

Figure 3-4 shows that truck traffic increased on the New Hope-Lambertville, Trenton-Morrisville, Portland-Columbia and I-78 bridges over the twelve year period with the remaining three bridges experiencing declines in truck traffic. This decline in truck traffic was particularly acute on the Easton-Phillipsburg Bridge which experienced a 4.9 percent average annual decline in truck traffic from 2004 to 2015.

**Figure 3-4: Truck Traffic on DRJTBC Toll Bridges, Millions of Trips, 2004 to 2015**

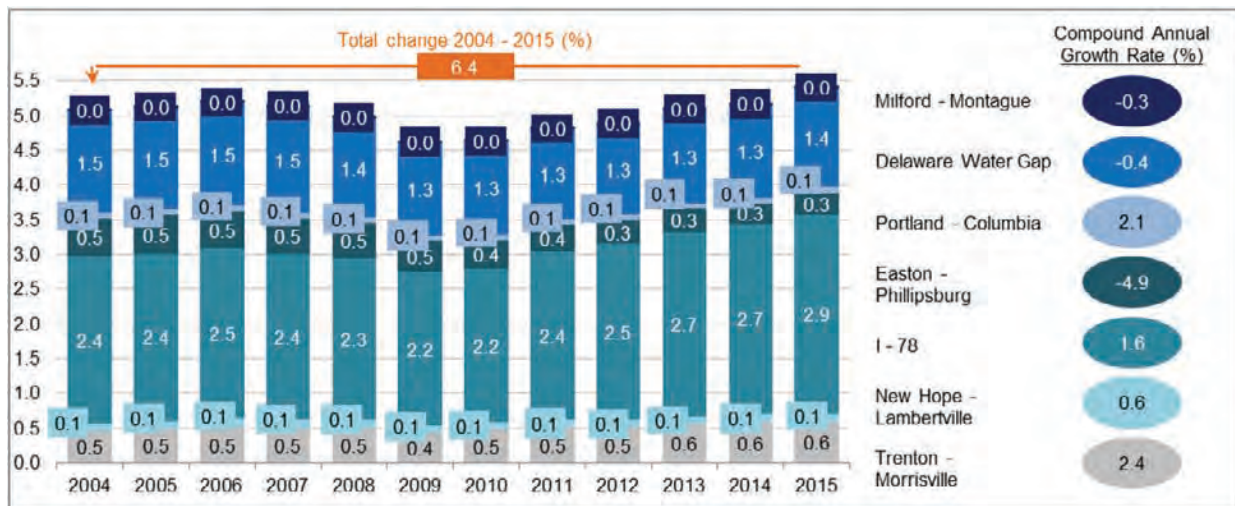


Table 3-3 shows total annual toll trips (cars plus trucks) from 2004 through 2015. Total toll trips increased from 2004 to 2006, declined in 2007 and 2008, increased again in 2009 through 2011, declined in 2012 and has shown slow growth through 2015. All seven (7) toll bridges showed positive growth in 2015.



**Table 3-3: Historical DRJTBC Total Toll Trips, 2004 through 2015**

Bridge	Annual Total Toll Trips (in Thousand)											
	2004	2005	2006	2007*	2008	2009**	2010	2011***	2012	2013	2014	2015
Milford - Montague	1,353	1,341	1,353	1,352	1,308	1,293	1,301	1,247	1,211	1,244	1,263	1,319
Delaware Water Gap	9,952	9,957	10,110	10,029	9,715	9,720	9,498	9,207	9,116	9,223	9,196	9,518
Portland - Columbia	1,241	1,300	1,321	1,450	1,358	1,320	1,404	1,372	1,294	1,193	1,190	1,245
Easton - Phillipsburg	6,094	6,240	6,241	6,241	6,426	6,214	6,157	5,731	5,346	5,135	4,928	5,233
I - 78	9,386	9,638	10,157	10,210	9,891	9,992	9,881	10,695	11,046	11,083	11,383	11,737
New Hope - Lambertville	2,139	1,812	1,859	2,018	1,871	1,962	1,914	1,920	1,885	1,933	1,960	1,964
Trenton - Morrisville	6,734	7,077	7,369	6,898	6,607	6,726	7,771	7,812	7,934	8,021	8,127	8,628
<b>Total</b>	<b>36,898</b>	<b>37,366</b>	<b>38,409</b>	<b>38,197</b>	<b>37,176</b>	<b>37,228</b>	<b>37,926</b>	<b>37,984</b>	<b>37,832</b>	<b>37,832</b>	<b>38,047</b>	<b>39,643</b>

\*Truck Only Toll Increase Year

\*\*Adjustment to Toll Discounts

\*\*\* Car and Truck Toll Increase Year

Figure 3-5 illustrates the total DRJTBC toll traffic trends over the period. We can see that total traffic on the Trenton-Morrisville and I-78 bridges grew at average annual rates of 2.3 and 2.1 percent respectively while total traffic on the other five bridges declined or kept flat overall over the same time frame.

**Figure 3-5: Total Traffic on DRJTBC Toll Bridges, Millions of Toll Trips, 2004 to 2015**

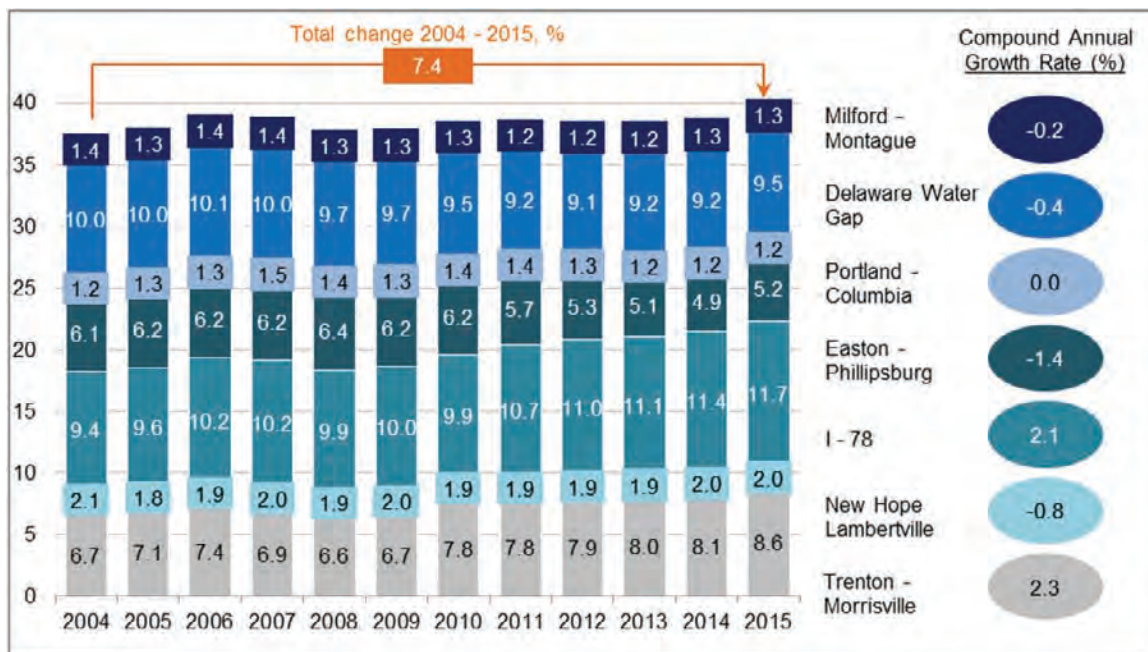
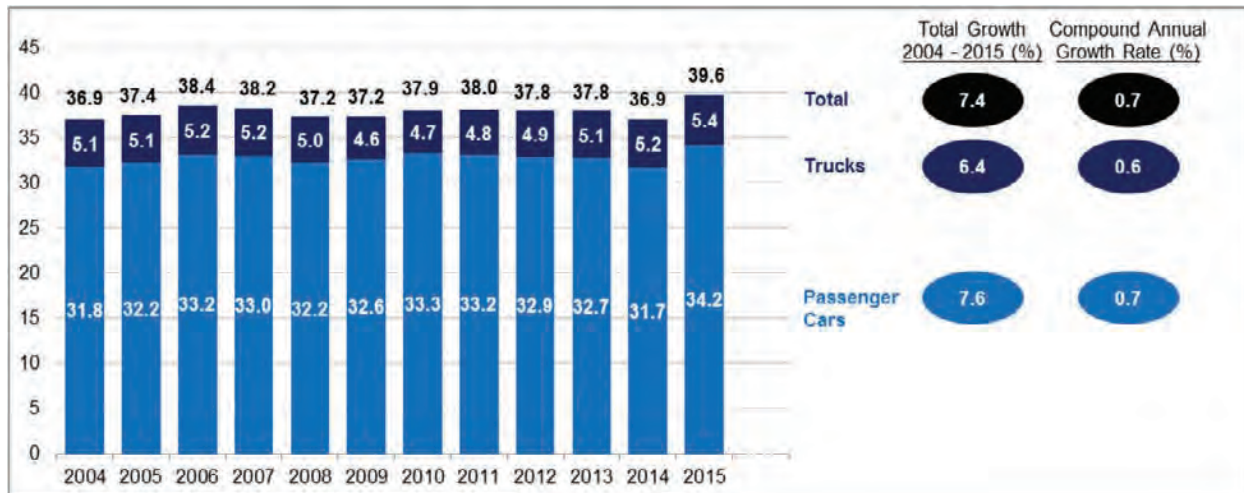


Figure 3-6 shows the total growth in traffic on the DRJTBC's toll bridges over the period 2004 to 2015. Total toll traffic increased by a total of 7.4 percent between 2004 and 2015 at an average annual rate of 0.7 percent. However, passenger car traffic growth outpaced the

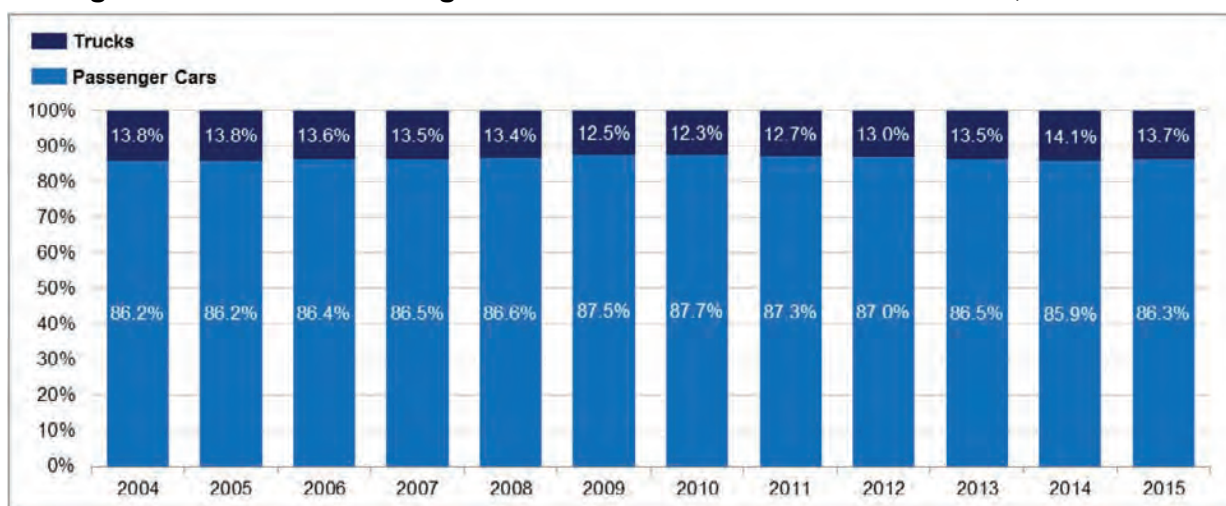
truck traffic over the twelve year period, with passenger cars experiencing an overall increase of 7.6 percent versus only 6.4 percent for truck traffic.

**Figure 3-6: Traffic on DRJTBC Toll Bridges, Millions of Trips, 2004 to 2015**



The distribution of traffic between passenger cars and trucks has shifted over the years, as shown in Figure 3-7. For the time period shown, the truck share of traffic was the lowest in the recession and post-recession years of 2009-2011, with 12.5 percent, 12.3 percent, and 12.7 percent, respectively. The year 2014 saw the highest share of truck traffic, with 14.1 percent. Though both car and truck traffic grew from 2004 to 2015, car traffic grew more; therefore, the truck traffic share declined from 2004 to 2015.

**Figure 3-7: DRJTBC Passenger Car vs. Truck Distribution of Toll Traffic, 2004 to 2015**



## 3.2 Historical Toll Revenue Trends

Table 3-4 shows annual passenger car toll revenues from 2004 through 2015. Passenger car toll revenue increased in 2005 and 2006, declined in 2007 and 2008, increased again from 2009 to 2012 and declined in 2013 to 2014. In 2015, overall passenger car toll revenues increased by 3.9 percent. Only one of the seven toll bridges (New Hope-Lambertville) experienced declines in passenger car toll revenue with the remaining six toll bridges showing positive growth in 2015.

**Table 3-4: Historical DRJTBC Passenger Car Toll Revenue, 2004 through 2015**

Bridge	Annual Passenger Car Revenue (in Thousand)											
	2004	2005	2006	2007	2008	2009*	2010	2011**	2012	2013	2014	2015
Milford - Montague	\$869	\$861	\$866	\$865	\$831	\$915	\$916	\$1,041	\$1,145	\$1,178	\$1,185	\$1,235
Delaware Water Gap	\$5,691	\$5,687	\$5,772	\$5,678	\$5,527	\$6,141	\$5,944	\$6,819	\$7,622	\$7,698	\$7,616	\$7,849
Portland - Columbia	\$769	\$807	\$818	\$905	\$838	\$893	\$947	\$1,096	\$1,173	\$1,082	\$1,069	\$1,098
Easton - Phillipsburg	\$3,698	\$3,772	\$3,760	\$3,760	\$3,876	\$4,175	\$4,138	\$4,525	\$4,849	\$4,664	\$4,474	\$4,732
I - 78	\$4,713	\$4,858	\$5,161	\$5,207	\$5,014	\$5,715	\$5,595	\$7,133	\$8,324	\$8,198	\$8,327	\$8,573
New Hope - Lambertville	\$1,342	\$1,110	\$1,130	\$1,223	\$1,120	\$1,332	\$1,290	\$1,529	\$1,706	\$1,757	\$1,767	\$1,748
Trenton - Morrisville	\$4,196	\$4,399	\$4,554	\$4,303	\$4,093	\$4,718	\$5,483	\$6,246	\$7,217	\$7,287	\$7,314	\$7,758
<b>Total</b>	<b>\$21,278</b>	<b>\$21,494</b>	<b>\$22,061</b>	<b>\$21,939</b>	<b>\$21,298</b>	<b>\$23,889</b>	<b>\$24,313</b>	<b>\$28,388</b>	<b>\$32,035</b>	<b>\$31,864</b>	<b>\$31,753</b>	<b>\$32,992</b>

\*Passenger Car Toll Increase Year

\*\*Adjustment to Toll Discounts

Figure 3-8 illustrates passenger car toll revenue trends on the seven toll bridges between 2004 and 2015. Over the twelve year period, total passenger car toll revenue increased by 55.1% or by an average annual rate of 4.1 percent each year. The Trenton-Morrisville and I-78 bridges both experienced the highest annual average growth over 5.7 percent and 5.6 percent, respectively, over the twelve year period.

**Figure 3-8: Historical DRJTBC Passenger Car Toll Revenue, \$Millions, 2004 to 2015**

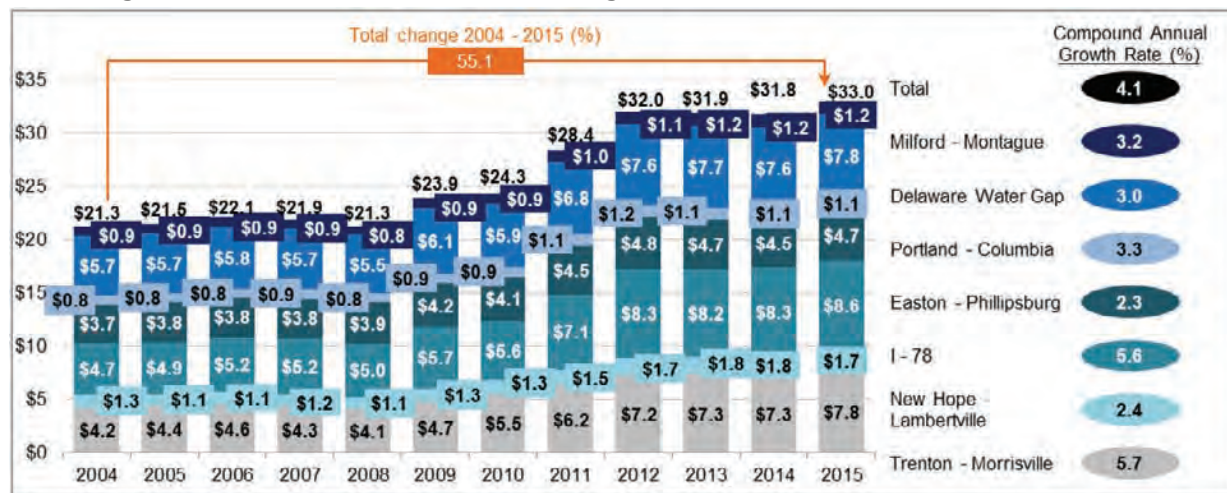


Table 3-5 shows annual truck toll revenue from 2004 through 2015. Truck toll revenue increased from 2004 to 2008, declined in 2009, was flat in 2010, and then exhibited strong positive growth of 16.4 percent and 12.3 percent in 2011 and 2012, respectively. In 2013, 2014, and 2015, total annual overall truck toll revenue increased by 4.0 percent, 1.9, percent, and 4.0 percent, respectively. In 2015, all seven toll bridges experienced increases in truck toll revenue over 2014.

**Table 3-5: Historical DRJTBC Truck Toll Revenue, 2004 through 2015**

Bridge	Annual Truck Revenue (in Thousand)											
	2004	2005	2006	2007	2008	2009*	2010	2011**	2012	2013	2014	2015
Milford - Montague	\$314	\$308	\$304	\$323	\$330	\$288	\$274	\$312	\$340	\$362	\$361	\$395
Delaware Water Gap	\$17,342	\$17,269	\$17,300	\$19,970	\$19,642	\$18,974	\$18,915	\$20,519	\$22,902	\$23,536	\$23,558	\$24,510
Portland - Columbia	\$723	\$763	\$773	\$855	\$877	\$829	\$931	\$1,053	\$1,114	\$992	\$1,059	\$1,370
Easton - Phillipsburg	\$5,314	\$5,349	\$5,159	\$5,157	\$5,465	\$5,253	\$4,645	\$4,723	\$4,429	\$4,484	\$3,835	\$4,066
I - 78	\$29,105	\$28,904	\$29,259	\$31,435	\$32,528	\$31,872	\$31,994	\$39,146	\$45,188	\$47,329	\$49,119	\$50,990
New Hope - Lambertville	\$894	\$889	\$951	\$1,049	\$976	\$971	\$979	\$1,136	\$1,290	\$1,342	\$1,376	\$1,397
Trenton - Morrisville	\$4,081	\$4,427	\$4,627	\$4,891	\$5,080	\$4,453	\$4,924	\$6,072	\$6,644	\$7,128	\$7,516	\$7,569
<b>Total</b>	<b>\$57,775</b>	<b>\$57,909</b>	<b>\$58,373</b>	<b>\$63,679</b>	<b>\$64,898</b>	<b>\$62,641</b>	<b>\$62,662</b>	<b>\$72,962</b>	<b>\$81,906</b>	<b>\$85,172</b>	<b>\$86,824</b>	<b>\$90,297</b>

\*Commercial Vehicle Toll Increase Year

\*\*Adjustment to Toll Discounts

Figure 3-9 illustrates truck toll revenue trends on the seven (7) toll bridges between 2004 and 2015. Over the twelve year period, total truck revenue on DRJTBC's toll facilities increased by an average annual rate of 4.1 percent. However, the Easton-Phillipsburg Bridge was the only toll facility that experienced an overall average annual decline of 2.4 percent from 2004 to 2015. The total revenue increase of 56.3 percent over the timeframe shown is due in large part to the mid-2011 toll increase.



**Figure 3-9: Historical DRJTBC Truck Toll Revenue, \$Millions, 2004 to 2015**

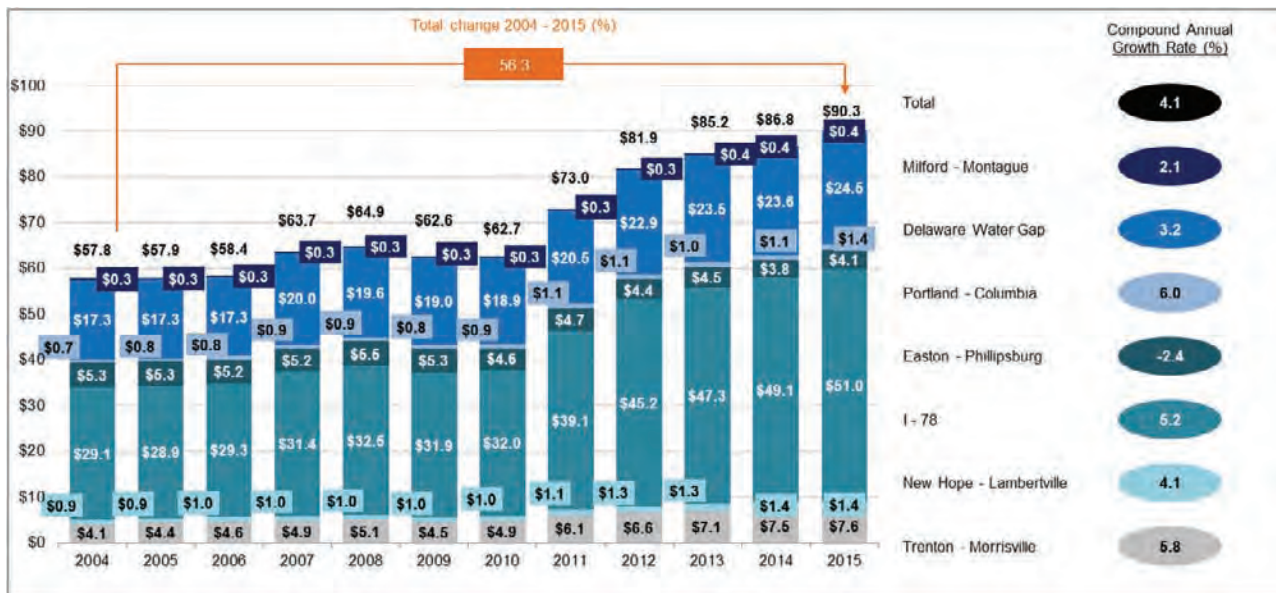


Table 3-6 shows annual total car and truck toll revenue from 2004 through 2015. Total toll revenue increased each year over the twelve year period. However, during the period 2008 to 2010, total annual revenue growth was less than 1 percent. Except for the New Hope-Lambertville Bridge being flat, all other toll bridges experienced positive revenue growth in 2015.

**Table 3-6: Historical DRJTBC Total Toll Revenue, 2004 through 2015**

Bridge	Annual Total Toll Revenue (in Thousand)											
	2004	2005	2006	2007*	2008	2009**	2010	2011***	2012	2013	2014	2015
Milford - Montague	\$1,184	\$1,169	\$1,170	\$1,187	\$1,161	\$1,203	\$1,190	\$1,353	\$1,485	\$1,540	\$1,546	\$1,630
Delaware Water Gap	\$23,033	\$22,956	\$23,072	\$25,648	\$25,169	\$25,116	\$24,859	\$27,338	\$30,523	\$31,235	\$31,174	\$32,359
Portland - Columbia	\$1,492	\$1,570	\$1,591	\$1,759	\$1,715	\$1,722	\$1,878	\$2,149	\$2,287	\$2,074	\$2,129	\$2,468
Easton - Phillipsburg	\$9,012	\$9,121	\$8,919	\$8,917	\$9,341	\$9,428	\$8,783	\$9,249	\$9,278	\$9,148	\$8,309	\$8,798
I - 78	\$33,819	\$33,762	\$34,419	\$36,641	\$37,542	\$37,587	\$37,589	\$46,278	\$53,511	\$55,527	\$57,445	\$59,563
New Hope - Lambertville	\$2,236	\$1,999	\$2,081	\$2,272	\$2,096	\$2,303	\$2,269	\$2,664	\$2,996	\$3,098	\$3,143	\$3,144
Trenton - Morrisville	\$8,277	\$8,825	\$9,181	\$9,194	\$9,173	\$9,171	\$10,407	\$12,318	\$13,861	\$14,415	\$14,830	\$15,327
<b>Total</b>	<b>\$79,053</b>	<b>\$79,403</b>	<b>\$80,433</b>	<b>\$85,618</b>	<b>\$86,196</b>	<b>\$86,529</b>	<b>\$86,974</b>	<b>\$101,350</b>	<b>\$113,941</b>	<b>\$117,036</b>	<b>\$118,576</b>	<b>\$123,289</b>

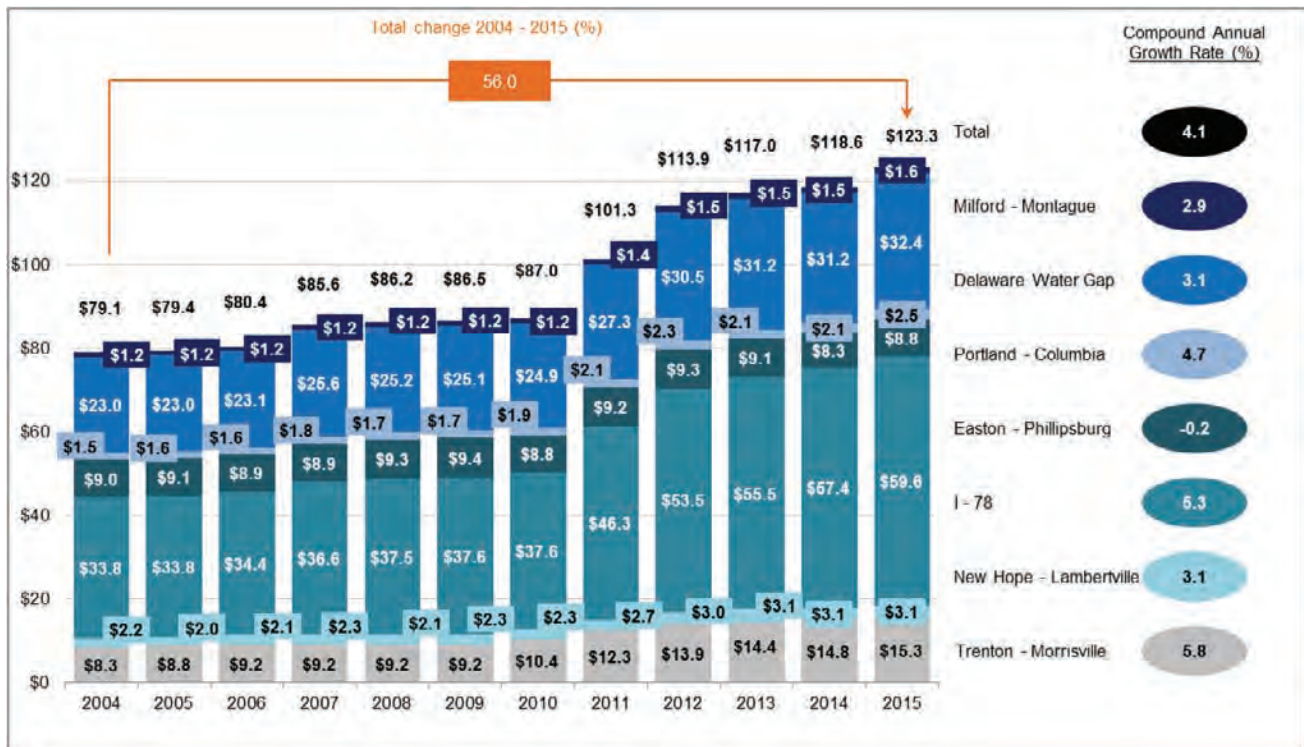
\*Truck Only Toll Increase Year

\*\*Adjustment to Toll Discounts

\*\*\*Car and Truck Toll Increase Year

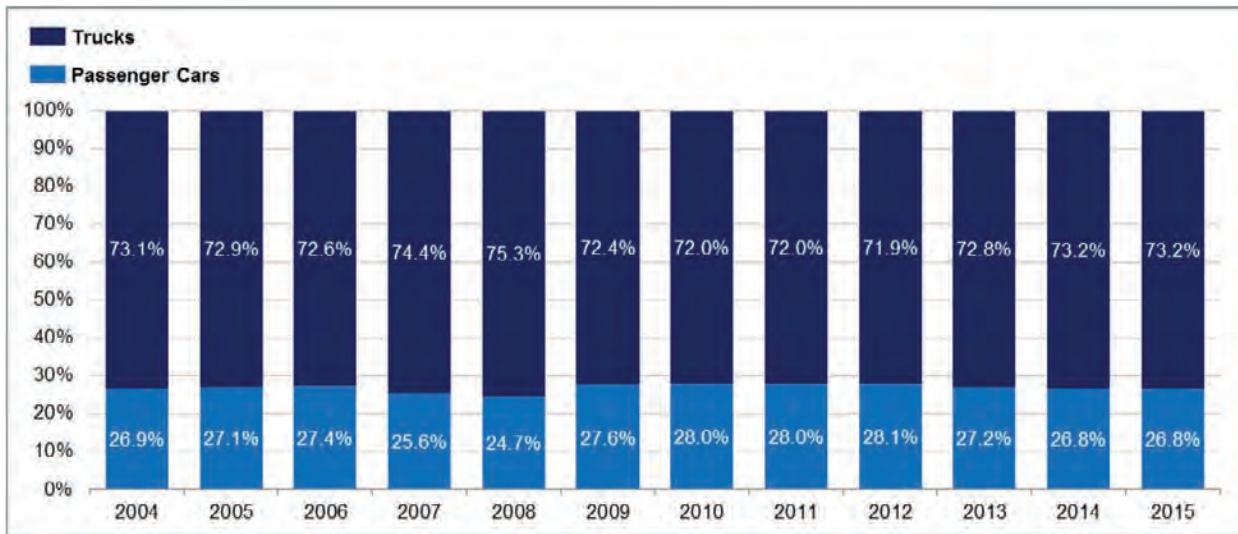
Figure 3-10 illustrates the total DRJTBC toll revenue trends over the twelve year period. Overall, total toll revenue grew by an average of 4.1 percent each year with toll revenue on the Trenton-Morrisville and I-78 bridges increasing the most over the twelve year period. Most of the recent revenue increase was due to the June 2011 toll discount adjustment.

**Figure 3-10: Historical DRJTBC Total Toll Revenue, \$Millions, 2004 to 2015**



The distribution of toll revenue between passenger cars and trucks has seen little change over the years as shown in Figure 3-11. Overall, the truck share of toll revenue peaked before the recession at 75.3 percent in 2008 and dipped to 71.9 to 72.0 percent in the post-recessionary years of 2010 through 2012. In 2015, truck toll revenue made up 73.2 percent of total toll revenue and car revenue made up 26.8 percent of total toll revenue.

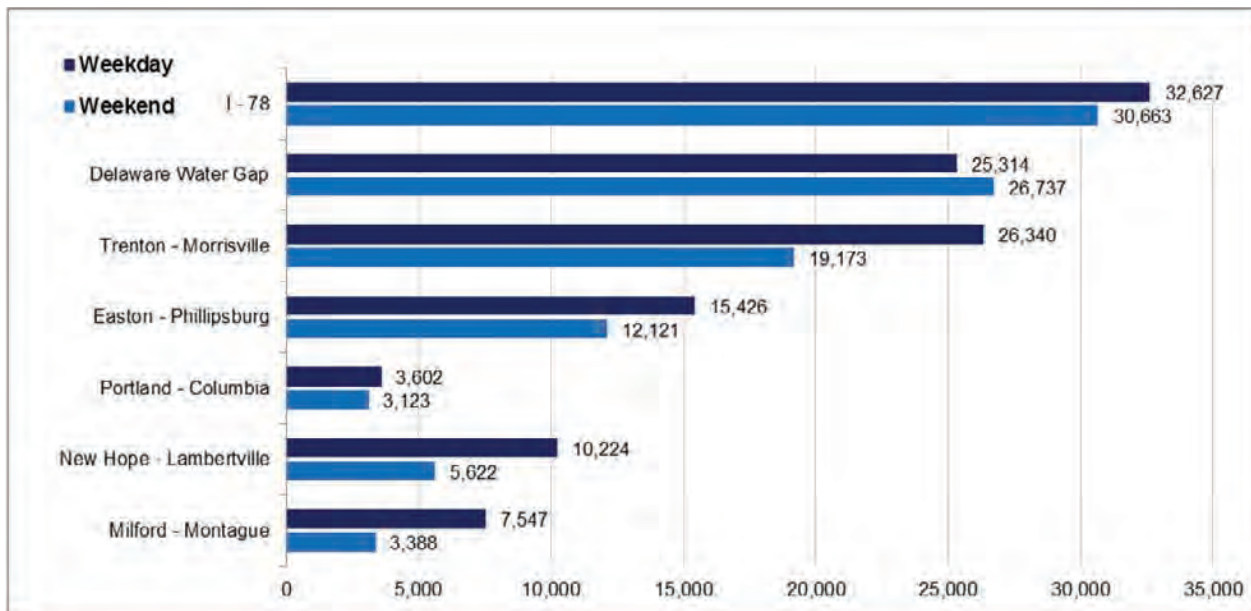
**Figure 3-11: DRJTBC Passenger Car vs. Truck Distribution of Toll Revenue, 2004 to 2015**



### 3.3 Average Daily Toll Traffic

Figure 3-12 displays average daily traffic estimates for an average weekday and an average weekend day, calculated from a sample of October 2016.

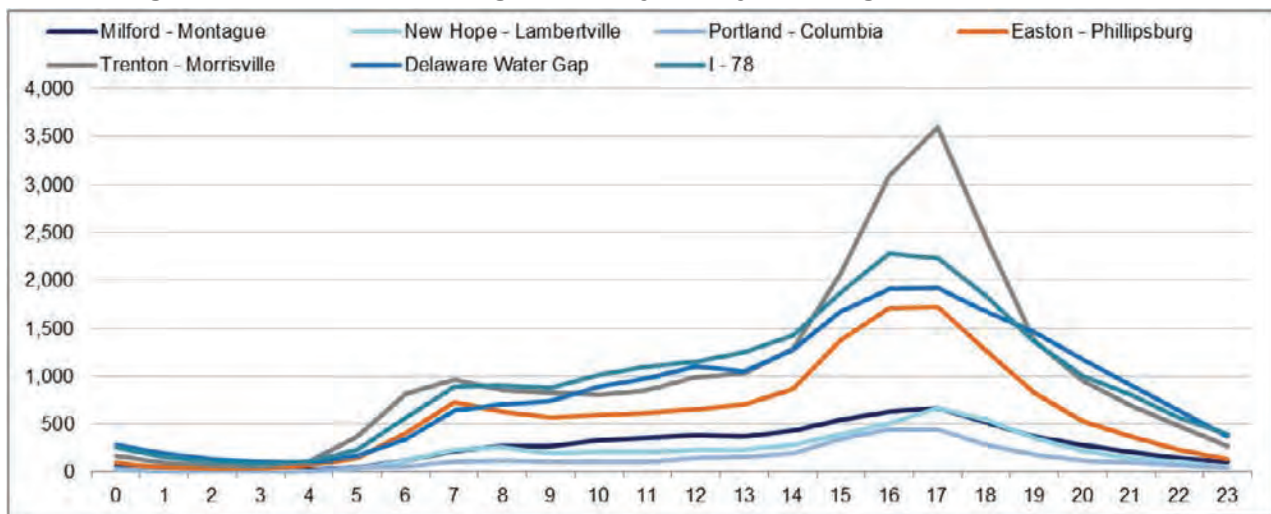
**Figure 3-12: DRJTBC Average Daily Toll Traffic, Sample from October 2016**



We can see that the I-78 and Trenton-Morrisville Toll Bridges carry the most traffic on weekdays and the I-78 and Delaware Water Gap Toll Bridges carry the most weekend traffic. All of the bridges except for the Delaware Water Gap Bridge support more weekday traffic than weekend traffic.

Toll traffic patterns on the DRJTBC bridges vary throughout the day as shown in Figure 3-13. As shown in Figure 3-13, hourly passenger car traffic on an average weekday follow a fairly typical commuter pattern where traffic levels are low at the beginning of the day; rise during the morning peak hours; flatten somewhat during the middle of the day; peak again during the afternoon rush hours; and then decline at the end of the day. This pattern is observed across all the DRJTBC toll bridges. The Trenton-Morrisville Bridge experiences the highest passenger car traffic volumes in both the morning and afternoon peak periods.

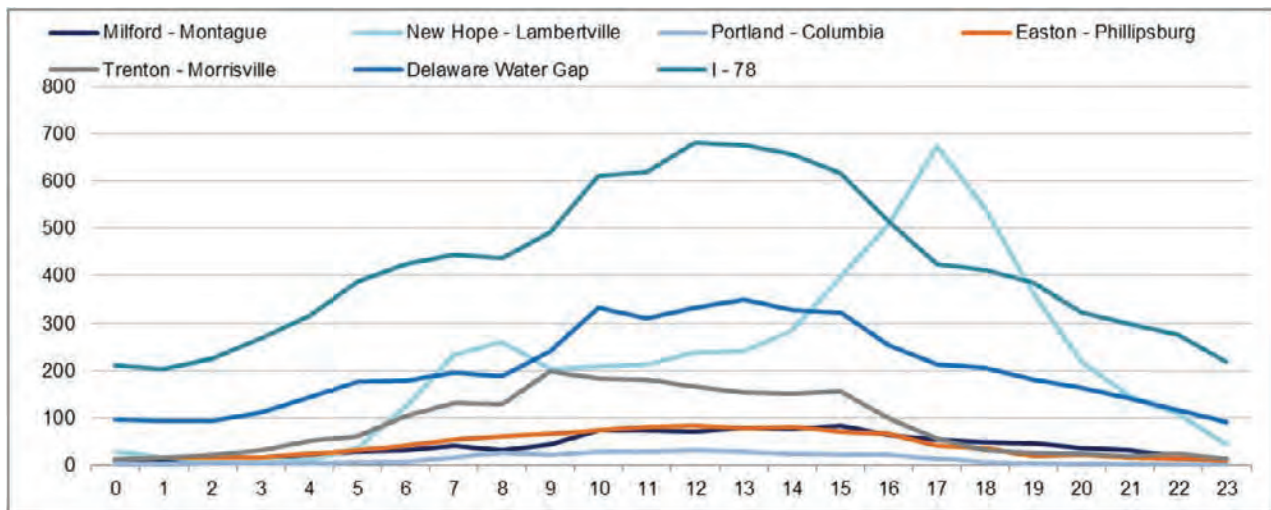
**Figure 3-13: DRJTBC Average Weekday Hourly Passenger Car Toll Traffic, 2016**



Hourly truck traffic volumes on an average weekday do not exhibit the same trends as observed in the hourly passenger car weekday traffic data. As shown in Figure 3-14, truck traffic over the DRJTBC toll bridges follow a more typical long distance pattern, building steadily during the morning, peaking somewhere in the 10am to 2pm timeframe, and decreasing again at the end of the day. The I-78 Bridge experiences the highest level of truck traffic throughout the typical weekday. Interestingly the New Hope-Lambertville Bridge experiences a peaking of truck traffic during the 5pm-6pm hour.



**Figure 3-14: DRJTBC Average Weekday Hourly Truck Toll Traffic, 2016**



Hourly traffic patterns on weekend days differ from weekdays for both passenger cars and trucks. As shown in Figure 3-15, passenger car traffic on an average weekend day builds steadily during the morning and reaches its apex in the middle of the day, typically between 11am and 1pm before declining during the remainder of the day. Interestingly the Delaware Water Gap Bridge experiences a slight peaking of passenger car traffic during the 11pm-12am hour.

**Figure 3-15: DRJTBC Average Weekend Day Hourly Passenger Car Toll Traffic, 2016**

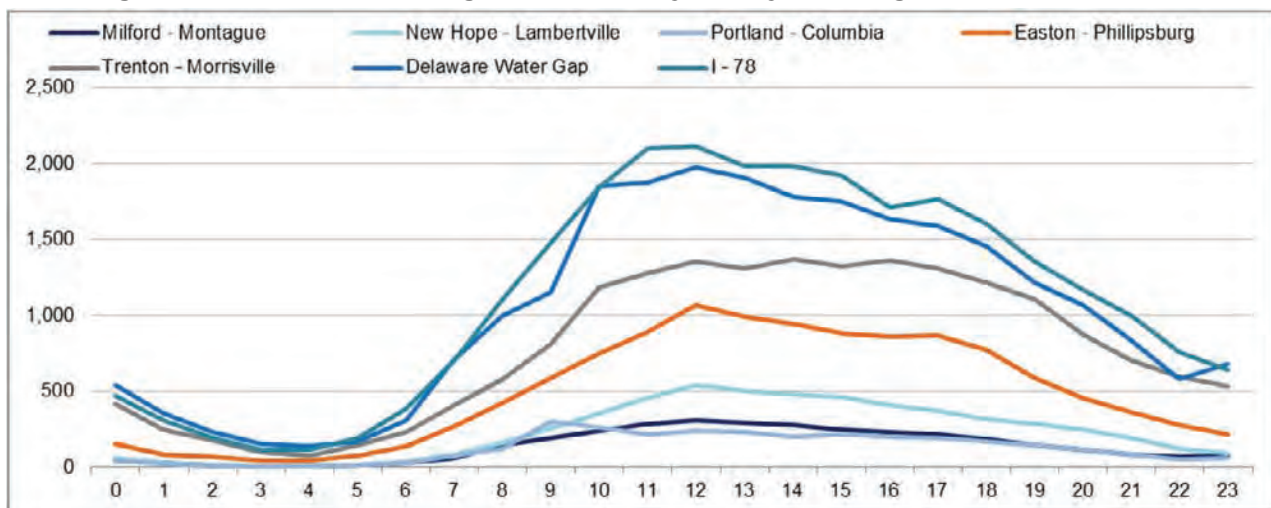
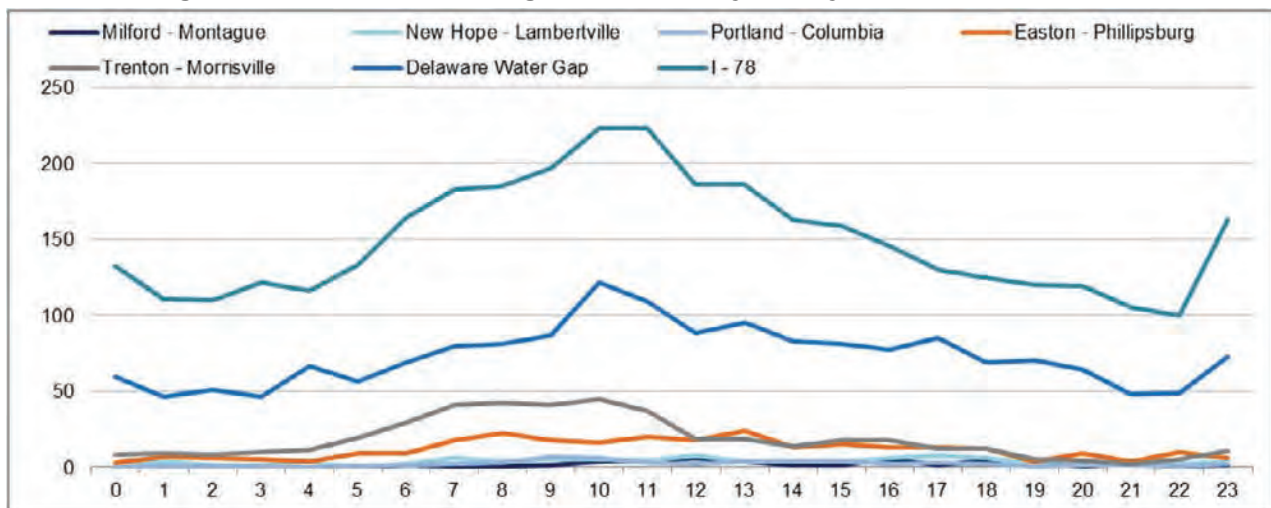


Figure 3-16 shows that the hourly truck traffic pattern for an average weekend day is somewhat similar to the pattern observed for passenger cars with truck traffic increasing in

the morning, peaking before midday, and then declining in the evening hours, with a few having another, smaller peak between 11pm and 12am (I-78, Delaware Water Gap and Trenton-Morrisville bridges). Truck traffic on the Easton-Phillipsburg and Trenton-Morrisville bridges tends to peak earlier on a weekend day compared to passenger car traffic.

**Figure 3-16: DRJTBC Average Weekend Day Hourly Truck Toll Traffic, 2015**



### 3.4 Average Toll Rates

As shown in Table 3-7, the average toll rate per trip paid by passenger cars increased from 2004 to 2015 across all DRJTBC toll bridges. Average toll rates remained relatively unchanged from 2004 to 2008 and then rose in 2009 with elimination of the standard E-ZPass discount and in mid-2011 with the toll increase. In 2015, passenger car toll rates averaged between \$0.95 and \$0.97 across the seven toll bridges.

**Table 3-7: Average DRJTBC Toll Rates for Passenger Cars, \$ per Trip**

Year	Bridge							System Wide
	T-M	NH-L	I-78	E-P	P-C	DWG	M-M	
2004	\$0.67	\$0.66	\$0.68	\$0.67	\$0.66	\$0.67	\$0.66	<b>\$0.67</b>
2005	\$0.67	\$0.65	\$0.67	\$0.66	\$0.66	\$0.67	\$0.66	<b>\$0.67</b>
2006	\$0.66	\$0.65	\$0.67	\$0.66	\$0.66	\$0.67	\$0.66	<b>\$0.66</b>
2007	\$0.67	\$0.65	\$0.67	\$0.65	\$0.66	\$0.67	\$0.66	<b>\$0.66</b>
2008	\$0.67	\$0.64	\$0.66	\$0.65	\$0.66	\$0.67	\$0.66	<b>\$0.66</b>
2009	\$0.75	\$0.72	\$0.73	\$0.73	\$0.72	\$0.73	\$0.73	<b>\$0.73</b>
2010	\$0.75	\$0.71	\$0.73	\$0.72	\$0.72	\$0.73	\$0.72	<b>\$0.73</b>
2011	\$0.86	\$0.85	\$0.86	\$0.85	\$0.85	\$0.86	\$0.86	<b>\$0.86</b>
2012	\$0.97	\$0.96	\$0.98	\$0.97	\$0.97	\$0.98	\$0.97	<b>\$0.97</b>
2013	\$0.98	\$0.97	\$0.97	\$0.97	\$0.97	\$0.98	\$0.97	<b>\$0.97</b>
2014	\$0.96	\$0.97	\$0.97	\$0.97	\$0.96	\$0.96	\$0.97	<b>\$1.00</b>
2015	\$0.97	\$0.97	\$0.97	\$0.96	\$0.96	\$0.95	\$0.96	<b>\$0.96</b>

Similar to other toll facilities around the country, the average toll rate per trip paid by trucks on DRJTBC toll facilities was significantly higher than the average rate paid by passenger cars. While the truck toll rates are the same at all the bridges, the average axle count of the trucks crossing each bridge differs. As shown in Table 3-8, average truck toll rates started increasing in mid-2007 with the toll increase for larger trucks, again in 2009 with the reduction or removal of E-ZPass discounts, and in mid-2011 with a larger toll increase. In 2015, average toll rates for trucks by bridge ranged from \$10.05 to \$17.79, with a weighted average toll rate of \$16.64 across all seven toll bridges.

**Table 3-8: Average DRJTBC Toll Rates for Trucks, \$ per Trip**

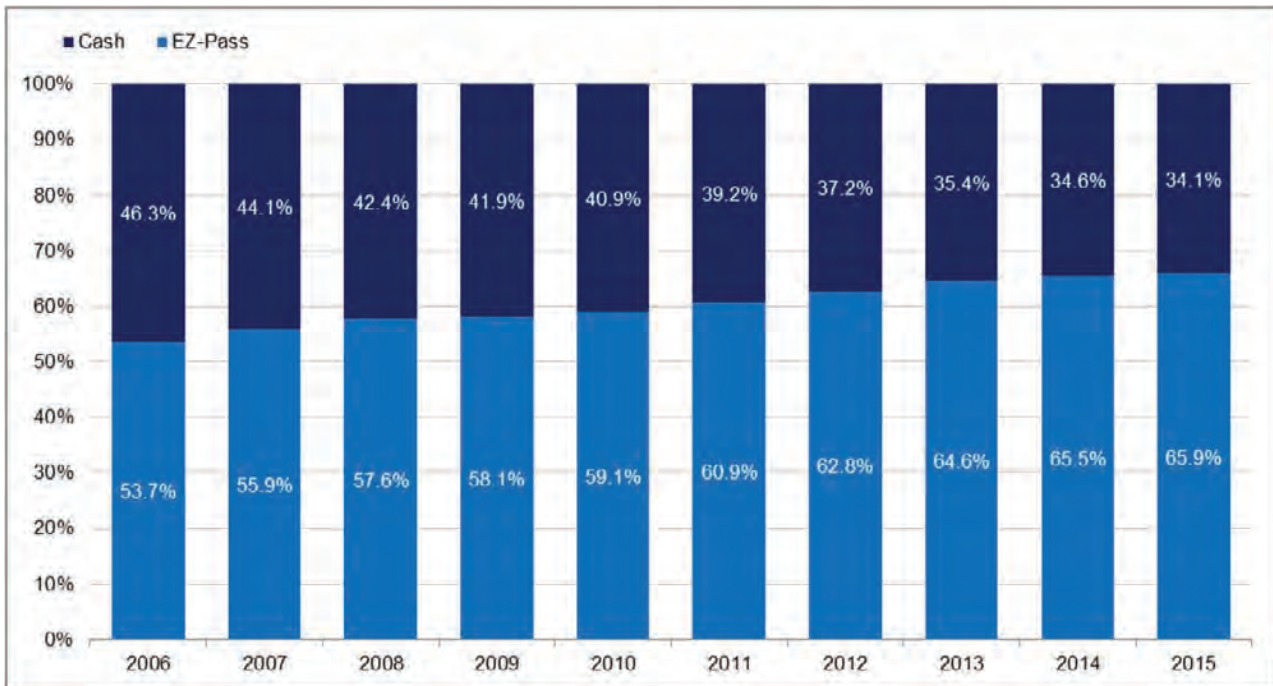
Year	Bridge							System Wide
	T-M	NH-L	I-78	E-P	P-C	DWG	M-M	
2004	\$9.03	\$7.98	\$12.07	\$9.79	\$9.79	\$11.85	\$7.73	<b>\$11.33</b>
2005	\$9.05	\$7.96	\$11.98	\$9.73	\$9.73	\$11.80	\$7.61	<b>\$11.25</b>
2006	\$9.00	\$7.83	\$11.93	\$9.67	\$9.24	\$11.76	\$7.42	<b>\$11.19</b>
2007	\$9.75	\$8.52	\$13.16	\$10.35	\$10.04	\$13.07	\$7.73	<b>\$12.33</b>
2008	\$10.18	\$8.71	\$13.95	\$10.91	\$10.50	\$13.79	\$7.90	<b>\$13.00</b>
2009	\$10.34	\$8.92	\$14.49	\$11.43	\$10.79	\$14.26	\$8.19	<b>\$13.49</b>
2010	\$10.29	\$9.04	\$14.52	\$11.12	\$10.96	\$14.23	\$8.06	<b>\$13.46</b>
2011	\$11.82	\$10.24	\$16.21	\$12.29	\$12.50	\$15.94	\$9.35	<b>\$15.11</b>
2012	\$13.01	\$11.49	\$17.86	\$13.12	\$13.64	\$17.56	\$10.51	<b>\$16.69</b>
2013	\$12.94	\$11.30	\$17.83	\$13.16	\$13.50	\$17.58	\$10.42	<b>\$16.66</b>
2014	\$17.88	\$17.61	\$12.99	\$12.95	\$13.70	\$11.63	\$10.10	<b>\$16.73</b>
2015	\$17.79	\$17.52	\$12.86	\$12.95	\$13.79	\$11.71	\$10.05	<b>\$16.64</b>

### 3.5 E-ZPass Utilization

Utilization of E-ZPass as a method of payment has increased on DRJTBC toll bridges in the last 10 years. As illustrated in Figure 3-17, the percentage of trips paid for using an E-ZPass transponder increased from 53.7 percent in 2006 to 65.9 percent in 2015. Utilization rates have increased in each of the past ten years but there is a wide variance in utilization between passenger cars and trucks on DRJTBC toll bridges.

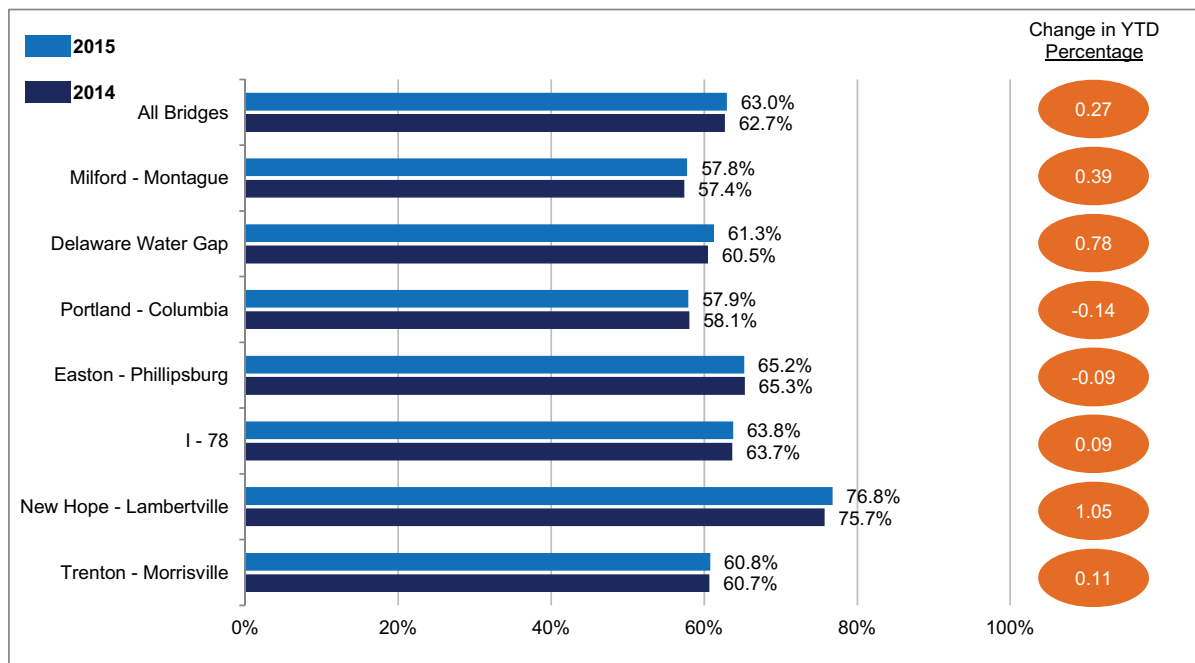


**Figure 3-17: Annual E-ZPass Utilization on DRJTBC Toll Bridges**



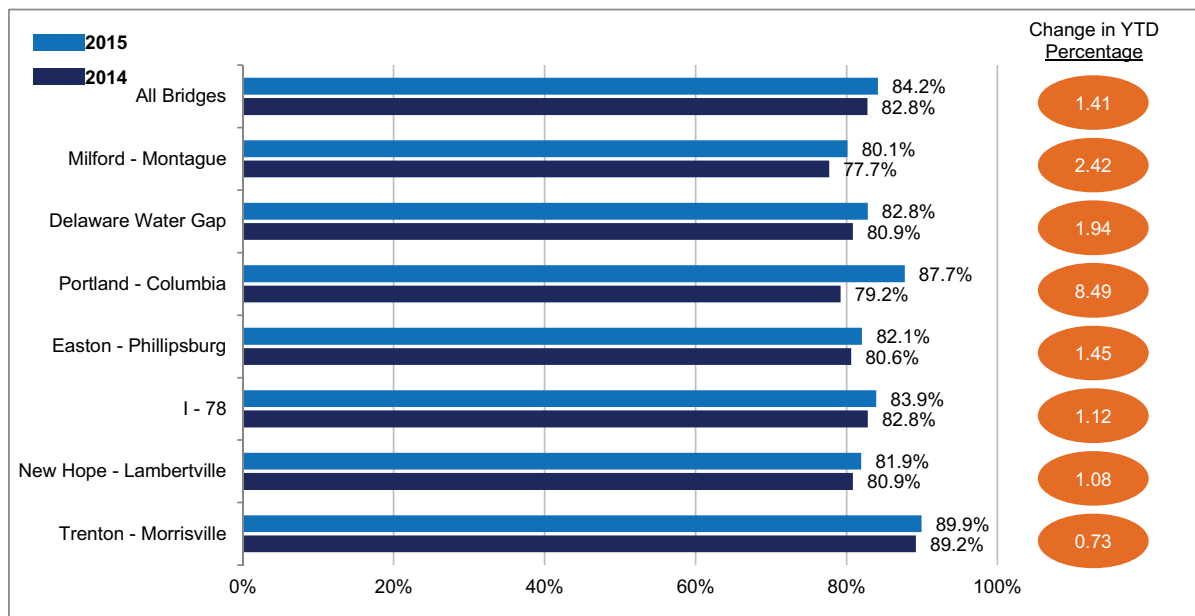
As shown in Figure 3-18, passenger car E-ZPass utilization ranged from a low of 57.8 percent on the Milford-Montague Bridge to a high of 76.8 percent on the New Hope Lambertville Bridge in 2015. Passenger car E-ZPass utilization increased on all toll bridges between 2014 and 2015, except the Portland-Columbia Bridge and at Easton-Phillipsburg, which both had a decline of approximately 0.1 percent.

**Figure 3-18: 2014 and 2015 Passenger Car E-ZPass Utilization on DRJTBC Toll Bridges**



Trucks are more likely than passenger cars to pay for their trips using E-ZPass transponders. As shown in Figure 3-19, E-ZPass utilization rates in 2015 ranged from a low of 80.1 percent on the Milford-Montague Bridge to a high of 89.9 for the Trenton-Morrisville Bridge. Approximately 84.2 percent of all trucks trips on DRJTBC toll facilities used E-ZPass. In 2015, truck E-ZPass utilization increased over 2014 levels for all bridges.

**Figure 3-19: 2014 and 2015 Truck E-ZPass Utilization on DRJTBC Toll Bridges**



## **4.0 SCUDDER FALLS BRIDGE DATA COLLECTION AND ANALYSES**

This section describes the extensive 2014 data collection efforts that were done for the 2014 Scudder Falls Investment-Grade Traffic and Revenue Study and incorporated into these analyses of the Scudder Falls Bridge. This data collection program included:

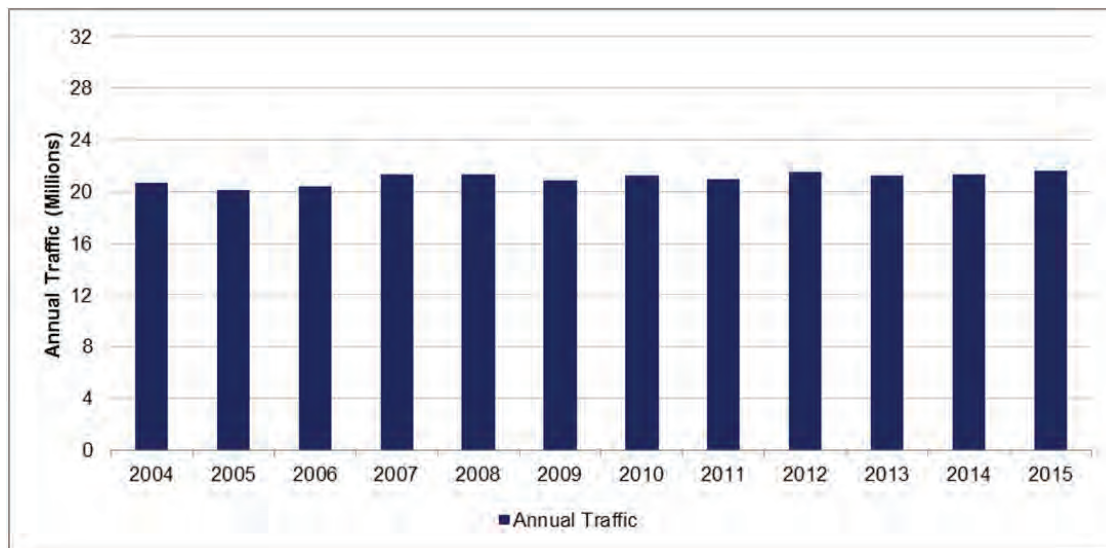
- hourly traffic counts on the Scudder Falls Bridge,
- license plate surveys,
- counts of vehicles equipped with E-ZPass,
- travel time surveys, and
- Scudder Falls Bridge customer characteristic surveys via Jacobs-designed online surveys.

As no significant volume shifts or changes to land use or the regional highway system have occurred between 2014 and 2016, it was deemed unnecessary to redo the full survey program and instead it was supplemented with recent counts on the bridges.

### **4.1 Historical Data**

DRJTBC collects traffic count data on all of its facilities, including its toll-supported bridges. Figure 4-1 shows the annual two-way traffic counts and annual traffic growth on the Scudder Falls Bridge from 2004 through 2015. During this 12-year period, traffic has been relatively stable, hovering around 21 million crossings per year.

**Figure 4-1: Historical 2-Way Traffic Volumes on the Scudder Falls Bridge, 2004 - 2015**

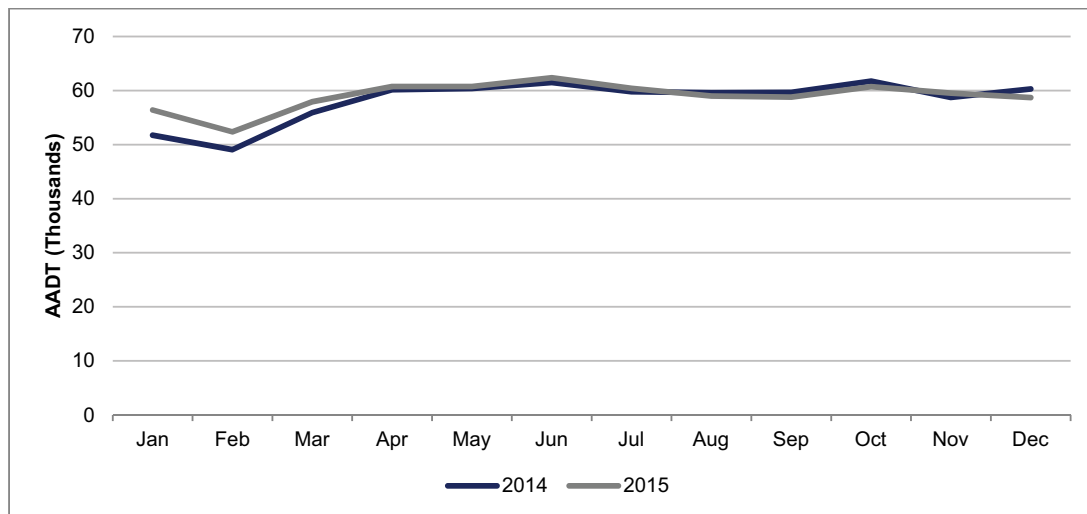


*Note: From 2006 to 2009 the Trenton-Morrisville Toll Bridge was under construction.*

*Source: DRJTBC*

Figure 4-2 compares monthly two-way average annual daily traffic (AADT) for 2014 and 2015 on the Scudder Falls Bridge, from data received by the DRJTBC. As in all investment-grade Traffic and Revenue studies, Jacobs conducted project-specific traffic counts (as provided in the next section) in order to supplement these existing data sources.

**Figure 4-2: Historical Monthly Distribution of Two-way Daily Traffic on the Scudder Falls Bridge, 2014 and 2015**

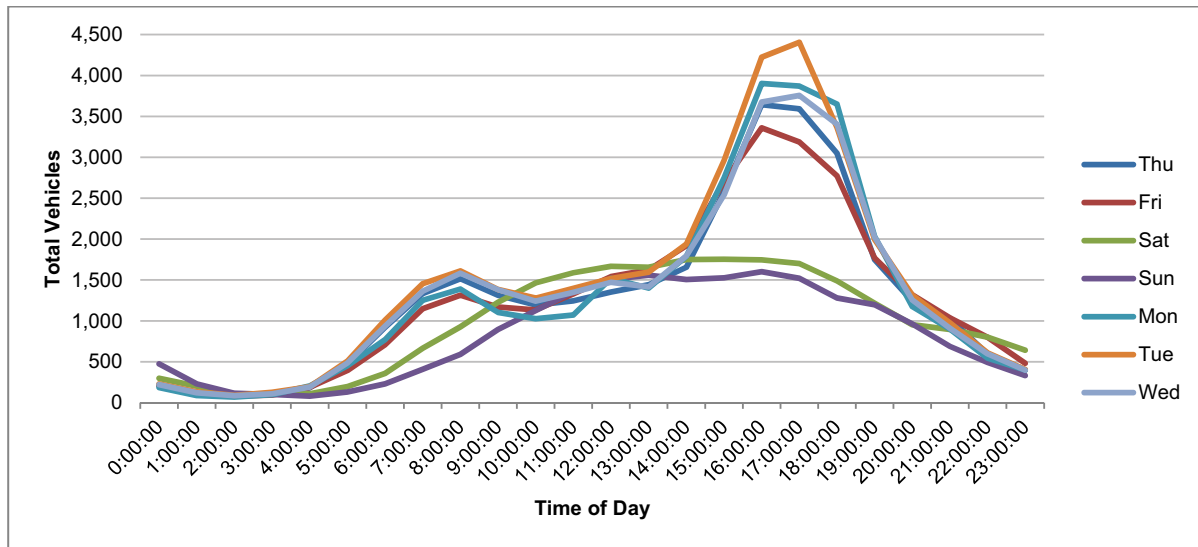


*Source: DRJTBC*

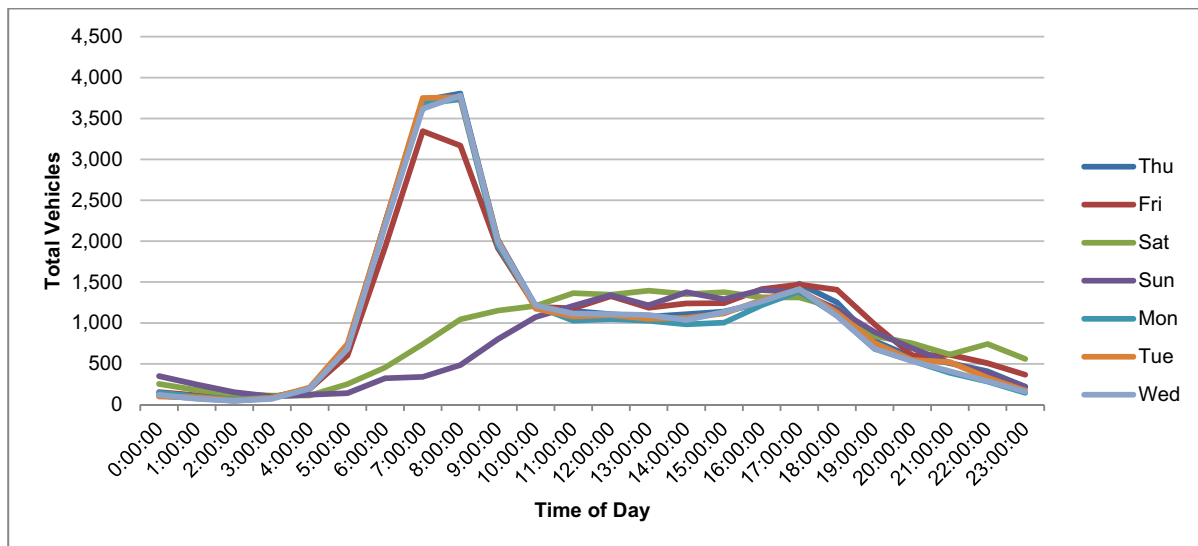
## 4.2 Traffic Counts

Traffic counts by direction on the Scudder Falls Bridge between October 22<sup>nd</sup> and October 28<sup>th</sup> 2015 were provided to Jacobs by the Commission. Figure 4-3 and Figure 4-4 show the daily counts by hour for southbound and northbound traffic.

**Figure 4-3: Southbound Hourly Traffic on Scudder Falls Bridge, 10/22/15-10/28/15**



**Figure 4-4: Northbound Hourly Traffic on Scudder Falls Bridge, 10/22/15-10/28/15**



Data from the Commission's facilities reveals that October is an average month in terms of daily traffic volumes. Therefore, 2015 Average Annual Daily Traffic (AADT) and Average Annual Weekday Traffic (AAWDT) were estimated to be the same as the counted traffic shown in Table 4-1.

**Table 4-1: 2014 Estimated AADT and AAWDT, based on October 22-28, 2015 Count Data**

	<b>Southbound</b>	<b>Northbound*</b>
Annual Average Daily Traffic (AADT)	29,068	23,647
Annual Average Weekday Traffic (AAWDT)	32,011	25,705

*\* Approximately eleven hours (or 6%) of traffic counts during the one-week period had missing or faulty counts in the northbound and southbound direction; Jacobs estimated counts for these few hours.*

The count data also separated vehicles by class. It was calculated from the data that 5.0 percent of average daily traffic is trucks.

### 4.3 License Plate Surveys

In order to determine the amount of traffic currently using the Bridge that is from New Jersey and Pennsylvania, and to help us determine potential Toll-by-Plate invoicing for an All Electronic Toll Facility (AET), a license plate survey had been conducted for Jacobs' previous study on the Scudder Falls Bridge by Jacobs' subconsultant Arora and Associates, PC. This survey took place on Tuesday, April 1<sup>st</sup>, 2014 for two hours each during the AM peak, midday and PM peak periods. This survey was done in the westbound / southbound direction only (the direction of potential future tolling). Results are shown in Table 4-2. As expected, the majority of vehicles (some 90 percent) are registered in PA or NJ, with more from PA overall (as Pennsylvania to New Jersey is the major home to work commute direction). Note that eight percent of peak period and 12 percent of off-peak vehicles are from neither PA nor NJ.

**Table 4-2: Southbound Scudder Falls Bridge License Plate Count Results, April 2014**

PERIOD	Traffic Volume by State License Plate								PERIOD
	PA	NJ	NY	CT	DE	MD	OTHER NE*	OTHERS**	TOTAL
7:30AM TO 9:30AM	671	2221	22	11	10	49	74	82	<b>3140</b>
	21%	71%	1%	0%	0%	2%	2%	3%	
12:00PM TO 2:00PM	1383	1062	45	12	15	29	60	185	<b>2791</b>
	50%	38%	2%	0%	1%	1%	2%	7%	
3:00PM TO 5:00PM	4920	1033	71	12	34	35	145	256	<b>6506</b>
	76%	16%	1%	0%	1%	1%	2%	4%	

\*- New England States of MA, RI, VT, NH, ME

\*\* - All other States except PA, NJ, NY, CT, DE, MD, RI, NH, VT, MA, ME

Note: May not appear to add to 100% due to rounding

#### 4.4 Counts of Vehicles Equipped with E-ZPass

A temporary E-ZPass reader was installed by the Commission at the Bridge for one week, from April 1<sup>st</sup> through April 7<sup>th</sup> 2014. This was done to determine how many vehicles currently crossing the Scudder Falls Bridge in the southbound direction were already equipped with E-ZPass. Table 4-3 summarizes the counts of E-ZPass vehicles by tag agency. Along with this data collection effort, traffic counts had been conducted during the same timeframe; these two data collection efforts helped us to determine the percentage of existing vehicles equipped with E-ZPass.

It was found that 49 percent of weekday vehicles and 46 percent of weekend vehicles crossing on the survey days had a readable E-ZPass transponder. Some 78 percent of those with E-ZPass had obtained it from the NJ Turnpike (some 44 percent) or the Pennsylvania Turnpike Commission (some 34 percent). It is assumed that there were some E-ZPass transponders that were not displayed (as some E-ZPass customers do not keep their transponder affixed to their windshield at all times) and/or not read.



**Table 4-3: Southbound Scudder Falls Bridge E-ZPass Counts, April 2014 (Raw Data)**

Agency	Southbound Transponder Reads			Avg Day Share by Agency
	Avg Weekday	Avg Weekend Day	Avg Day	
NYSTA/NYSBA	509	336	460	3.2%
PANYNJ	990	795	934	6.5%
PTC	5,581	3,090	4,869	33.7%
MTAB&T	501	458	489	3.4%
DRPA	9	4	8	0.1%
VDOT	58	83	65	0.4%
Peace Br	4	2	4	0.0%
Illinois	57	37	51	0.4%
MdTA	121	160	132	0.9%
DelDOT	143	145	143	1.0%
MassPike	92	64	84	0.6%
NJTPKE	6,854	5,270	6,401	44.3%
WV	6	3	5	0.0%
DRBA	17	13	16	0.1%
NHDOT	12	10	11	0.1%
Maine	10	7	9	0.1%
DRJTBC	875	468	759	5.2%
Indiana	5	5	5	0.0%
Ohio	10	7	9	0.1%
RITBA	5	3	4	0.0%
NC	1	1	1	0.0%
<b>Total E-ZPass Reads</b>	<b>15,860</b>	<b>10,959</b>	<b>14,460</b>	<b>100.0%</b>
<b>Total SB Traffic</b>	<b>32,207</b>	<b>23,779</b>	<b>29,799</b>	
<b>% E-Zpass</b>	<b>49.2%</b>	<b>46.1%</b>	<b>48.5%</b>	

## 4.5 Travel Time Surveys

Travel time surveys were conducted in April 2014 in order to indicate time differences between trips taking the Scudder Falls Bridge and alternate routes. These results factor into our estimates of who would remain on the new tolled Scudder Falls Bridge versus using another bridge in the area. The southbound origin-destination (O-D) study that was part of the surveys conducted by Jacobs during the Level 2 Scudder Falls Bridge T&R Study in 2009 indicated two major clusters of origin points in New Jersey for Scudder Falls Bridge customers.

The two major origin points that were used as the starting locations for the travel time surveys were:

- Ewing, NJ at Scotch Road and Parkway Avenue
- The I-95/Rte 1 interchange in Lawrence, NJ (which would include the majority of trips from the north and east)

Three major clusters of destination points were identified on the Pennsylvania side, and were used as the ending points for the travel time surveys:

- Newtown, PA at Lincoln Ave. and Washington Ave.
- Yardley, PA at Afton Ave. and Schuyler Dr.
- The I-95/Rte 1 interchange in Langhorne, PA (which would include the majority of the trips from the south and west)

The travel time surveys were conducted the first week of April 2014, from Tuesday through Thursday, by Jacobs' subconsultant Arora and Associates, PC, between each combination of O-D pairs during peak and off-peak periods. Different routes were traveled between each O-D pair, using the Scudder Falls Bridge and using alternative bridges where they made sense as alternate routes (as an example, for a trip between Lawrence and Langhorne, the Washington Crossing Toll Supported Bridge is *not* a reasonable alternative because it is located well outside the area of travel and would add significant journey time, but the Route 1/Trenton-Morrisville Toll Bridge and the Lower Trenton Toll-Supported Bridge are reasonable alternatives). As shown in Table 4-4, the Scudder Falls Bridge is always the fastest route between these points, except between the two I-95/ Route 1 interchanges, where the travel time using the Trenton-Morrisville Toll Bridge is very similar to and sometimes shorter than the travel time using the Scudder Falls Bridge. PM Peak travel times on these New Jersey to Pennsylvania routes are typically longer than the AM and midday times, and the routes via the three smaller toll-supported bridges (Lower Trenton, Calhoun St, and Washington Crossing) typically experience a greater increase in PM peak travel time than the two larger bridges.

**Table 4-4: Travel Times between O-D Pairs, Using Scudder Falls Bridge and Alternative Crossings, April 2014**  
(in minutes)

<b>AM Peak Period</b>						
From	To	Scudder Falls Br.	Trenton-Morrisville Toll Br.	Lower Trenton Toll Supported Br.	Calhoun St. Toll Supp. Br.	Washington Crossing Toll Supp. Br.
Ewing, NJ	Yardley, PA	12.4			18.3	
Ewing, NJ	I-95/Rte 1 Int., PA	11.5	18.0	17.8		
Ewing, NJ	Newtown, PA	13.0				23.0
I-95/Rte 1 Int., NJ	Yardley, PA	14.1		18.5		
I-95/Rte 1 Int., NJ	I-95/Rte 1 Int., PA	13.6	13.4	18.0		
I-95/Rte 1 Int., NJ	Newtown, PA	16.9	23.0	25.5		
<b>Midday / Off-Peak Period</b>						
From	To	Scudder Falls Br.	Trenton-Morrisville Toll Br.	Lower Trenton Toll Supported Br.	Calhoun St. Toll Supp. Br.	Washington Crossing Toll Supp. Br.
Ewing, NJ	Yardley, PA	10.8			18.4	
Ewing, NJ	I-95/Rte 1 Int., PA	13.0	17.5	18.3		
Ewing, NJ	Newtown, PA	14.0				21.5
I-95/Rte 1 Int., NJ	Yardley, PA	14.4		18.0		
I-95/Rte 1 Int., NJ	I-95/Rte 1 Int., PA	13.7	14.3	17.0		
I-95/Rte 1 Int., NJ	Newtown, PA	16.8	21.0	25.0		
<b>PM Peak Period</b>						
From	To	Scudder Falls Br.	Trenton-Morrisville Toll Br.	Lower Trenton Toll Supported Br.	Calhoun St. Toll Supp. Br.	Washington Crossing Toll Supp. Br.
Ewing, NJ	Yardley, PA	10.4			20.2	
Ewing, NJ	I-95/Rte 1 Int., PA	11.5	18.5	21.5		
Ewing, NJ	Newtown, PA	14.5				22.0
I-95/Rte 1 Int., NJ	Yardley, PA	14.2		24.0		
I-95/Rte 1 Int., NJ	I-95/Rte 1 Int., PA	13.7	13.9	17.9		
I-95/Rte 1 Int., NJ	Newtown, PA	17.5	23.5	32.0		

## 4.6 Online Customer Characteristic Surveys

Online surveys were conducted in 2014 to obtain information on Scudder Falls Bridge current customer travel characteristics such as frequency of travel, state of residence, trip origin/destination, familiarity with electronic tolling, and stated preference (i.e., what a driver states they would do if the Scudder Falls Bridge were to be tolled). Results of the surveys were used in the development of Jacobs' traffic and revenue forecasting model. Note that only some of the results have been included herein; the full set of questions and analyses of responses are available in the Jacobs memo entitled "Scudder Falls Bridge Data Collection and Survey Results" included in the Appendix.

Two different methods were used to direct patrons to take the survey:

1. through e-Rewards, a service whereby e-Rewards members are e-mailed a survey link and earn e-Rewards points for completion of surveys, and
2. through variable message signs (VMS) displayed for several weeks near the Scudder Falls Bridge directing drivers to an internet link, "www.SURVEY-U.com".

### 4.6.1 e-Rewards Survey

The purpose of conducting an e-Rewards survey in addition to the roadside VMS survey was:

- to obtain responses from additional customers, and
- to include infrequent customers who may not have seen - or did not respond to - the VMS sign.

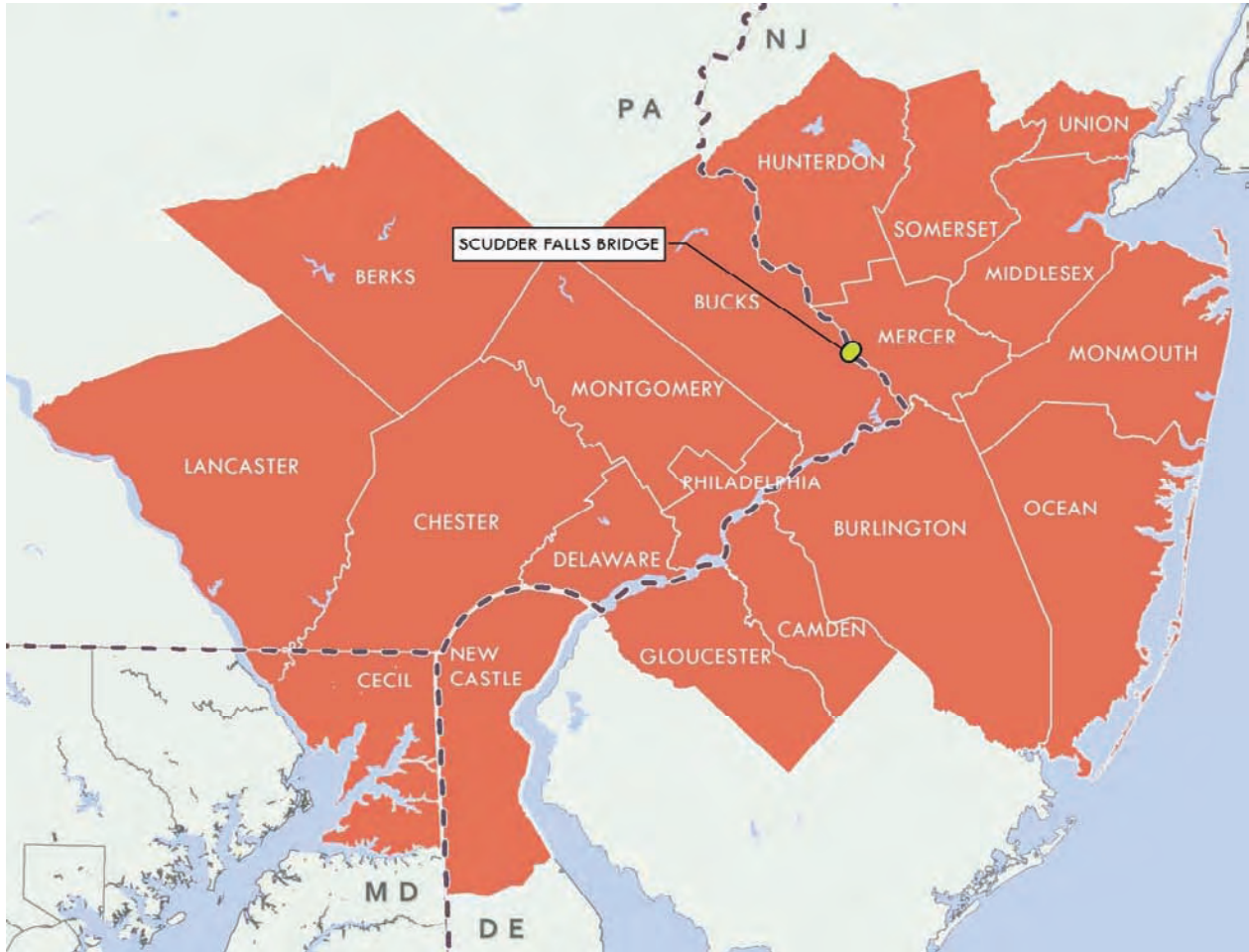
The e-Rewards survey, since it is sent to essentially a random sampling of people throughout the area, provides a far better indication of frequency of travel across the Bridge than the VMS survey, mainly because a person who sees the VMS sign advertising the survey over and over again (i.e., a frequent traveler) is much more likely to complete the survey than someone who sees it only once or not at all.

Research Now (parent company of e-Rewards) conducted the survey through their e-Rewards program. e-Rewards participants who did not meet the survey requirements – such as people without a driver's license, and people who state that they have not crossed the Scudder Falls Bridge at all in the past year – were screened out of the survey and were not included in Jacobs' quota of 1,000 completed surveys.

e-Rewards e-mailed the survey link to all e-Rewards participants within an area specified by Jacobs. This area, chosen by Jacobs to cover the parts of the DVRPC model region that were proximate to the Scudder Falls Bridge and I-95 – and therefore likely to contain both

frequent and infrequent Scudder Falls Bridge customers – consisted of 19 counties, as shown in Figure 4-5. The e-mails were sent and the survey commenced on March 25<sup>th</sup> 2014; the 1,000 quota was reached and the survey concluded on March 28<sup>th</sup>.

**Figure 4-5: Counties Included in e-Rewards Survey Area**



#### 4.6.2 VMS-Advertised SurveyMonkey Survey

The 2014 roadside VMS-advertised survey was administered by Jacobs through the internet survey site SurveyMonkey. Jacobs owns the web address “www.SURVEY-U.com,” which was linked to the Scudder Falls survey. “WWW.SURVEY-U.COM” was publicized to patrons of the Scudder Falls Bridge via four strategically located roadside variable message signs.

The two phases for the VMS were as follows:

Phase 1 -  
“TAKE  
TRAVEL  
SURVEY”

Phase 2 -  
“WWW.  
SURVEY-U  
.COM”

The Commission placed the VMS signs and displayed the messages on the two Pennsylvania signs from March 5th through March 28<sup>th</sup>, 2014. The two signs in New Jersey were displayed from March 5th through March 14<sup>th</sup>, 2014. The survey was kept open to collect responses until March 31<sup>st</sup>, 2014. Locations for these variable message signs are shown in Figure 4-6.



**Figure 4-6: Location of Variable Message Signs at Scudder Falls Bridge for 2014 Online Customer Characteristics Survey**



**Notes:**

VMS 1 & 3 faced Northbound (NB) traffic. VMS 2 & 4 faced Southbound (SB) traffic.

VMS 3 & 4 were removed on March 14, the 10<sup>th</sup> day of the survey.

### 4.6.3 Online Customer Characteristic Survey Results

From the 2014 survey, we had received 1,001 fully completed surveys from e-Rewards and 477 completed plus 32 partially-completed surveys from SurveyMonkey, the VMS-advertised survey. (This is in comparison to the 445 full and 27 partial surveys completed via the VMS surveys in the 2008-2009 Level 2 Traffic & Revenue study.)

The results for several of the questions that were expanded to represent total trips are presented in the following section, while the full set of survey questions and raw results can be found in Jacobs' memorandum entitled "Scudder Falls Bridge Data Collection and Survey Results" included in the Appendix.

#### 4.6.3.1 Trip Frequency

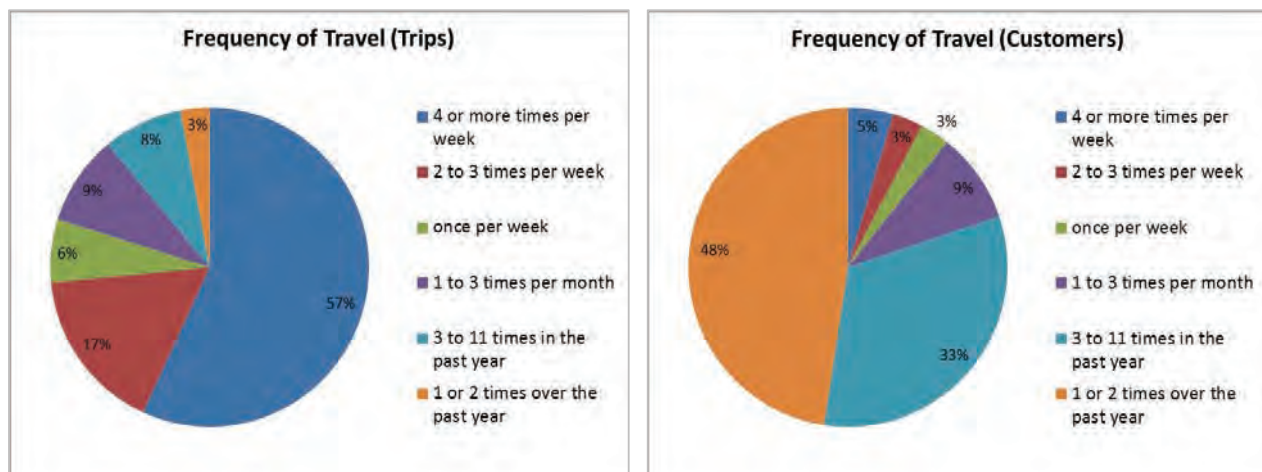
Some of the customer responses, in order to be effectively used in our traffic and revenue modeling, needed to be expanded to represent total trips across the Bridge. This expansion was achieved using the customer trip frequency profile, developed from responses to the question “How often do you travel southbound across the Scudder Falls Bridge?”

Jacobs developed the frequency profile by taking the following steps:

- Each SurveyMonkey response to the frequency question was assumed to represent one trip, as the survey captured travelers across the Scudder Falls Bridge for nearly one month.
- The e-Rewards survey, since it was not advertised to people crossing the Scudder Falls Bridge, represented customers from all around the area. Factors were applied to turn each customer (survey response) into trips. This is detailed in the paragraph following Figure 4-7.
- Because the SurveyMonkey responses were biased towards frequent users who saw the survey advertisements multiple times, and the e-Rewards respondents tended to be more infrequent users, the frequency profiles between the two surveys differed somewhat. We felt that by combining the e-Rewards and SurveyMonkey frequency data with equal weight, we would remove most of this bias.

Figure 4-7 represents the overall adjusted frequencies of trips and customers. As seen from these results, 5 percent of customers who travel four or more times a week across the Scudder Falls Bridge make 57 percent of the trips across the Bridge. The 48 percent of customers who cross the Scudder Falls Bridge once or twice per year make only 3 percent of the trips.

**Figure 4-7: Scudder Falls Bridge Frequency Profile (Expanded Data)**



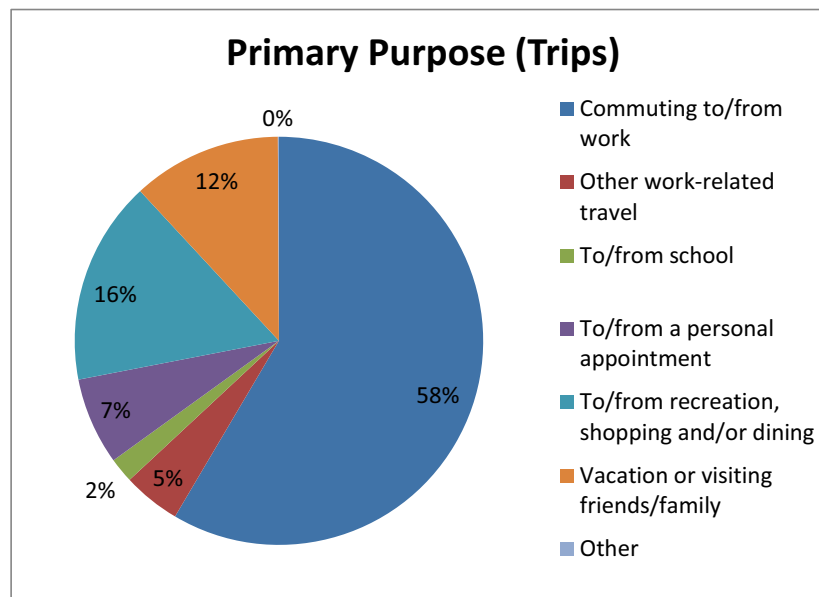


The remaining expanded data charts shown in this section apply the trip frequency of each customer in order to turn customers into trips. For example, if a customer takes one trip per week across the Scudder Falls Bridge, this represents 52 trips per year. A customer who takes 4 or more trips per week makes about 300 trips per year. A customer who states he traveled over the Scudder Falls Bridge one or two times over the past year was assumed to make, on average, 1.5 trips per year. Therefore the survey results were expanded using the appropriate factors to represent trips. It is important to expand customer results to trips because a trip represents a potential *toll transaction*, and we would like to know if this *toll transaction* will be made by someone who has E-ZPass (rather than know the general population that has E-ZPass), or if a potential Toll-by-Plate transaction will be made by someone who travels frequently (and therefore receives one toll invoice with multiple transactions) or very infrequently (and receives one toll invoice with only one transaction on it). This is significant data that we incorporated into our forecasting models and estimates of Toll-by-Plate collection costs.

#### **4.6.3.2 Trip Purpose**

Figure 4-8 shows survey customer data expanded to represent southbound total trips across the Scudder Falls Bridge in terms of trip purpose. The expanded data shows that almost two-thirds of the trips (58 percent plus 5 percent) on the Scudder Falls Bridge are for commuting or work-related travel. Only 2 percent of the trips are made for school, and the remaining one-third of trips on the Scudder Falls Bridge are for more discretionary travel, such as personal trips, shopping, or vacation.

**Figure 4-8: Scudder Falls Bridge Trip Purpose (Expanded Data)**



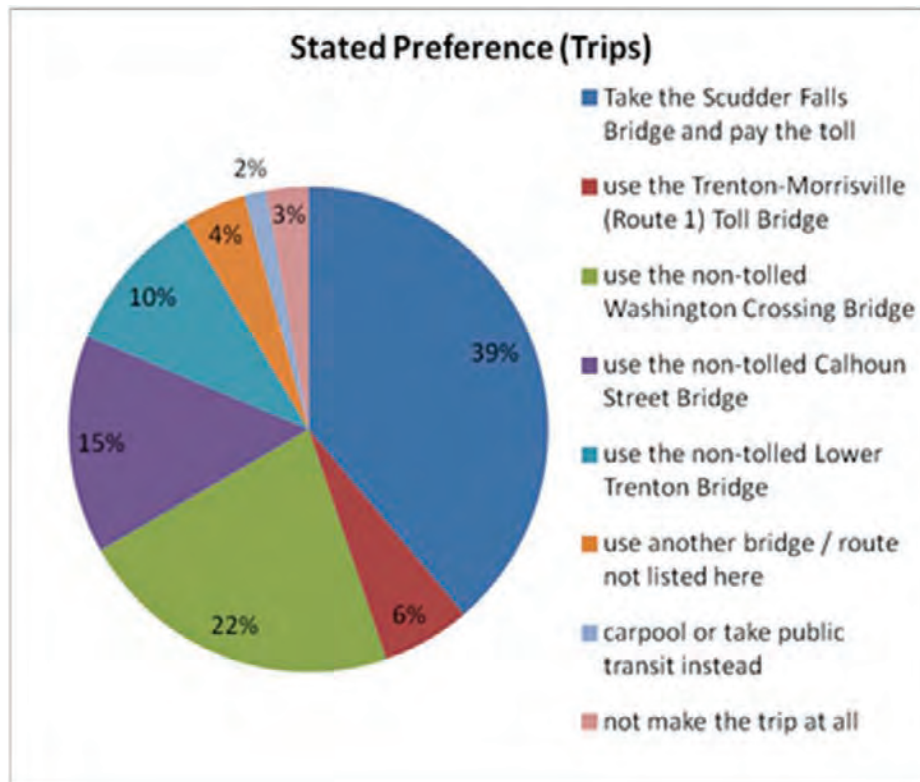
#### 4.6.3.3 Stated Preference Survey Question

Customers had been asked what they would do if they were to make the same trip but with a southbound toll on the Scudder Falls Bridge that is similar to the toll on the Trenton-Morrisville (Route 1) Bridge. From a customer standpoint, a majority of the e-Rewards customers (56 percent) stated that they would stay on the Scudder Falls Bridge and pay the toll, while only 36 percent of SurveyMonkey respondents said they would; most of them stated that they would move to a non-tolled bridge. However, on a total trip (expanded data) basis, as shown in Figure 4-9, 39 percent of the trips would stay on the Scudder Falls Bridge after implementation of tolling, with six percent switching to the Trenton-Morrisville Toll Bridge, some 50 percent switching to non-tolled bridges, and five percent changing travel patterns.

It should be noted that stated preference surveys and their results rely on hypothetical questions to elicit preferences or values. Hypothetical bias arises in stated preference valuation studies when respondents report a willingness to do something in laboratory or field experiments that in fact they would not normally do in the real world, and hypothetical biases typically exceed the actual values. In this situation, many respondents were likely to state that they would take a free bridge as a protest against tolling on the Scudder Falls Bridge, or in the belief that the collective answers would be used to decide whether or not to toll the Scudder Falls Bridge. Therefore, the results of this particular question – and stated

preference data in general - should be looked at with a note of caution. The answers to this question were used to inform Jacobs' analyses and have not been used directly.

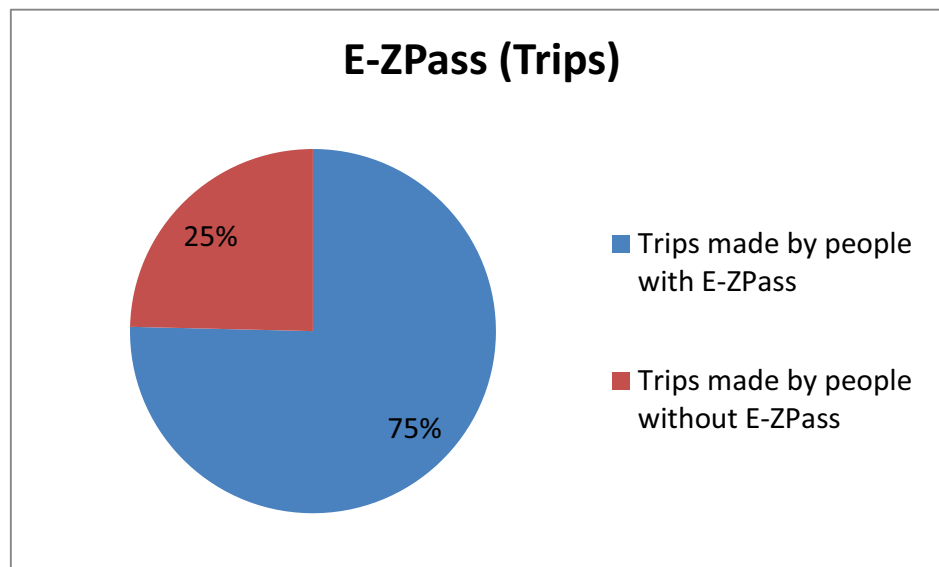
**Figure 4-9: Stated Preference if the Scudder Falls Bridge were Tolled (Expanded Data)**



#### 4.6.3.4 E-ZPass Familiarity and Ownership

Figure 4-10 shows customer data expanded to percent E-ZPass trips. Customers for this online survey were asked if they are familiar with E-ZPass and if they have E-ZPass. As may be seen in the figure, according to the data, three-quarters of the trips would be made by E-ZPass customers. However, it must be noted that as these surveys were administered and completed online, therefore the results are somewhat skewed to the more tech-savvy person, who would in fact be more likely to have and use E-ZPass than would a non-tech-savvy person. As such, one should keep in mind while looking at these data that the answers noted herein would be on the high side of the range of E-ZPass usage.

**Figure 4-10: Scudder Falls Bridge E-ZPass Familiarity and Usage (Expanded Data)**



## 5.0 ECONOMIC BACKDROP AND OUTLOOK FOR THE FUTURE

Historically, socioeconomic conditions have influenced DRJTBC traffic trends. Correlations exist between passenger car traffic growth and Gross Domestic Product (GDP) and population, and between commercial vehicle traffic growth and the Industrial Production Index (IPI). As such, we started our socio-economic research and analyses to focus in on those parameters. Additionally, we researched and analyzed the key economic variables that affect traffic in general, and present our work in this chapter.

Jacobs used a consensus forecast based on a variety of sources as an input into our traffic growth forecasts. The consensus outlook of economists is that moderate economic growth will continue in the near future, with real GDP estimated to increase by 1.5 percent in 2016 and 2.2 percent in 2017. Our estimate also assumed no significant changes in gasoline pricing in the near future, though we believe that a moderate increase in the price of gas will not result in major declines in traffic, as prices are currently not high by historical standards.

Any estimate of toll traffic and revenues will recognize the significant variations that can and do occur in the national, regional and local economies, and the population changes within the facility corridors. With this in mind, Jacobs performed a detailed analysis of the historical economic trends seen over the last few decades.

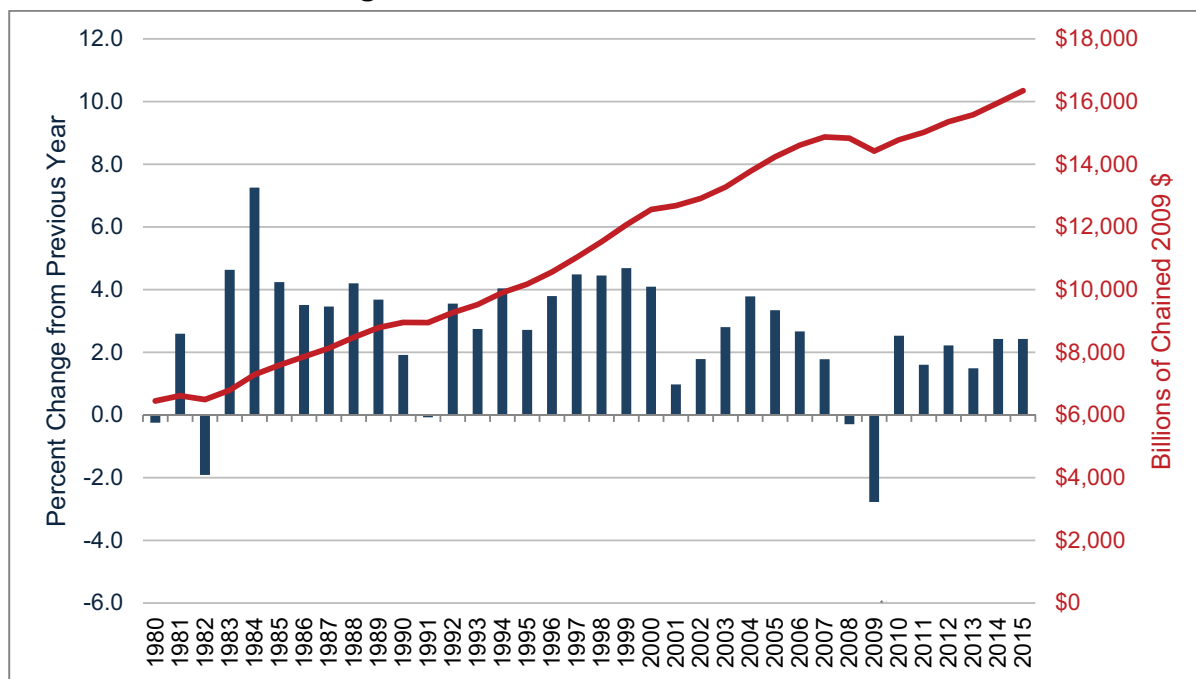
This chapter presents a summary of socioeconomic trends as well as an analysis of growth in nationwide vehicle miles traveled.

### 5.1 Recent Macroeconomic Trends

From 2000 to 2015, real Gross Domestic Product (GDP) and the Industrial Production Index (IPI) in the United States increased by an average of 1.8 percent and 0.7 percent per year, respectively. This time period included the recession that began and ended in 2001 and the recession, which began in December 2007 and ended in June 2009. The 2007-09 recession was more severe compared to previous recessions, resulting in large decreases in real GDP, industrial production, and employment, among other economic indicators.

As the U.S. economy began to recover, real GDP increased on an annual basis by between 1.5 and 2.5 percent in the years 2010 to 2015. As of 2015, real GDP reached \$16.3 trillion. Industrial production, as measured by the IPI, also recovered – it increased annually by between 1.3 and 5.6 percent from 2010 to 2015. Figure 5-1 summarizes the annual percentage change in real GDP from 1980 through 2015; details on the IPI are presented in Section 5.2.3.

**Figure 5-1: Real Gross Domestic Product**



Source: U.S. Census Bureau, Bureau of Economic Analysis, National Bureau of Economic Research

The economy has experienced moderate growth in recent years and there are signs that this level of growth will continue into the near future. The yield curve remains positive with short term interest rates (0-12 months) on U.S. Treasuries trading at or below 0.5 percent and the interest rates on 10-year U.S. Treasuries trading at 1.7 percent as of October 2016. The market for crude oil remains moderate with the price for North Sea Brent Crude Oil trading near \$52 per barrel as of the end of 2016. Barring unforeseen events in the international political environment, the Energy Information Administration (EIA)'s Annual Energy Outlook for 2016 anticipates that average crude oil prices will remain near \$50 per barrel into 2017.

Moreover, the housing market is recovering. After steadily declining from 2006 to 2011, housing prices have stabilized or started to increase in numerous markets. By the fall of 2016, the Case-Shiller 10-City Index and 20-City Index both increased by over 5 percent over the previous year. The consensus forecast is that there will be 1,250,000 housing starts in 2016, which would represent an improvement from the 1,106,000 units started in 2015. Analysts believe this segment of the housing market will continue to improve – the consensus forecast is that new housing starts will equal 1,370,000 in 2017.

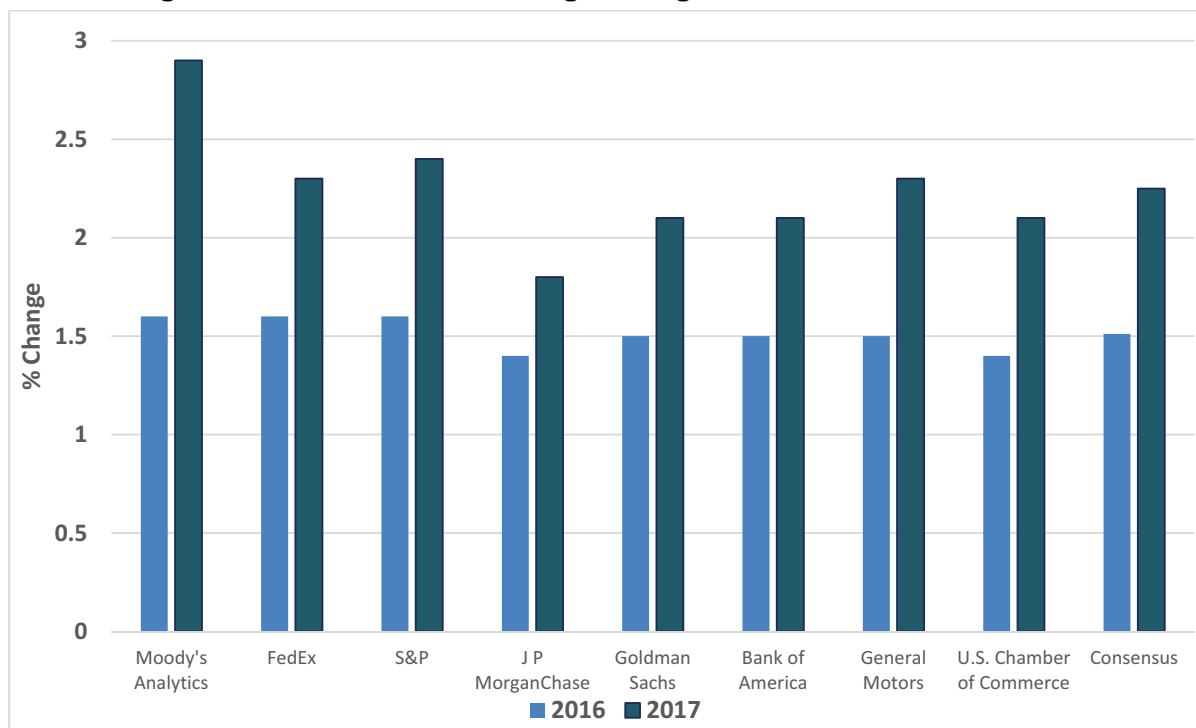
## 5.2 Short-Term Economic Forecast

The United States has experienced low to moderate real GDP growth over the last six years. While many economists believe the U.S. economy will continue to experience this type of tepid growth in the near term, there are signs that the economy could also slow. The strength of the dollar relative to other currencies has continued to undermine export growth, hurting the manufacturing sector of the economy. Furthermore, major trading partners, such as China, have experienced slowing economic growth, contributing to a decrease in demand for goods and services around the world. Financial market fluctuations are also contributing to a decline in consumer sentiment over the last 12 months. Nevertheless, forecasters are still predicting growth in real GDP and in the IPI for the next two years although some prognosticators have revised their growth estimates slightly downward.

### 5.2.1 Gross Domestic Product

Figure 5-2 summarizes the real GDP forecast provided by selected financial institutions, manufacturers, and shippers over the short-term. As of September 2016, the consensus forecast is that real GDP will increase by 1.5 percent in 2016 and 2.2 percent 2017.

**Figure 5-2: Forecasted Percentage Change in Real GDP, 2016 and 2017**



Source: Blue Chip Economic Indicators (BCIE)

It is anticipated that moderate economic growth will continue in the short-term although there is a risk that this level of economic growth will not materialize. Factors that may negatively impact future real GDP growth in the short-term include the following:

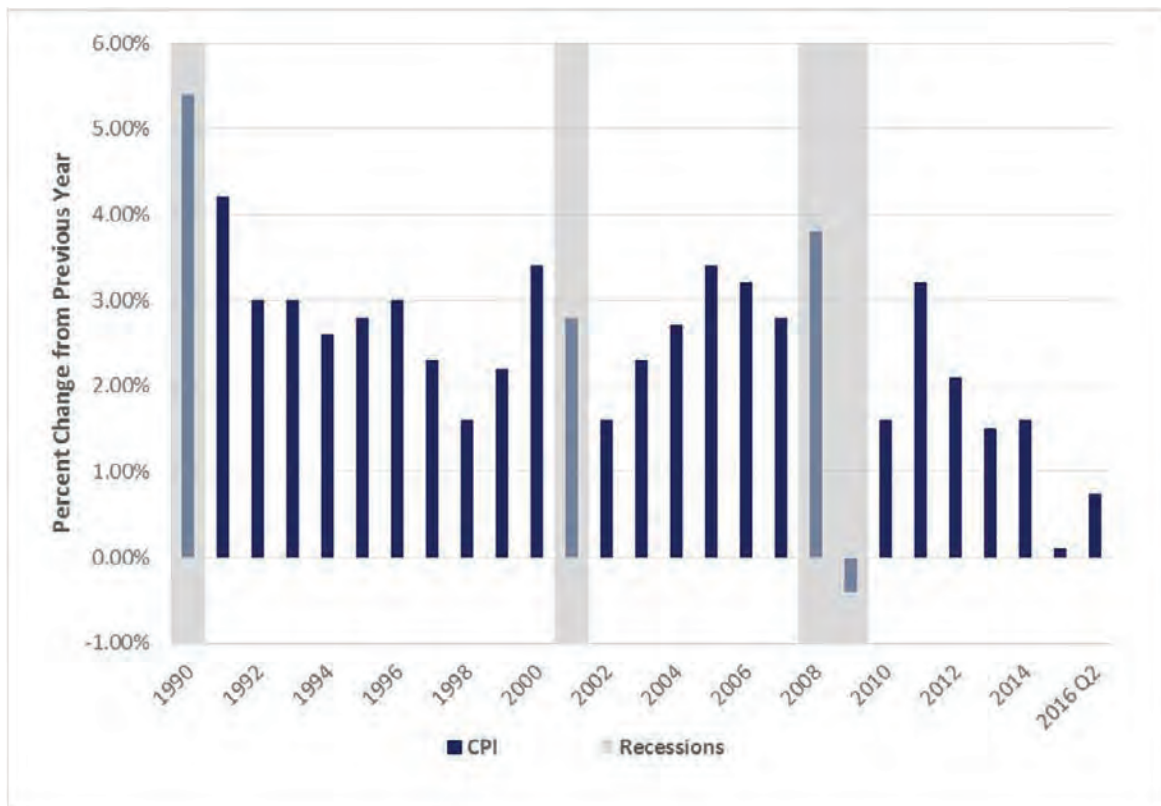
- Weakness in the manufacturing sector caused in part by a strong dollar, which makes it difficult for export oriented firms to sell goods abroad.
- Weaknesses in the economic growth of major trading partners, including China and countries in Europe.
- Volatility in financial markets, which may negatively impact consumer sentiment and spending patterns.
- Geopolitical instability – especially in Eastern Europe, the Middle East, and with the exit of Great Britain from the European Union – continues to be a concern. The possibility of financial stress resulting from political unrest remains a very real risk to the global economy.

### **5.2.2 Inflation**

Since 1990, the Consumer Price Index (CPI) has increased by an average annual rate of 2.5 percent. This captures the relatively higher inflation of the early 1990s as well as the deflationary conditions that occurred in 2009 and the near-deflationary conditions in 2015. Figure 5-3 summarizes the annual percentage change in CPI from 1990 to through the first half of 2016.



**Figure 5-3: Annual Percentage Change in CPI, 1990 to 2016 Q2**



Source: U.S. Department of Labor, Bureau of Labor Statistics (BLS)

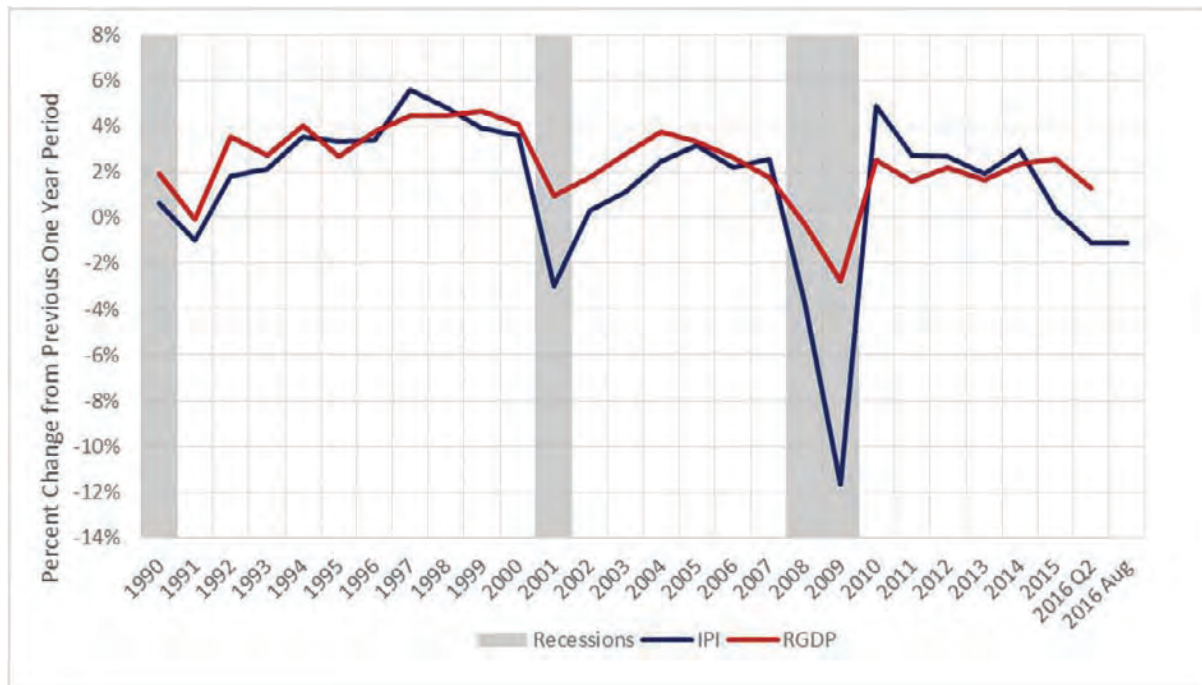
### 5.2.3 Industrial Production

We expect that the growth in the shipment of goods across the nation's highways will be tempered, resulting in a more modest rate of growth in commercial traffic on the DRJTBC's facilities than had been experienced in the past. This trend is also seen on other toll facilities in the northeast.

Changes in U.S. industrial production have historically moved in tandem with GDP, albeit with steeper decreases during recessions and larger increases during recovery periods. During the lowest point of the 2001 recession, the Industrial Production Index (IPI) decreased by 4.0 percent. Due to the severity of the 2007-09 recession, the IPI declined 11.3 percent in 2009. Since then, the IPI recovered and grew from 2010 to 2014 at an average annual rate of 2.5 percent. The total IPI indexed to 2012 returned to its pre-recession peak in November 2014. During 2015, the IPI grew a tepid 0.3 percent on an average annual basis. The first two quarters of 2016, IPI fell 1.7 and 1.0 percent from the previous quarter respectively. Causes cited by the Federal Reserve System Board of

Governors in their monthly reports for the recent downturn included losses in the mining sector and low demand for utilities during the warmer than usual winter of 2015-2016. Figure 5-4 compares the growth in real GDP with IPI from 1990 through 2016.

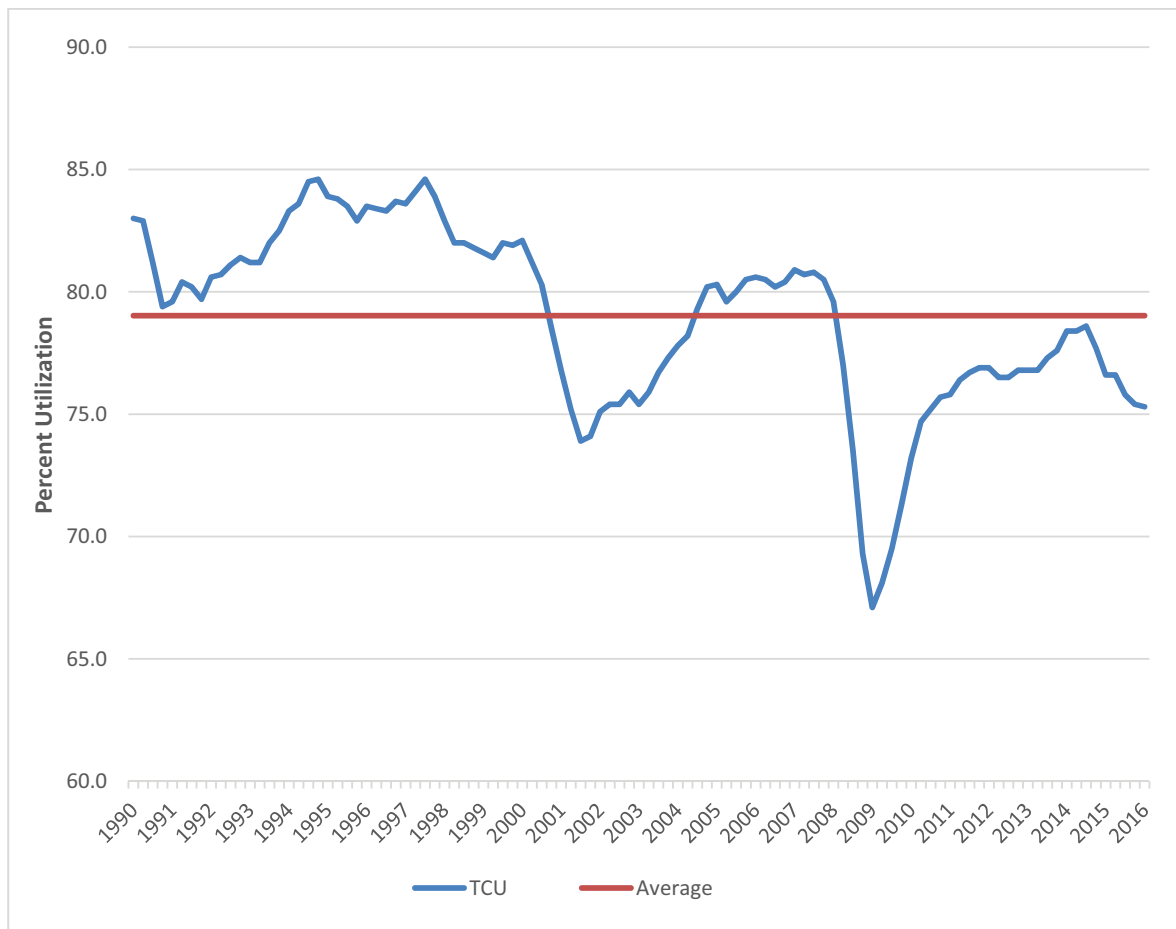
**Figure 5-4: Historical Real GDP and IPI, 1990 to 2016**



Source: Bureau of Economic Analysis and the U.S. Federal Reserve Bank

Similar to the IPI, the utilization of U.S manufacturing capacity decreased significantly in 2009, declining to 65.5 percent. Since then, capacity utilization increased to 78.6 percent during the first quarter of 2014, but has since declined and was at 75.5 percent as of August 2016. A utilization rate of 75.5 percent is 4.5 percent below the average between 1990 and 2015. Figure 5-5 summarizes manufacturing capacity utilization from 1990 through August 2016.

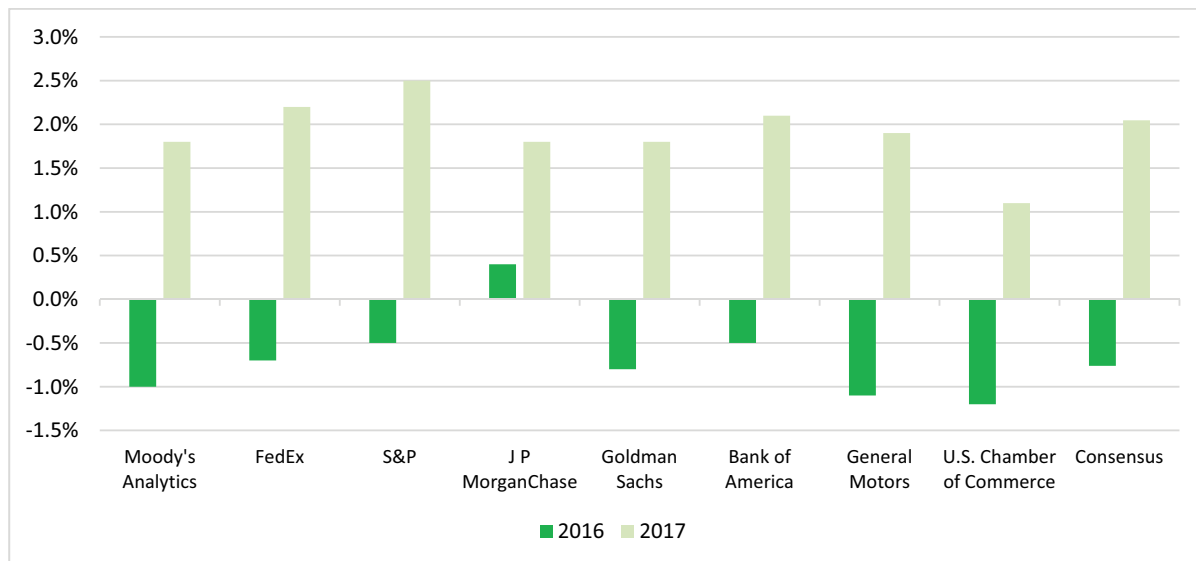
**Figure 5-5: Manufacturing Capacity Utilization, 1990 through August 2016**



Source: U.S. Federal Reserve Bank

Based on forecasts developed by financial institutions and industry analysts, as of September 2016 the Blue Chip Economic Indicators has the IPI forecasted to decrease by 0.8 percent in 2016 with a rebound of 2.0 percent in 2017. This forecast factors in the potential impact to U.S. exports due to sluggish growth in Europe and China. As a result, we expect that the growth in the shipment of goods across the nation's highways will be tempered, resulting in a relatively modest rate of growth in commercial traffic. Figure 5-6 summarizes selected forecasts in the IPI.

**Figure 5-6: Forecasted Percentage Change in Industrial Production, 2016 and 2017**



Source: Blue Chip Economic Indicators (BCIE)

## 5.3 National Trends and Outlook

National trends in employment, labor participation, real household income, and fuel prices were used to inform Jacobs' growth forecasts. In addition, recent growth in national vehicle-miles traveled (VMT) was taken into consideration in the development of our toll traffic and revenue forecasts for the DRJTBC.

### 5.3.1 Employment

The labor market in the United States has improved since the last recession and although there are signs that it has not fully recovered most analysts expect to see continued strength in the job market into the near future.

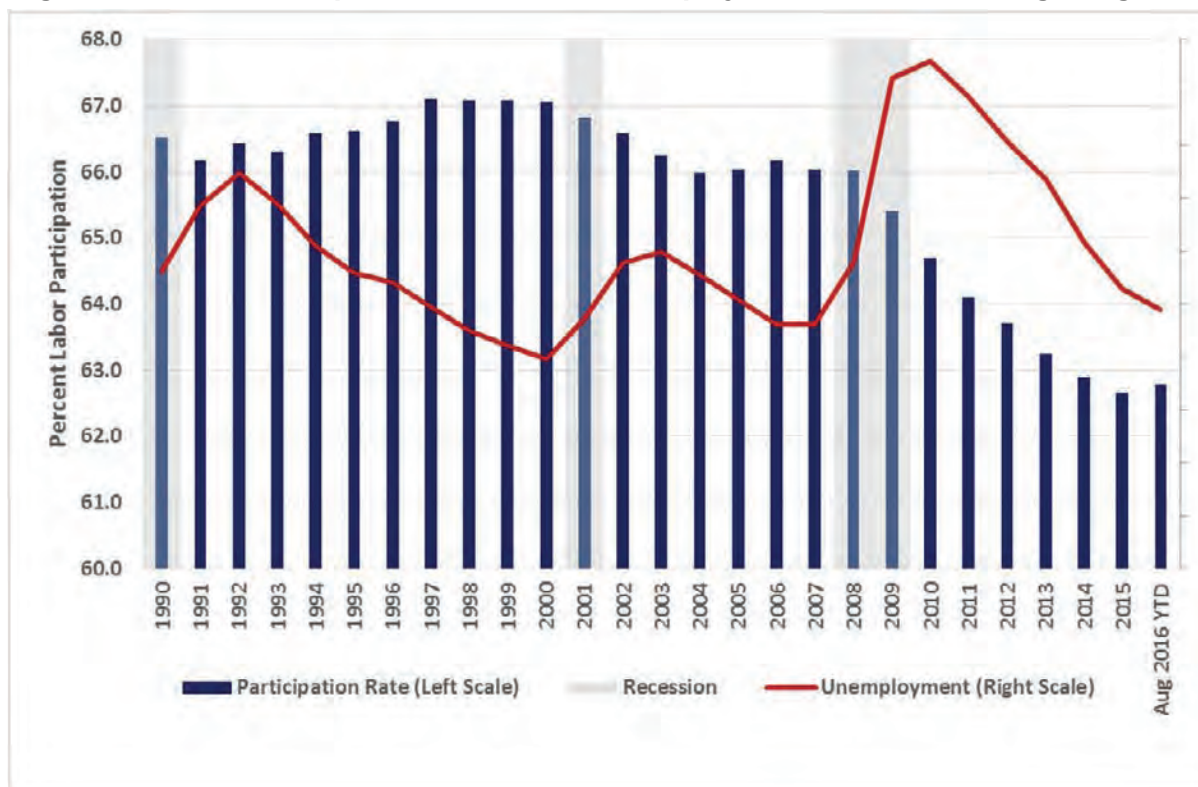
During the height of the most recent recession, the unemployment rate in the United States reached 10.0 percent, a level not witnessed since the early 1980s. As the U.S. economy began to grow again in the summer of 2009, the unemployment rate slowly began to fall, reaching 4.9 percent as of January 2016, a rate that still holds as of August 2016.

Other measures of labor market health, however, have not recovered as well. The civilian labor force participation rate remains low at 62.8 percent as of August 2016 and the civilian employment to population ratio also remains low although beginning to improve. These two measures demonstrate that there remains room for improvement in the labor market.

Despite some challenges, analysts generally predict the market for jobs to remain strong in the immediate future. The consensus forecast published in the *Blue Chip Economic Indicators* states that the unemployment rate should be 4.8 percent in 2016 and 4.6 percent in 2017. The Congressional Budget Office (CBO) expects the unemployment rate to remain below 4.9 percent until 2020, at which point the CBO forecasts it to stabilize at 5.0 percent until 2026.

Figure 5-7 displays recent trends in the unemployment and civilian labor participation rates.

**Figure 5-7: Labor Participation Rate and the Unemployment Rate, 1984 through Aug 2016**

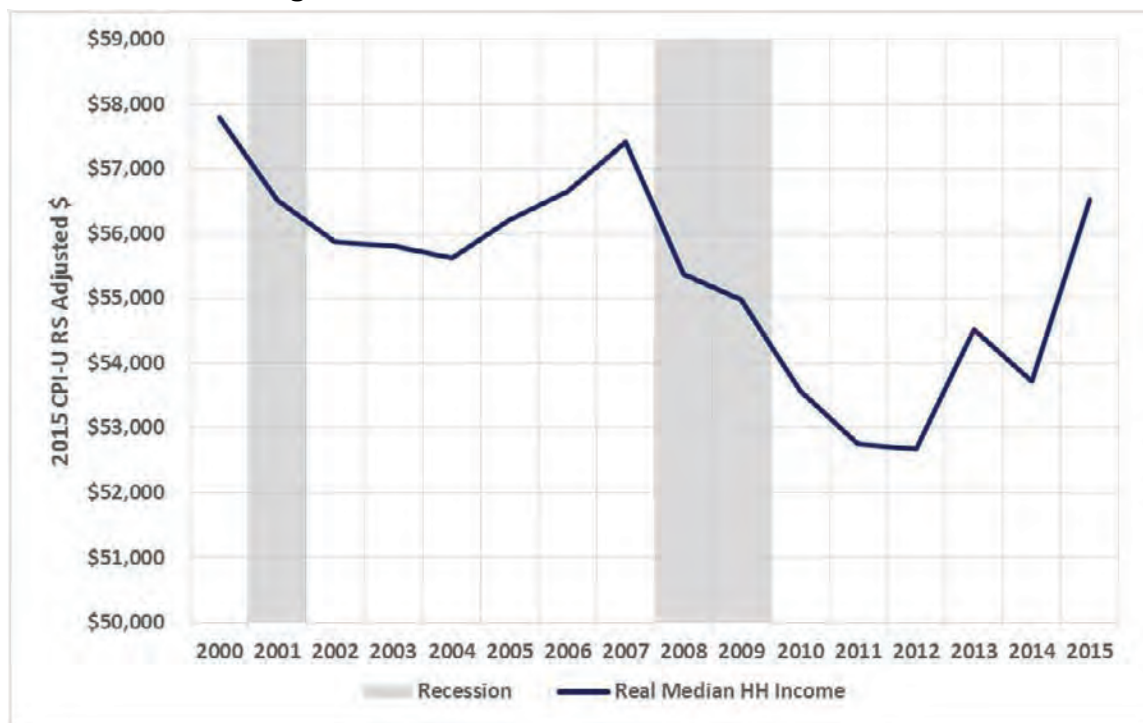


Source: Bureau of Labor Statistics (BLS), U.S. Department of Labor

### 5.3.2 Income

The recent recession impacted income, which affects consumer purchasing power and economic growth. Recently, real household median income peaked at \$57,724 in 2000 but then declined to \$52,666 by 2012 before eventually rising approx. 7% to the level of \$56,516 in 2015. The 2015 level was 98 percent of the year 2000 level. Figure 5-8 shows annual real household income during economic expansionary periods and recessions.

**Figure 5-8: Real Household Income, 2000 - 2015**



Source: U.S. Bureau of the Census, most recent available data (2014).

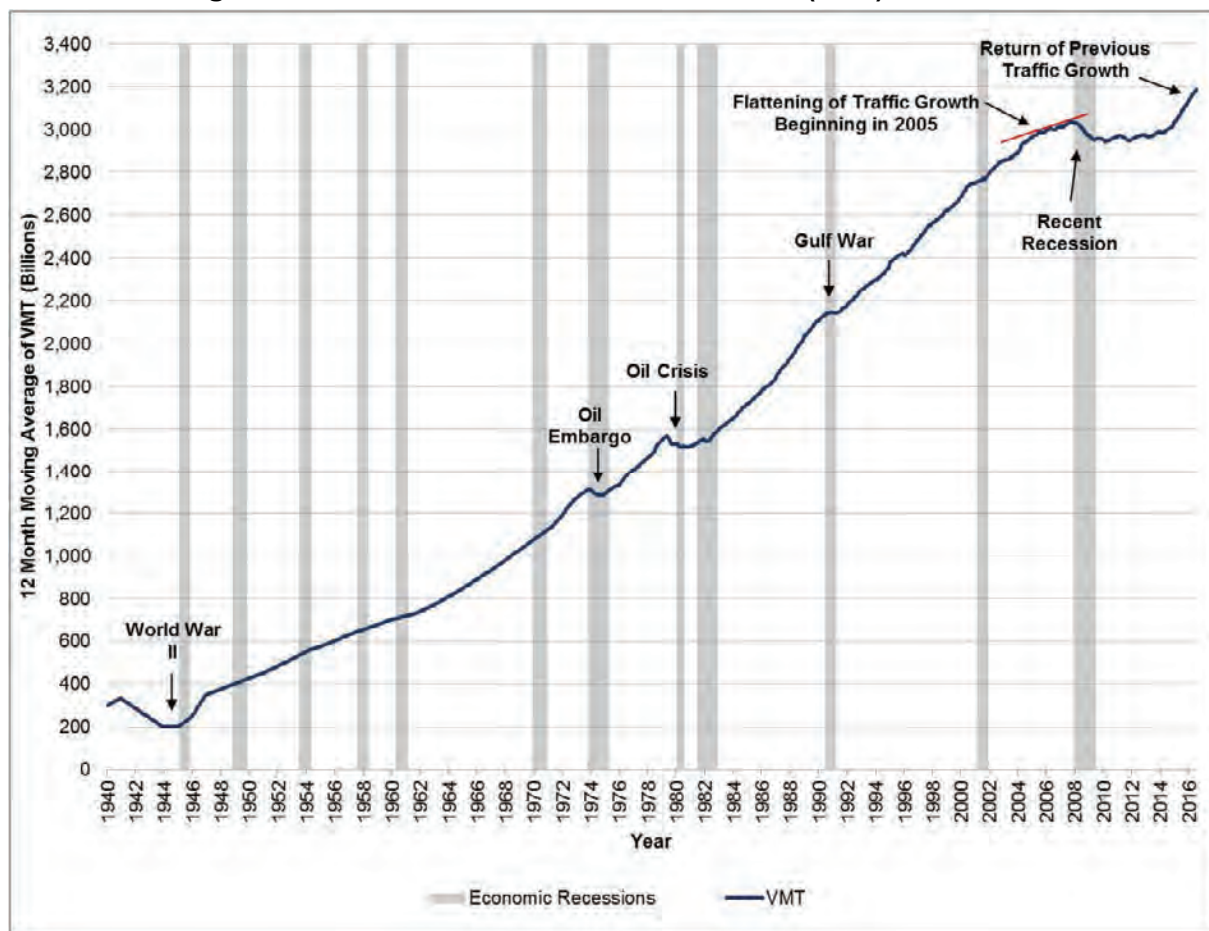
### 5.3.3 National Trends in Vehicle Miles Traveled (VMT)

Figure 5-9 depicts the 12-month moving average of national travel mileage on all U.S. highways, from 1940 through 2016. As seen in this figure, there were temporary reductions in vehicle-miles traveled (VMT) during World War II, oil crises, and economic recessions. Despite these temporary “dips”, the VMT continued to grow rapidly over the years. It shows that, in recent years, with the exception of short, flat periods during the 1991 and 2001 recessions (each less than one year), VMT grew at a steady pace through about 2005.

Then, between 2005 and 2007, the United States experienced an historic flattening in the growth of nationwide VMT. This was followed by a significant reduction in VMT during the recession. A reduction in VMT means less revenue – in the form of gas tax or tolls – for funding transportation operation, maintenance and capital expenses. It is therefore encouraging for providers of transportation infrastructure and related services to see VMT growth return to more historic trends, as it did in 2014 through 2016. While VMT was generally flat from the end of the 2008 until the beginning of 2014, after that point it began to grow. Increased economic growth and a reduction in real retail gas prices have undoubtedly influenced this trend. It remains to be seen whether this resumption in growth will continue into the future or stall once again.



**Figure 5-9: U.S. Annual Vehicle Miles Traveled (VMT), 1940-2016**

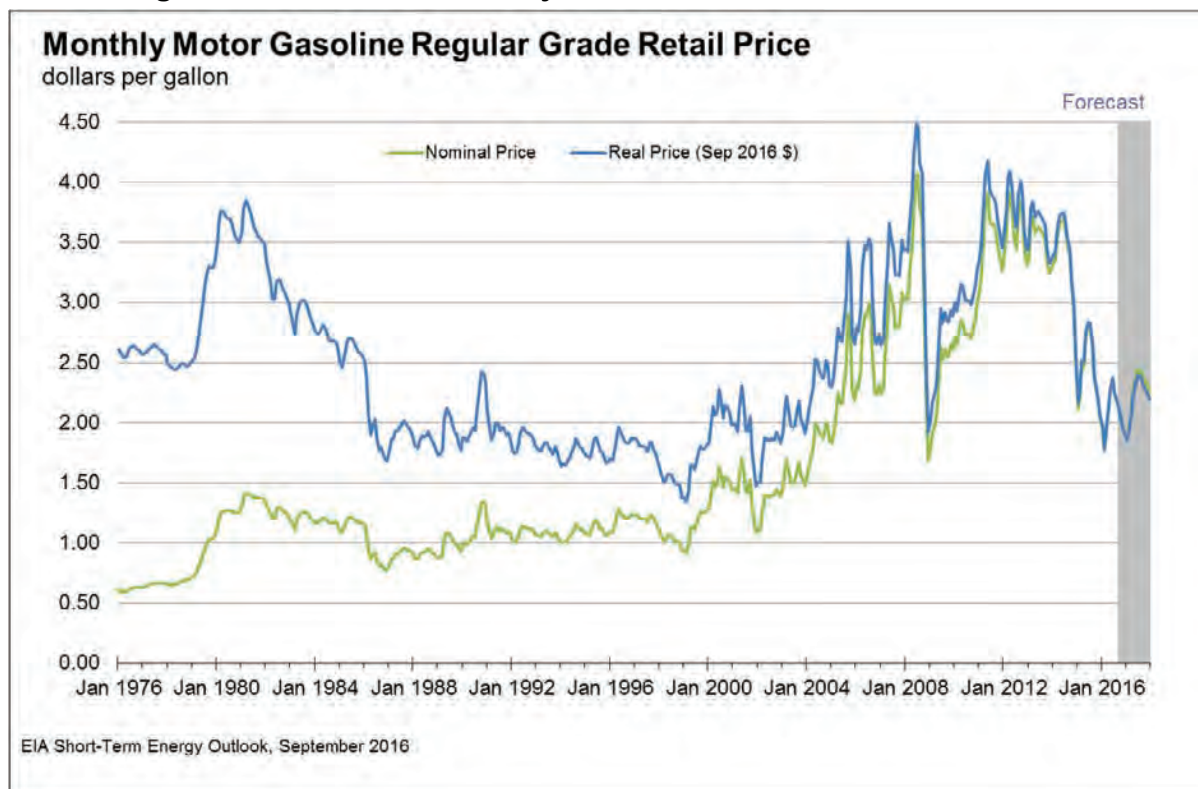


Source: Federal Highway Administration (FHWA)

### 5.3.4 Fuel Cost Impacts on Travel

Figure 5-10 presents historical as well as forecasted changes in gasoline and crude prices prepared by the U.S. Energy Information Administration (EIA). The graph illustrates the peaking of gasoline prices in the summer of 2008, the precipitous drop in late 2008, the spike in gasoline prices that occurred in the middle of 2011, subsequent fluctuations thereafter, and finally another drop in the fall of 2015. This relatively large reduction in prices is mainly due to the increased production of oil and natural gas in the U.S. from fracking and other innovative techniques. In its most recent report, the EIA projected that gasoline prices, which averaged \$2.10 per gallon in the first half of 2016, would average approximately \$2.20 per gallon for the first half of 2017.

**Figure 5-10: Historical and Projected U.S. Gasoline Prices, 1976 to 2016**

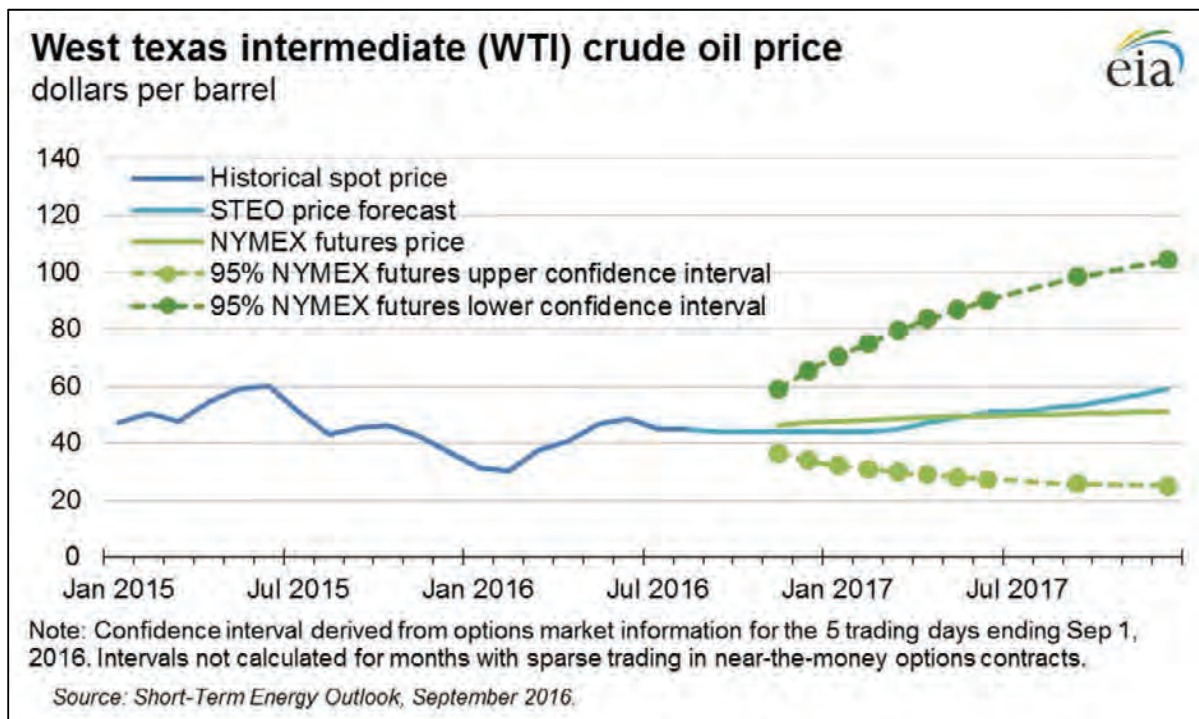


Source: Short-Term Energy Outlook, U.S. Energy Information Administration (EIA), September 2016

This forecast of relatively low future oil and gas prices may be reassuring; however, what this graph does not show is the level of uncertainty in these projections. Much of this forecast is based on the increased production due to relatively new technological improvements, such as fracking, increased production from renewable energy sources, and long-term improvements in motor vehicle efficiency as well as relatively economic weakness in certain parts of the world. However, it remains to be seen whether these trends are sustainable over time. Figure 5-11 displays historical and forecasted price information for crude oil.



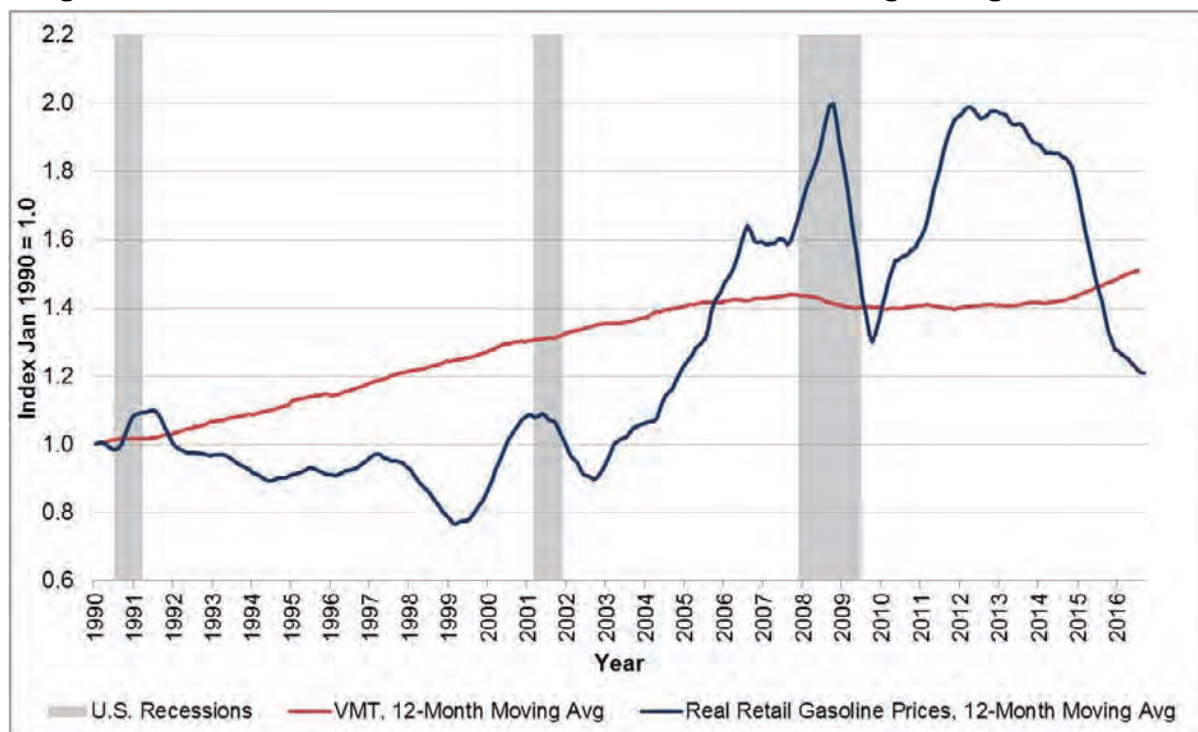
Figure 5-11: Short-Term Oil Price Forecast



To understand the potential impact of future gas prices on traffic, we can look at historical reactions to changes in gas prices. Figure 5-12 presents historical VMT across the United States as compared to real gasoline prices from 1990 through 2016. Both the VMT and real gas prices represent a 12-month moving average to remove any seasonality factors; all data has been indexed to January 1990.

The increase in real gasoline prices that began in the early 2000s and the recession that commenced in 2008 contributed to a flattening, then decrease, in the amount of VMT in the United States. The 12-month moving average of VMT remained relatively unchanged in 2009 and 2010 despite relatively low real gasoline prices. In fact, VMT only started to increase again at a rate approaching its historical trend in 2014. 2014 through early 2016 saw a steep growth in VMT which corresponded with a precipitous drop in gas prices during those two years.

**Figure 5-12: National VMT vs. Real Gas Prices, 12-Month Moving Average, 1990 - 2016**



Sources: U.S. Energy Information Administration (EIA) and Federal Highway Administration (FHWA)

## 5.4 Regional Economic and Demographic Outlook

The demographic area that is in relatively close proximity to the Delaware River Joint Toll Bridge Commission (DRJTBC) facilities encompasses all or part of two states, four metropolitan statistical areas (MSA) – New York, Philadelphia, Allentown, and East Stroudsburg – three Metropolitan Planning Organizations (MPO) and nineteen counties. Ten of the 19 counties analyzed are located in New Jersey and nine are in Pennsylvania. This study area had a combined population of 8.6 million in 2010 and accounted for approximately 3 percent of U.S. GDP in 2012. Drawing from definitions developed by the U.S. Office of Management and Budget, for the purposes of this analysis, Philadelphia, Allentown-Bethlehem, East Stroudsburg, Trenton-Ewing, and Edison-New Brunswick are considered to be separate economic regions. The greater New York City area, including the Newark-Union area, has not been included due to the relatively greater distances to DRJTBC facilities. Notwithstanding, two outlying counties—Hunterdon and Sussex—have been included in this analysis.

### 5.4.1 Regional Population

The total population of this nineteen county area has grown from 7.6 million in 1990 to 8.7 million in 2010, representing a compound average growth rate (CAGR) of 0.63 percent during this period. Using recent forecasts prepared by the Delaware Valley Regional Planning Commission (DVPRC), North Jersey Transportation Planning Authority (NJTPA), the Lehigh Valley Planning Commission (LVPC), total population within this area is estimated to reach 9.1 million in 2020, 9.6 million in 2030, and 10.1 million by 2040. This represents a compound annual growth rate (CAGR) of 0.5 percent from 2010 to 2040. The ten New Jersey counties had a total population of 3.8 million and are estimated to increase to 4.4 million by 2040. Table 5-1 summarizes historical and forecast population in the New Jersey counties that form part of the DRJTBC study area from 1990 to 2040. This table represents the most recent consistent set of data and forecasts from various sources. We recognize that the table shows 2015 as a forecast, but any differences are minimal and will not change our forecasts.

**Table 5-1: New Jersey County Population, 1990 to 2040**

Population	Actual				Forecast						
New Jersey	1990	2000	2010	1990-2010 CAGR	2015	2020	2025	2030	2035	2040	2010-40 CAGR
Burlington County	395,066	423,394	448,734	0.64%	450,915	457,126	471,732	486,343	492,552	494,732	0.33%
Camden County	502,824	508,932	513,657	0.11%	514,351	516,331	520,980	525,629	527,609	528,303	0.09%
Gloucester County	230,082	254,673	288,288	1.13%	292,455	304,311	332,202	360,097	371,953	376,117	0.89%
Hunterdon County	107,776	122,000	127,400	0.84%	130,460	133,594	136,803	140,089	143,454	147,100	0.48%
Mercer County	325,824	350,761	366,513	0.59%	367,660	370,543	377,428	384,309	388,385	390,729	0.21%
Middlesex County	671,780	750,200	809,900	0.94%	841,566	874,471	908,662	944,190	981,106	1,023,100	0.78%
Monmouth County	553,124	615,300	630,400	0.66%	640,954	651,686	662,597	673,690	684,969	696,900	0.33%
Somerset County	240,279	297,500	323,400	1.50%	331,629	340,068	348,722	357,596	366,696	376,600	0.51%
Sussex County	130,943	144,166	149,300	0.66%	156,548	164,147	172,115	180,470	189,231	199,500	0.97%
Warren County	91,607	102,437	108,700	0.86%	112,202	115,817	119,549	123,401	127,376	131,800	0.64%
<b>New Jersey Counties</b>	<b>3,249,305</b>	<b>3,569,363</b>	<b>3,766,292</b>	<b>0.74%</b>	<b>3,838,741</b>	<b>3,928,094</b>	<b>4,050,789</b>	<b>4,175,814</b>	<b>4,273,332</b>	<b>4,364,881</b>	<b>0.49%</b>

Sources: Delaware Valley Regional Planning Commission (DVPRC), Lehigh Valley Planning Commission (LVPC), North Jersey Transportation Planning Authority (NJTPA), and the U.S. Census Bureau

The nine Pennsylvania counties had a total population of 4.9 million in 2010 and are expected to increase to 5.7 million by 2040. Although population has decreased in Philadelphia County since 1990, the DVPRC forecasts that the county's population will increase to 1.6 million by 2040. Table 5-2 summarizes historical and projected population in the Pennsylvania counties included in the DRJTBC study area and for the area, as a whole. This table represents the most recent consistent set of data and forecasts from various sources. We recognize that the table shows 2015 as a forecast, but any differences are minimal and will not change our forecasts.

**Table 5-2: Pennsylvania County and Total DRJTBC Study Area Population, 1990 to 2040**

Population	Actual				Forecast						
Pennsylvania	1990	2000	2010	1990-2010 CAGR	2015	2020	2025	2030	2035	2040	2010-40 CAGR
Bucks County	541,174	597,635	625,249	0.72%	634,880	654,140	673,290	692,440	709,793	727,150	0.50%
Chester County	376,396	433,501	498,886	1.42%	516,582	538,809	573,114	607,407	629,634	647,330	0.87%
Delaware County	547,651	551,974	558,979	0.10%	559,498	560,989	564,481	567,978	569,463	569,982	0.06%
Lehigh County	291,131	312,090	349,497	0.92%	352,965	385,710	389,537	427,162	431,400	469,975	0.99%
Monroe County	95,709	138,687	176,842	3.12%	190,414	205,027	220,762	239,824	245,820	251,965	1.19%
Montgomery County	678,111	750,097	799,874	0.83%	808,534	824,166	849,690	875,214	889,516	896,741	0.38%
Northampton County	247,105	267,066	297,735	0.94%	312,955	329,516	346,361	365,766	384,464	403,979	1.02%
Philadelphia County	1,585,577	1,517,550	1,526,006	-0.19%	1,536,124	1,551,247	1,572,342	1,599,436	1,618,512	1,630,589	0.22%
Pike County	27,966	46,306	57,369	3.66%	64,598	72,737	81,902	94,374	96,733	99,152	1.84%
<b>Pennsylvania Counties</b>	<b>4,390,820</b>	<b>4,614,906</b>	<b>4,890,437</b>	<b>0.54%</b>	<b>4,976,549</b>	<b>5,122,341</b>	<b>5,271,479</b>	<b>5,469,601</b>	<b>5,575,335</b>	<b>5,696,863</b>	<b>0.51%</b>
<b>Total</b>	<b>7,640,125</b>	<b>8,184,269</b>	<b>8,656,729</b>	<b>0.63%</b>	<b>8,815,290</b>	<b>9,050,435</b>	<b>9,322,268</b>	<b>9,645,415</b>	<b>9,848,667</b>	<b>10,061,744</b>	<b>0.50%</b>

Sources: Delaware Valley Regional Planning Commission (DVPRC), Lehigh Valley Planning Commission (LVPC), North Jersey Transportation Planning Authority (NJTPA), and the U.S. Census Bureau

## 5.4.2 Regional Economic Output

Economic activity within the DRJTBC study area is driven largely by the New York City and Philadelphia metropolitan areas, but also includes the considerably smaller Allentown and East Stroudsburg MSAs. Although economic activity within each Metropolitan Division had been significantly impacted by national and international trends, economic growth in each region is driven by different factors. A brief description and economic profile of each region is provided below:

- **Philadelphia Metropolitan Statistical Area:** Economic activity in the Philadelphia area, which was once dominated by manufacturing, is now strongly driven by knowledge-based industries, such as life sciences, information technology, professional services, health and education and financial services sectors. In particular, the region is home to nearly 400 life science, pharmaceutical, biotech, and research and development companies, making it one of the largest science industrial clusters in the U.S. The Philadelphia area also includes a solid information technology industry, including major employers such as Lockheed Martin, Comcast, Verizon, SAP AG, Sungard Data Systems, and Unisys. Although comprising eight percent of the real Gross Regional Product (GRP) in 2012, the manufacturing activity includes the production of electronics, defense systems, aerospace, shipbuilding, and chemicals.
- **Trenton-Ewing Metropolitan Area:** Trenton is the state capital of New Jersey, and government activity accounted for 14.5 percent of GRP in 2014. Although forming part of the greater New York City area, the Trenton-Ewing area is located in close proximity to and influenced by economic activity in the Philadelphia area. The Trenton area also benefits from having a relatively large high-skilled labor force due to Princeton

University, large pharmaceutical and energy companies, such as Bristol-Myers Squibb and NRG Energy, and government-related activity. Manufacturing activity, which was once an important component of the local economy, has experienced a recent resurgence. However, manufacturing continues to be a relatively small slice of the local economy, accounting for 7 percent of GRP in 2014.

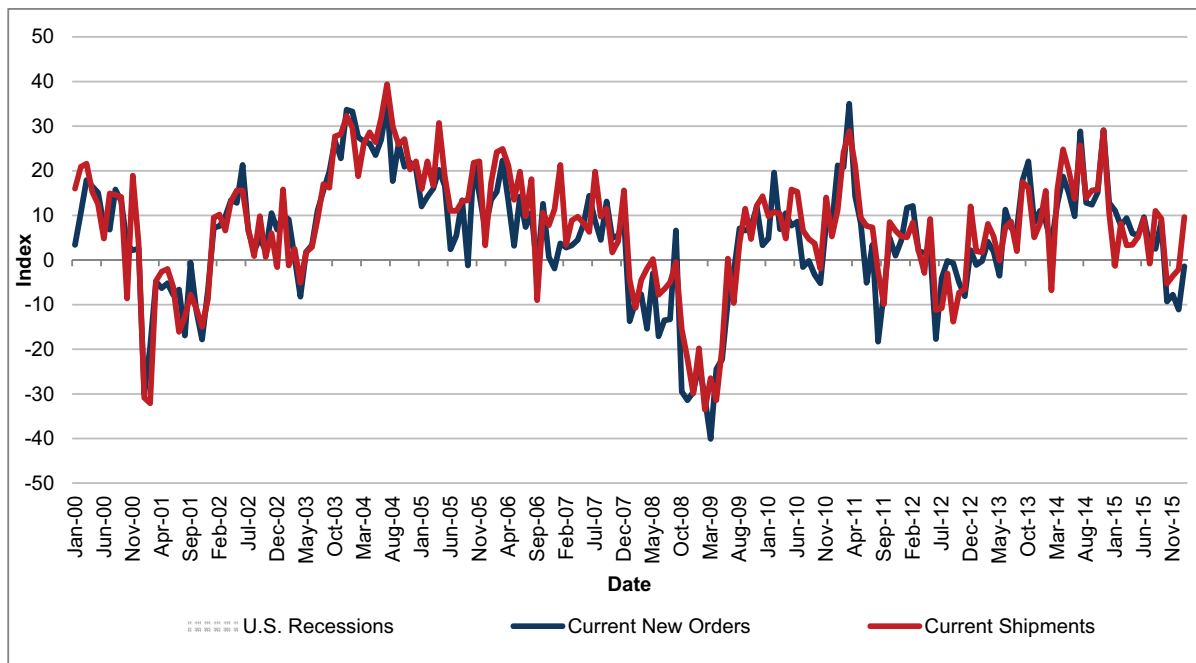
- Edison-New Brunswick Metropolitan Division: This area was among the hardest hit by Superstorm Sandy in 2012, which has impacted economic activity. Recovery efforts are ongoing with some recent economy activity resulting from reconstruction of damaged facilities. The professional and business services sector is a key component of the local economy. Large pharmaceutical companies, e.g. Novo Nordisk, and Rutgers University are also located in this region.
- Allentown-Bethlehem: Once strongly driven by mineral extraction (e.g., slate, iron ore, and limestone), manufacturing (e.g., steel and cement), and the construction industries, the area has attempted to diversify its economy in recent years as these sectors have declined in importance. From 2001 to 2014, manufacturing activity decreased from 23 percent to 14 percent of GRP, while construction has gone from 6 percent to 3 percent of GRP (latest data available). Additionally, some of the larger mining sites have been closed and repurposed as recreational areas or economic opportunity zones. Recent economic activity in this region has been driven by growth in professional services, health care, distribution centers, and retail trade sectors.
- East Stroudsburg: This metropolitan area is largely contained within Monroe County, Pennsylvania. During the housing boom, many New York commuters moved to the East Stroudsburg area to take advantage of its considerably lower cost of living despite the long travel times – average commuting time is nearly 40 minutes and is among the highest in the U.S.

### 5.4.3 Regional Manufacturing and Exports

Manufacturing activity can be measured by New Orders Index and the Shipments Index developed by the Federal Reserve Bank of Philadelphia, which tracks economic activity in New Jersey, Pennsylvania, and Delaware. Consistent with general economic conditions, there were decreases in both indices during the early 2000s recession, an increase in new orders and shipments from 2004 to 2007, and steep decreases during 2008 and 2009. These indices increased during 2010 and 2011, but decreased locally in 2012. Through September 2015, there have been relatively strong gains in both of these indices although the end of 2015 saw both indices contract. Current shipments picked up again in 2016. Figure 5-13 summarizes new orders and shipments indices prepared by the Federal Reserve Bank of Philadelphia from 2000 to January 2016.



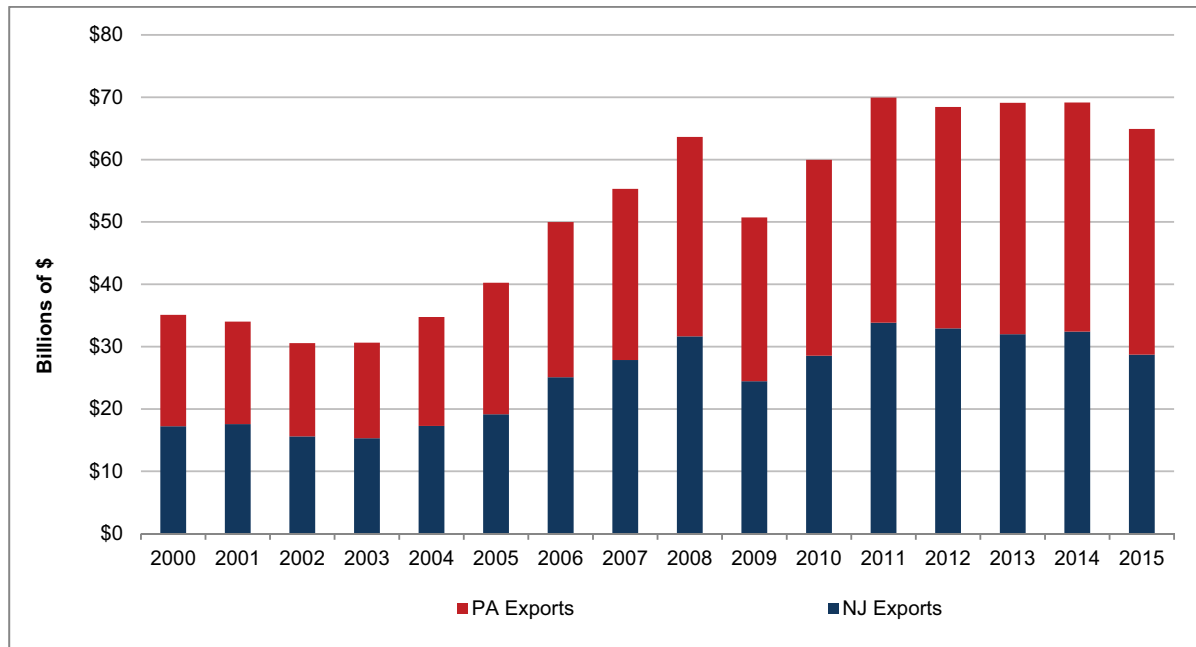
**Figure 5-13: New Orders and Shipment Indexes, 2000 to January 2016**



Source: Federal Reserve Bank of Philadelphia

Merchandise exports have increased by approximately 4 percent per annum since 2000 in New Jersey and Pennsylvania. In dollar terms, the value of statewide exports from New Jersey has nearly doubled from \$17.2 billion in 2000 to \$28.7 billion in 2015. Merchandise exports produced in Pennsylvania have exhibited similar patterns, increasing from \$17.9 billion to \$36.2 billion during this period. Using data compiled by the International Trade Administration (ITA) within the U.S. Department of Commerce, Figure 5-14 summarizes total manufactured exports produced in New Jersey and Pennsylvania from 2000 to 2015.

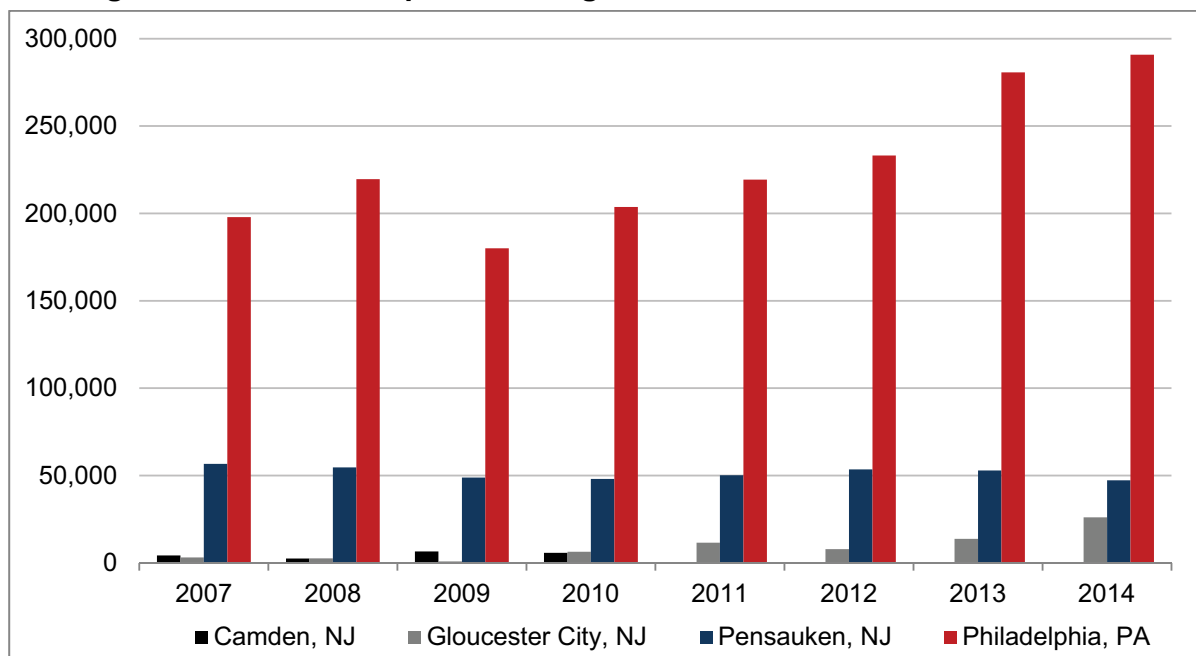
**Figure 5-14: Manufactured Exports Produced in New Jersey and Pennsylvania, 2000 to 2015**



Source: International Trade Administration, U.S. Department of Commerce

The largest waterborne port along the Delaware River is the Port of Philadelphia which handled 290,852 Twenty-Foot Equivalent Units (TEUs) in 2014, making it the 16th largest port in the U.S. by that measure, and a key gateway for imports from African countries. Total TEUs handled by the Port of Philadelphia accounted for approximately one percent of the 31.7 million TEUs accommodated through U.S. ports. Cargo moved through the Port of Philadelphia has subsequently recovered – total TEUs accommodated in 2014 have exceeded 2008 levels. Major commodities and goods exported through the Port of Philadelphia included refined petroleum products, automobiles and vehicle parts, iron and steel, paper, plastics products, and medical equipment. Major imported commodities included crude petroleum, refined petroleum products, meat, fruit, beverages, and paper products. Smaller ports located along the Delaware River in New Jersey include the ports of Camden, Gloucester City, and Pennsauken, handling an average of approximately 6,500 TEUs, from 2010 to 2014. Figure 5-15 summarizes the amount of TEUs handled by these Delaware River ports from 2007 to 2014.

**Figure 5-15: TEUs Transported Through the Delaware River Ports, 2007 to 2014**



Source: U.S. Department of Transportation, Maritime Administration, most recent data available.

#### 5.4.4 Regional Employment

Total employment in the New Jersey counties included in the study area increased from 1.6 million in 1990 to 1.8 million in 2010, representing a compound annual growth rate of 0.8 percent period. Employment grew the most in the more populous counties: Somerset County (1.0 percent increase per year from 2000 to 2010), Mercer County (1.0 percent per year), Camden County (0.7 percent per year), Burlington County (0.6 percent per year), Middlesex County (0.6 percent per year) and Monmouth County (0.5 percent per year). Recent forecasts prepared by DRVPC and NJTPA estimate that total employment in these ten New Jersey counties will exceed 2.2 million by 2040. It should be noted that many New Jersey residents do not work in state, but instead commute to New York City, Philadelphia, Wilmington, and other regional employment centers. Table 5-3 summarizes historical and forecast employment for the New Jersey counties included in the DRJTBC study area from 1990 to 2040. This table represents the most recent consistent set of data and forecasts from various sources. We recognize that the table shows 2015 as a forecast, but any differences are minimal and will not change our forecasts.



**Table 5-3: New Jersey Employment by County, 1990 to 2040**

Employment	Actual				Forecast						
New Jersey	1990	2000	2010	1990-2010 CAGR	2015	2020	2025	2030	2035	2040	2010-40 CAGR
Burlington County	191,345	205,886	217,229	0.64%	218,472	221,440	228,422	235,404	238,372	239,414	0.32%
Camden County	227,933	235,355	263,406	0.73%	265,886	267,425	269,769	272,076	273,581	274,124	0.13%
Gloucester County	86,079	99,467	116,151	1.51%	117,596	121,708	131,382	141,056	145,169	146,614	0.78%
Hunterdon County	37,966	56,800	49,600	1.35%	53,403	57,498	61,906	66,653	71,764	78,300	1.53%
Mercer County	220,373	209,758	266,672	0.96%	267,493	271,279	276,220	281,160	284,235	286,087	0.23%
Middlesex County	364,963	406,200	409,200	0.57%	427,254	446,105	465,788	486,339	507,797	532,600	0.88%
Monmouth County	221,217	252,600	246,200	0.54%	257,927	270,212	283,082	296,565	310,690	327,200	0.95%
Somerset County	144,916	154,032	177,700	1.02%	188,166	199,248	210,983	223,410	236,568	252,500	1.18%
Sussex County	29,953	40,200	37,600	1.14%	40,842	44,364	48,189	52,344	56,858	62,800	1.72%
Warren County	33,100	35,700	35,000	0.28%	36,380	37,814	39,305	40,855	42,466	44,300	0.79%
<b>New Jersey Counties</b>	<b>1,557,845</b>	<b>1,695,998</b>	<b>1,818,758</b>	<b>0.78%</b>	<b>1,882,662</b>	<b>1,937,093</b>	<b>2,015,047</b>	<b>2,095,862</b>	<b>2,167,499</b>	<b>2,243,939</b>	<b>0.70%</b>

Sources: DVRPC, NJTPA, LVPC, the New Jersey DOT, Pennsylvania Department of Planning and Industry

In the Pennsylvania counties that form part of the study area, total employment increased from 2.3 million to 2.5 million from 1990 to 2015. Table 5-4 summarizes the historical and projected change in employment through 2040. Recent forecasts estimate that total employment in these Pennsylvania counties will increase to 2.8 million by 2040.

Table 5-4 summarizes historical and forecast employment for the Pennsylvania counties in the DRJTBC area. This table represents the most recent consistent set of data and forecasts from various sources. We recognize that the table shows 2015 as a forecast, but any differences are minimal and will not change our forecasts. Overall, total employment in the DRJTBC study area is expected to increase from 4.4 million in 2010 to 4.5 million in 2020, 4.8 million in 2030, and 5.0 million in 2040. This increase represents a forecasted compound average growth rate of 0.5 percent.

**Table 5-4: Pennsylvania Employment by County and Total DRJTBC Study Area  
Employment, 1990 to 2040**

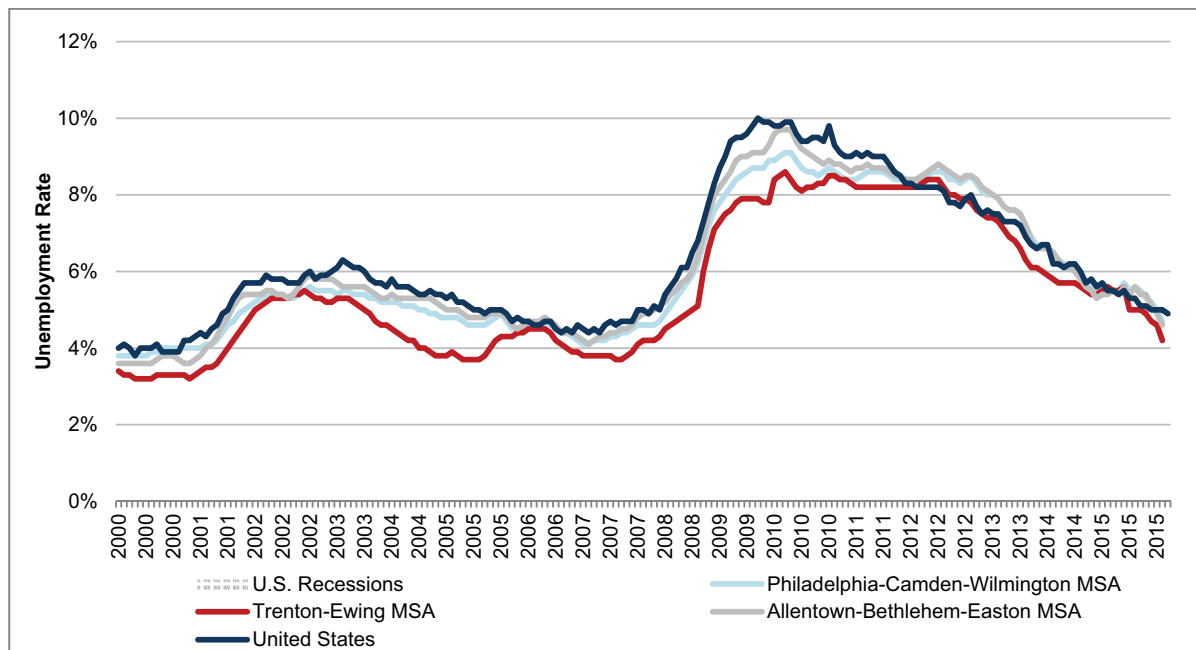
Employment	Actual				Forecast						
Pennsylvania	1990	2000	2010	1990-2010 CAGR	2015	2020	2025	2030	2035	2040	2010-40 CAGR
Bucks County	245,360	267,124	293,325	0.90%	296,215	302,961	313,899	324,832	331,329	335,747	0.45%
Chester County	197,752	238,641	292,015	1.97%	301,075	312,456	330,019	347,581	358,962	368,022	0.77%
Delaware County	227,883	238,164	238,488	0.23%	238,733	239,431	241,072	242,713	243,410	243,655	0.07%
Lehigh County	179,696	208,260	218,507	0.98%	237,752	249,511	262,156	275,136	289,421	302,771	1.09%
Monroe County	47,000	66,300	74,400	2.32%	N/A	N/A	N/A	N/A	N/A	N/A	N/A
Montgomery County	457,501	492,677	542,264	0.85%	548,136	558,371	575,496	592,621	601,597	605,507	0.37%
Northampton County	119,000	132,900	138,300	0.75%	141,808	148,575	154,978	161,722	169,440	176,761	0.82%
Philadelphia County	836,874	741,397	720,837	-0.74%	723,497	729,173	739,283	752,075	762,499	769,711	0.22%
Pike County	13,100	20,400	23,700	3.01%	N/A	N/A	N/A	N/A	N/A	N/A	N/A
<b>Pennsylvania Counties</b>	<b>2,324,166</b>	<b>2,405,863</b>	<b>2,541,836</b>	<b>0.45%</b>	<b>2,487,216</b>	<b>2,540,478</b>	<b>2,616,903</b>	<b>2,696,680</b>	<b>2,756,658</b>	<b>2,802,174</b>	<b>0.33%</b>
<b>Total</b>	<b>3,882,011</b>	<b>4,101,861</b>	<b>4,360,594</b>	<b>0.58%</b>	<b>4,369,878</b>	<b>4,477,571</b>	<b>4,631,950</b>	<b>4,792,542</b>	<b>4,924,157</b>	<b>5,046,113</b>	<b>0.49%</b>

Sources: DVRPC, NJTPA, LVPC, the New Jersey DOT, Pennsylvania Department of Planning and Industry

### 5.4.5 Regional Unemployment

The metropolitan statistical area and metropolitan divisions located within the study area have closely tracked national trends in unemployment. These regions have had a lower unemployment rate than the U.S. average. As of December 2015, the seasonally adjusted unemployment rates in the Philadelphia, Trenton, and Allentown regions ranged between 4.2 percent and 4.7 percent, slightly lower than the national unemployment rate of 4.9 percent. Figure 5-16 below summarizes regional and national unemployment rates tracked by the Bureau of Labor Statistics (BLS) from 2000 through December 2015.

**Figure 5-16: Study Area MSAs and National Unemployment Rate, 2000 to Dec 2015**



Source: Bureau of Labor Statistics

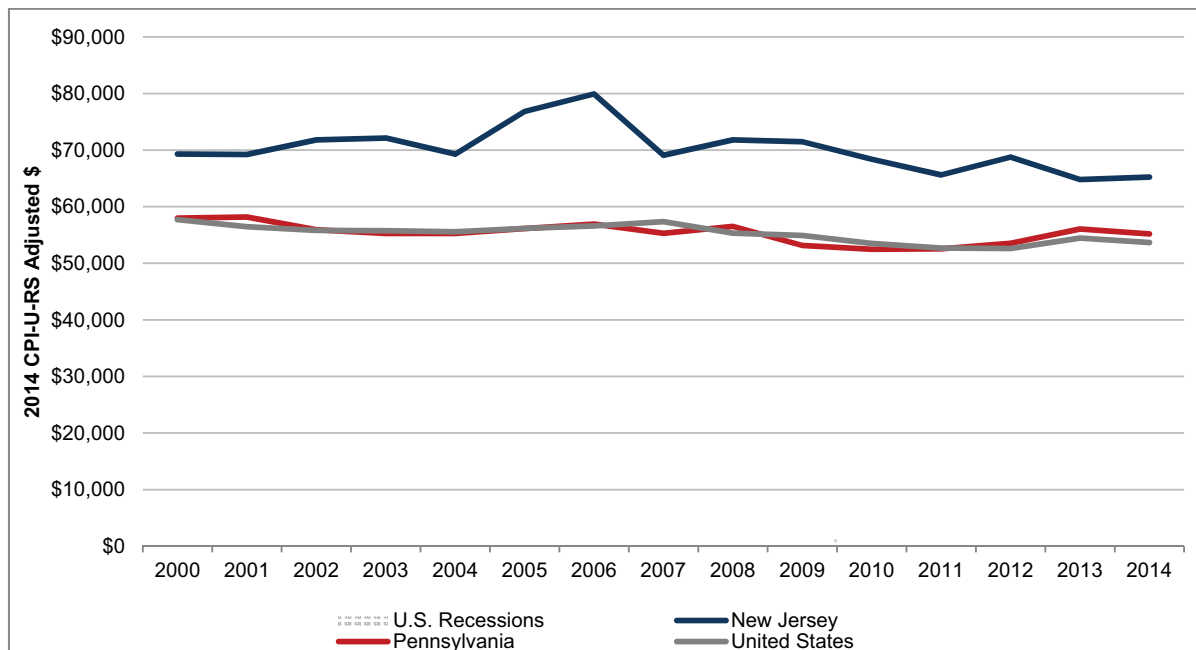
### 5.4.6 Regional Income

Real income is a key indicator of the direction and strength of the local economy. Figure 5-17 highlights that real median household income for the state of New Jersey has historically exceeded that of United States as a whole, while median household income in Pennsylvania has closely approximated national levels. The graph also highlights the impact of changes in national economic conditions on median household income at the state level.

Due to the importance of the financial services sector on New Jersey's economy, this relationship was particularly strong during the 2007-09 recession. Real median household income in New Jersey increased from \$69,278 in 2004 to \$79,915 in 2006 before falling to \$65,243 in 2014. Income levels in New Jersey have yet to fully recover to their pre-recession highs. Despite this decline, median household income in New Jersey was approximately 22 percent higher than that of the national average in 2014. New Jersey also ranked as having the 7<sup>th</sup> highest median income in the United States.

In 2014, median household income in Pennsylvania was \$55,173 or approximately 3 percent more than the national average. Pennsylvania ranked as the 24<sup>th</sup> highest state in the U.S in terms of income. Figure 5-17 summarizes real median household income in New Jersey, Pennsylvania, and the U.S. from 1984 to 2014.

**Figure 5-17: Per Capita Income in New Jersey, Pennsylvania, and the U.S, 2000-2014**



Source: Bureau of Economic Analysis, U.S. Department of Commerce

### 5.4.7 New Jersey and Pennsylvania Economic Forecast

Economic growth and employment in New Jersey and Pennsylvania have generally followed national trends. Current forecasts anticipate that this trend will continue in the short-term. Economic growth may be impacted due to the following:

- The Rutgers Economic Advisory Service/Rutgers University Center for Urban Policy Research forecasts that real Gross State Product (GSP) in New Jersey will increase by an average of 1.9 percent from 2016 to 2025;
- The State of New Jersey Department of the Treasury compiles the Garden State Activity Index – a composite of the Federal Reserve Bank of New York’s coincident index, the Federal Reserve Bank of Philadelphia’s coincident index, and the Philadelphia Fed’s South Jersey Business Survey – to measure economic activity in the state. The Garden State Activity Index grew 3.1 percent in the year to September 2015.
- The Pennsylvania Department of Revenue forecasted that real Gross State Product (GSP) in Pennsylvania will increase 2.0 percent in 2016 and 2.1 percent in 2017. Total employment is expected to increase by 1.4 percent and 0.8 percent during this time period.
- New technology has improved access to vast reserves of natural gas in Pennsylvania. Natural resources and mining employment increased by 10,000 workers from 2010 to

2015. However, employment in the industry actually decreased during 2015 as relatively lower natural gas prices have dampened exploration activities.

- Employment growth is expected to continue. The Rutgers Economic Advisory Service/Rutgers University Center for Urban Policy Research forecasted that non-agricultural employment in New Jersey will increase by an average of 0.7 percent per year from 2016 to 2025;
- During 2014, home prices increased slightly in New Jersey and Pennsylvania. However, these indicators have increased at a slower rate than the U.S. as a whole.

## 6.0 TOLL TRAFFIC AND GROSS TOLL REVENUE FORECASTS

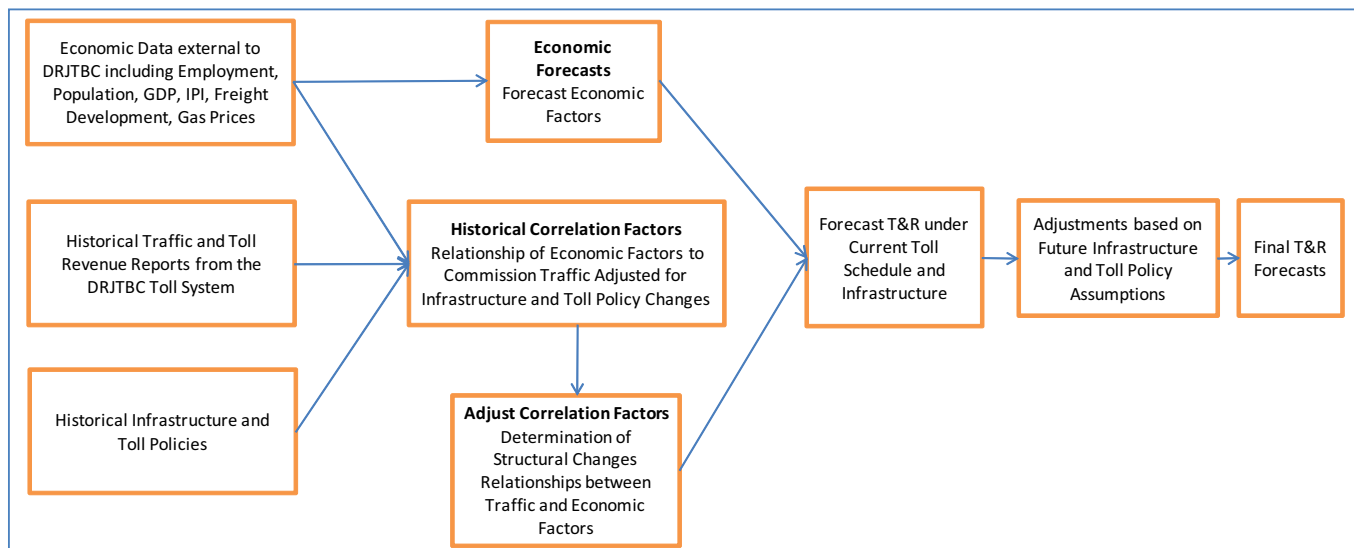
### 6.1 Seven Existing Toll Bridges

This section provides a narrative of the methodology used for developing the traffic and revenue forecasts for the seven (7) existing toll bridges, all which have a tolling history. The approach used for the Scudder Falls Bridge, which has no tolling history, is discussed in the preceding section of this report. Although the approaches are described independently in this report, the analyses overall consider the entire system and are reflected in the results.

#### 6.1.1 Methodology Used for Forecasting

The forecasting model uses historical correlations between economic and demographic factors and normalized traffic levels on the Commission's toll facilities by vehicle and payment class, adjusts those correlation factors for the forecast when structural changes in relationships are becoming apparent, and then predicts traffic as a function of forecasted economic and demographic factors. These forecasts are then adjusted to reflect DRJTBC and non-DRJTBC system infrastructure construction and improvement projects. A flowchart of the modeling methodology is presented in Figure 6-1.

Figure 6-1: DRJTBC Model Methodology



Toll Traffic and Revenue forecasts were developed with the aid of a computerized modeling platform created specifically by Jacobs for the DRJTBC. The base function of this model is to take current traffic volumes by class and payment type for each DRJTBC toll facility and adjust them in the future years for various factors such as underlying socio-

economic/demographic growth in the corridor, both historic and current, as well as overall inflationary pressures. These adjustments result in forecasted traffic volumes being developed for each year of the forecast period. Gross toll revenues are then calculated based on these new adjusted traffic volumes by applying toll rates to the volume of each toll facility by payment type and vehicle class.

#### **6.1.1.1 Inputs and Assumptions**

In the creation of a base structure for forecasting calculations, it becomes necessary to assume some consistency in relationships between historical and future traffic and revenue trends. The following assumptions were used in the creation of the forecasting framework:

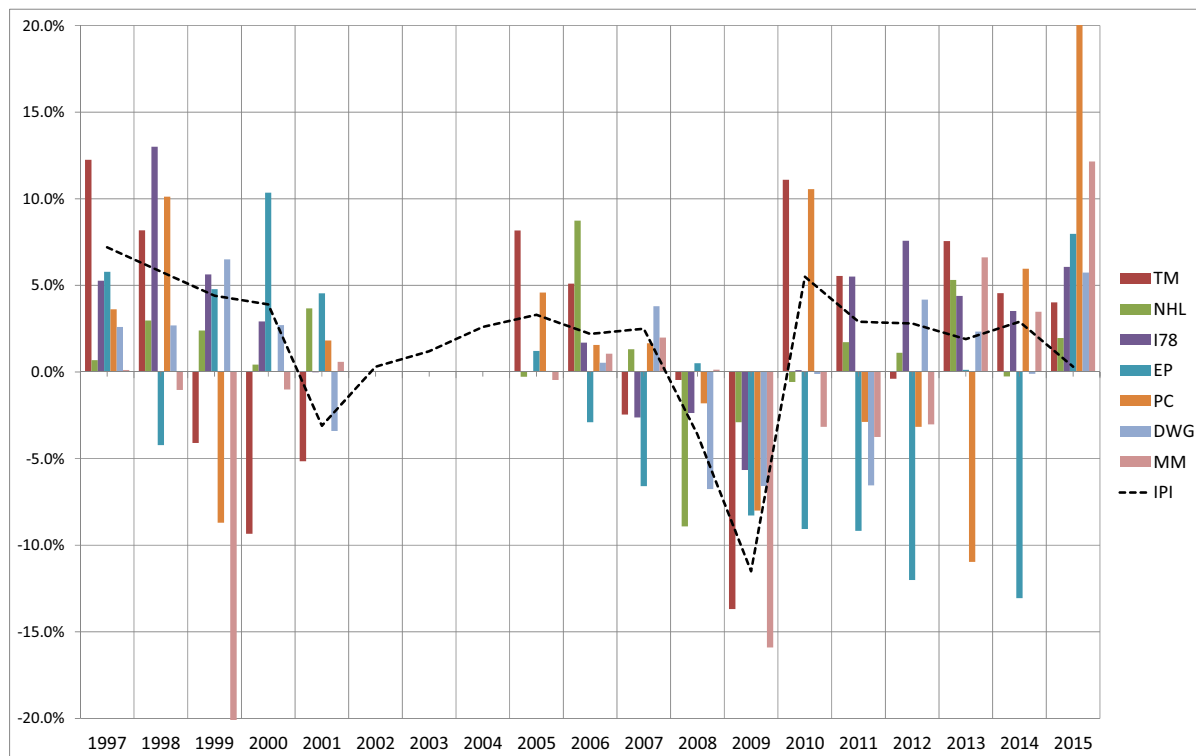
- **Traffic Growth Trends:** Correlations between historical traffic and socioeconomic indices such as Real Gross Domestic Product (GDP) and Industrial Production Index (IPI) will continue to exist. The correlation factors may slowly shift over time, but there will continue to be a correlation.
- **E-ZPass Market Share Trends:** In the past, on both the DRJTBC and other facilities offering electronic payment, the portion of trips paid for electronically has slowly increased over time until it approaches some level of market saturation, regardless of toll increases. It was assumed that this will hold true in the future.

#### **6.1.1.2 Correlation to Economic Factors**

In order to understand the correlation between socioeconomic factors and DRJTBC toll facility traffic, growth in historical traffic was compared to the growth in relevant socioeconomic factors, such as IPI and GDP. In the calculation of correlation constants for each of the DRJTBC facilities, years that experienced unusual events, such as toll increases, were left out of the calculation in an effort to “normalize” the correlation.

Figure 6-2 shows an example of traffic growth compared to a socioeconomic factor – in this case, the growth in truck traffic versus growth in IPI. On this graph, each of the individual DRJTBC toll facilities is represented by a different color bar, while IPI is represented by the black dashed line. As illustrated by this graph, truck growth and IPI growth tend to follow the same trends – a given year with strong positive truck growth on average, such as 1997 (far left) also saw strong IPI growth, while years with strong negative growth, such as 2009, also saw a large decrease in IPI.

**Figure 6-2: Truck Growth versus IPI Growth**



Correlations were also calculated between car growth and GDP, and population growth was considered as well. The correlation factors determined for each facility for GDP and IPI were used to relate growth forecasts to consensus forecasts for GDP and IPI throughout the forecast period.

### 6.1.1.3 Other Forecast Considerations

Some further considerations were made when developing our future traffic growth forecasts. Among these considerations are the historically-optimistic financial community economic forecasts (such as GDP and IPI) in recent years, as well as the estimated effects of construction projects, new regional development, changes to parallel corridors, and other factors not explicitly contained within the modeling process. This section includes a review of changes to nearby facilities, future transportation projects, and future developments that could influence traffic on the DRJTBC.

Modern route planning techniques used by many of the trucking companies are designed to optimize route selection and take into consideration factors such as travel time, fuel,



mileage, tolls, vertical grades, salaries, load optimization and other parameters in order to select the most important route for travel. Our analysis of potential diversions considers these important route choice factors. It should be noted that a majority of commercial vehicles using a particular DRJTBC bridge are doing so because they have already determined it to be the “best” route for the operation of their particular business needs. Similarly, the operators using the alternate routes have determined that those alternate routes are the “best” route to meet their needs.

Factors that have the potential to appreciably affect DRJTBC traffic levels would be activities in Pennsylvania and New Jersey immediately surrounding the DRJTBC toll facilities, including the construction of the new I-95 interchanges, and major development in adjacent areas. Changes to the toll rates on complementary and parallel roadways may also affect travel on DRJTBC facilities.

#### **6.1.1.3.1 Transportation Projects, Potential Future or Completed**

There are several highway projects either recently completed or that are scheduled for completion in the near term that were reviewed to determine their impact, if any, on DRJTBC traffic volumes.

##### *I-95 / Pennsylvania Turnpike Interchange*

Stage 1 of the project involves the construction of the I-95 mainline flyovers of the interchange between I-95 and the Pennsylvania Turnpike, a new mainline toll plaza west of this interchange, the replacement of the existing Delaware River Bridge toll plaza with a cashless tolling facility in the westbound direction, and the removal of the existing US 13 interchange toll facility.

Completed Stage 1 work includes the construction of the new Neshaminy Falls mainline toll plaza (opened in January 2016), located about two miles east of Exit 351 (US1). The toll plaza features Express E-Z Pass lanes which allow motorists to pass through the plaza at highway speeds. Conventional toll booths are provided in the outside lanes of the plaza for cash paying customers. This toll plaza phase also included the construction of a cashless tolling point (AET – EZ-Pass and Toll by Plate) at the Delaware River Bridge in the westbound direction and the removal of the Route 13 Interchange toll plaza. The I-95 mainline flyover connections of the Interchange are currently under construction and, upon their completion, I-95 will be re-designated onto the existing Pennsylvania Turnpike to the NJ Turnpike. At that time, I-95 north of the Turnpike will be re-designated in PA, as I-295 East/West, and in NJ up to US 1, as I-295 North/South. Signing, lighting and traffic operations work are being completed in phases throughout the construction period in order

to manage traffic during and after construction. Funding for Stage 1 improvements via the use of dedicated federal monies and Pennsylvania Turnpike Commission toll revenue has been fully identified and programmed at the statewide and regional level, and the total estimated cost of Stage 1 (all phases) is \$424 Million.

A future Stage 2 will include construction of the remaining six new interchange ramp movements which do not have the I-95 designation, and completion of the mainline widening from 2 lanes in each direction to three lanes in each direction in addition to reconstruction work on the Turnpike and I-95. Construction of Stage 2 is not anticipated to begin until funding becomes available. A future Stage 3 will include a new parallel bridge over the Delaware River.

We are of the opinion that this project would not have a significant impact on future traffic levels on the current DRJTBC toll facilities. The current DVRPC model includes the interchange as it is currently envisioned to be funded and completed, with the first two ramps (Stage 1) completed at the end of 2018 and the other six ramps (Stage 2) completed in 2030.

#### *Other Projects*

The following is a list of several recently completed projects concerning DRJTBC Bridges that were reviewed for their potential impact to traffic. Our review determined that no adjustments to our forecast were warranted based on these activities.

- Easton-Phillipsburg Toll (Route 22) Bridge Rehab (completed), started June 2013, completed in spring 2015
- I-78 paving improvements (completed), 2012 and 2013
- New Hope-Lambertville Toll Bridge Improvements (completed), June-Nov 2013

#### **6.1.1.3.2 Complementary Routes**

Since 2009, there have been a number of toll rate increases on the Pennsylvania Turnpike. I-78 is an alternate to the Pennsylvania Turnpike for long distance trips. There have been increases in recent years of truck traffic on the I-78 Toll Bridge above and beyond its correlation to IPI. We are of opinion that there was some shift of truck traffic from the Pennsylvania Turnpike to I-78 due to the Pennsylvania Turnpike's toll increases, and that this accounts for a portion of the recent growth on the I-78 Toll Bridge. As we anticipate that there will be fewer and less substantial toll increases on the Pennsylvania Turnpike, we do not expect further significant perceptible shifts of truck traffic onto I-78 due to this reason.

#### 6.1.1.4 E-ZPass Market Share Forecasts

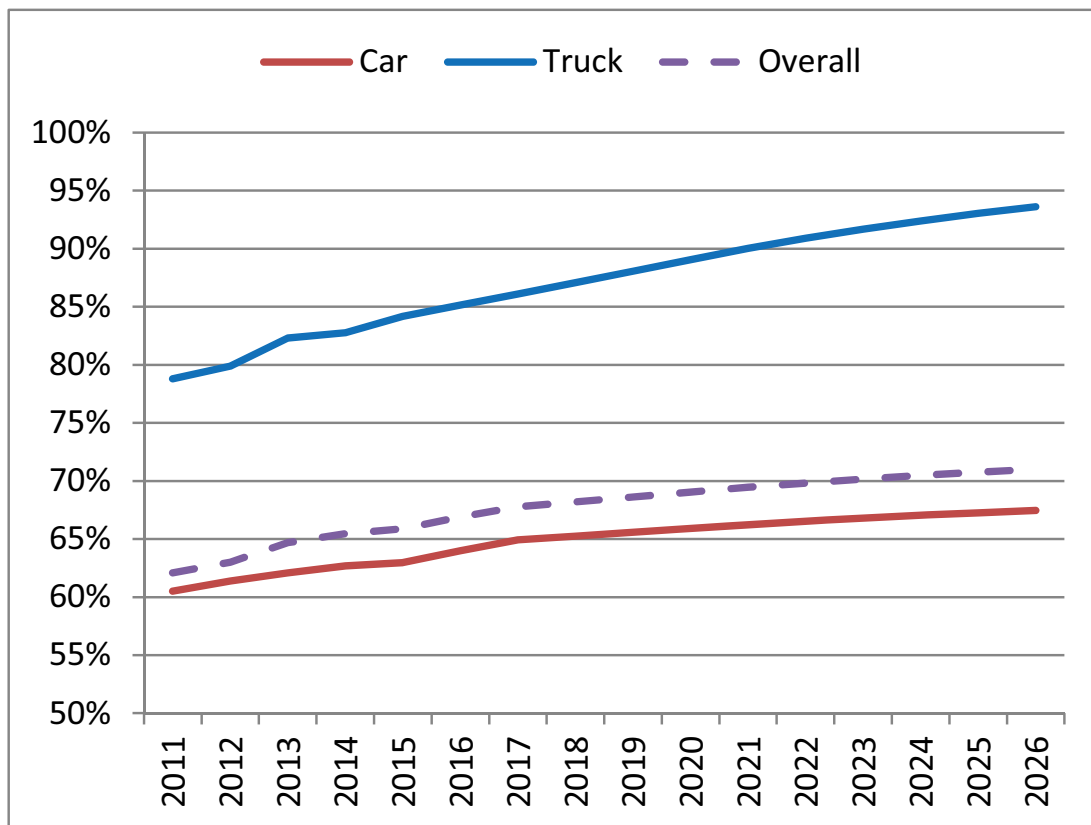
For the purpose of these forecasts, it was assumed that the DRJTBC's E-ZPass market share would continue to increase, but that the rate at which it increases would slow down over time.

Table 6-1 and Figure 6-3 present a summary of the historical and forecasted average trip market shares for cars and trucks for 2011-2026 and the projected overall market share through the forecast period.

**Table 6-1: Historical and Forecasted E-ZPass Market Share of Trips**

Year	Car	Truck	Overall
2011	60.5%	78.8%	62.1%
2012	61.4%	79.9%	63.0%
2013	62.1%	82.3%	64.7%
2014	62.7%	82.8%	65.5%
2015	63.0%	84.2%	65.9%
2016	64.0%	85.1%	66.9%
2017	64.9%	86.1%	67.8%
2018	65.2%	87.1%	68.2%
2019	65.6%	88.1%	68.6%
2020	65.9%	89.0%	69.0%
2021	66.2%	90.0%	69.4%
2022	66.5%	90.9%	69.8%
2023	66.8%	91.7%	70.2%
2024	67.1%	92.4%	70.5%
2025	67.3%	93.0%	70.7%
2026	67.5%	93.6%	71.0%

**Figure 6-3: Historical and Forecasted E-ZPass Market Shares**



#### 6.1.1.5 Toll Rates Used in Preparing Forecast

We assumed the existing DRJTBC toll schedule throughout the forecast period in preparing the traffic and toll revenue forecasts, shown previously in Table 2-1.

#### 6.1.1.6 Model Calculations

The model creates a framework based on the assumptions outlined above, and calculates the forecasted traffic and revenue by applying logic to the 2015 annual trips for each payment class. Some adjustment to traffic is necessary even with no changes in the toll schedule, as traffic grows and shifts between payment types based on historical trends. Estimated average toll rates based on historical data as well as any necessary adjustments due to traffic shifts and any toll increases are then applied to traffic estimates by class and payment type to produce a customized forecast resulting in precise estimates of total revenue.

## 6.1.2 Toll Trips and Gross Toll Revenue Forecasts

Table 6-2 and Table 6-3 present the forecasted toll transactions and toll revenues for the years 2016 through 2026. Figure 6-4 and Figure 6-5 present the forecasts graphically, while Figure 6-6 and Figure 6-7 show the future year-to-year growth in trips and gross toll revenues. Table 6-5 and Table 6-6 present traffic and revenue for the individual toll bridges.

**Table 6-2: Forecasted DRJTBC Toll Transactions (in millions)**

Facility	Delaware River Joint Toll Bridge Commission - Transaction Projections										
	2016	2017	2018	2019	2020	2021	2022	2023	2024	2025	2026
<b>Trenton-Morrisville</b>											
Cars	8.41	8.58	8.65	8.70	8.76	8.81	8.86	8.92	8.97	9.03	9.08
Trucks	0.59	0.59	0.59	0.60	0.61	0.62	0.63	0.64	0.65	0.66	0.67
<b>Total</b>	<b>9.00</b>	<b>9.17</b>	<b>9.24</b>	<b>9.30</b>	<b>9.37</b>	<b>9.43</b>	<b>9.49</b>	<b>9.56</b>	<b>9.62</b>	<b>9.69</b>	<b>9.75</b>
<b>New Hope-Lambertville</b>											
Cars	1.84	1.87	1.88	1.89	1.89	1.90	1.91	1.92	1.93	1.94	1.95
Trucks	0.12	0.12	0.13	0.13	0.13	0.13	0.13	0.13	0.14	0.14	0.14
<b>Total</b>	<b>1.96</b>	<b>1.99</b>	<b>2.01</b>	<b>2.02</b>	<b>2.02</b>	<b>2.03</b>	<b>2.04</b>	<b>2.05</b>	<b>2.07</b>	<b>2.08</b>	<b>2.09</b>
<b>I-78</b>											
Cars	9.11	9.25	9.36	9.46	9.56	9.66	9.76	9.87	9.97	10.08	10.18
Trucks	2.93	2.95	2.98	3.00	3.02	3.05	3.07	3.10	3.12	3.15	3.17
<b>Total</b>	<b>12.04</b>	<b>12.20</b>	<b>12.34</b>	<b>12.46</b>	<b>12.58</b>	<b>12.71</b>	<b>12.83</b>	<b>12.97</b>	<b>13.09</b>	<b>13.23</b>	<b>13.35</b>
<b>Easton-Phillipsburg</b>											
Cars	5.09	5.12	5.14	5.15	5.16	5.18	5.19	5.20	5.22	5.23	5.24
Trucks	0.33	0.33	0.33	0.33	0.33	0.33	0.33	0.33	0.33	0.33	0.33
<b>Total</b>	<b>5.42</b>	<b>5.45</b>	<b>5.47</b>	<b>5.48</b>	<b>5.49</b>	<b>5.51</b>	<b>5.52</b>	<b>5.53</b>	<b>5.55</b>	<b>5.56</b>	<b>5.57</b>
<b>Portland-Columbia</b>											
Cars	1.19	1.20	1.21	1.22	1.23	1.23	1.24	1.25	1.26	1.27	1.27
Trucks	0.09	0.09	0.09	0.09	0.09	0.09	0.09	0.10	0.10	0.10	0.10
<b>Total</b>	<b>1.28</b>	<b>1.29</b>	<b>1.30</b>	<b>1.31</b>	<b>1.32</b>	<b>1.32</b>	<b>1.33</b>	<b>1.35</b>	<b>1.36</b>	<b>1.37</b>	<b>1.37</b>
<b>Delaware Water Gap</b>											
Cars	8.35	8.51	8.62	8.70	8.78	8.87	8.95	9.04	9.12	9.21	9.30
Trucks	1.44	1.45	1.46	1.47	1.48	1.49	1.50	1.51	1.52	1.54	1.55
<b>Total</b>	<b>9.79</b>	<b>9.96</b>	<b>10.08</b>	<b>10.17</b>	<b>10.26</b>	<b>10.36</b>	<b>10.45</b>	<b>10.55</b>	<b>10.64</b>	<b>10.75</b>	<b>10.85</b>
<b>Milford Montague</b>											
Cars	1.30	1.32	1.33	1.33	1.34	1.34	1.35	1.35	1.35	1.36	1.36
Trucks	0.04	0.04	0.04	0.04	0.04	0.04	0.04	0.04	0.04	0.04	0.04
<b>Total</b>	<b>1.34</b>	<b>1.36</b>	<b>1.37</b>	<b>1.37</b>	<b>1.38</b>	<b>1.38</b>	<b>1.39</b>	<b>1.39</b>	<b>1.39</b>	<b>1.40</b>	<b>1.40</b>
<b>Legacy Toll Bridges - SubTotal</b>											
Cars	35.29	35.85	36.19	36.45	36.72	36.99	37.26	37.55	37.82	38.12	38.38
Trucks	5.54	5.57	5.62	5.66	5.70	5.75	5.79	5.85	5.90	5.96	6.00
<b>Total</b>	<b>40.83</b>	<b>41.42</b>	<b>41.81</b>	<b>42.11</b>	<b>42.42</b>	<b>42.74</b>	<b>43.05</b>	<b>43.40</b>	<b>43.72</b>	<b>44.08</b>	<b>44.38</b>
<b>Scudder Falls</b>											
Cars				5.5	9.5	9.6	9.7	9.8	9.8	9.9	10.0
Trucks				0.4	0.7	0.7	0.7	0.7	0.7	0.7	0.7
Trenton-Morrisville Diverted Traffic				0.4	0.4	0.4	0.4	0.4	0.4	0.4	0.4
<b>Total</b>				<b>6.3</b>	<b>10.6</b>	<b>10.7</b>	<b>10.8</b>	<b>10.9</b>	<b>10.9</b>	<b>11.0</b>	<b>11.1</b>
<b>All Toll Bridges</b>											
Cars	35.29	35.85	36.19	42.35	46.62	46.99	47.36	47.75	48.02	48.42	48.78
Trucks	5.54	5.57	5.62	6.06	6.40	6.45	6.49	6.55	6.60	6.66	6.70
<b>Total</b>	<b>40.83</b>	<b>41.42</b>	<b>41.81</b>	<b>48.41</b>	<b>53.02</b>	<b>53.44</b>	<b>53.85</b>	<b>54.30</b>	<b>54.62</b>	<b>55.08</b>	<b>55.48</b>

Note: 2016 data shown is unaudited.

**Table 6-3: Forecasted DRJTBC Gross Toll Revenues (in millions)**

Facility	Delaware River Joint Toll Bridge Commission - Toll Revenue Projections										
	2016	2017	2018	2019	2020	2021	2022	2023	2024	2025	2026
<b>Trenton-Morrisville</b>											
Cars	\$8.50	\$8.64	\$8.70	\$8.75	\$8.80	\$8.84	\$8.89	\$8.94	\$8.99	\$9.04	\$9.09
Trucks	\$7.56	\$7.53	\$7.59	\$7.71	\$7.83	\$7.95	\$8.08	\$8.21	\$8.34	\$8.47	\$8.61
<b>Total</b>	<b>\$16.06</b>	<b>\$16.17</b>	<b>\$16.29</b>	<b>\$16.46</b>	<b>\$16.63</b>	<b>\$16.79</b>	<b>\$16.97</b>	<b>\$17.15</b>	<b>\$17.33</b>	<b>\$17.51</b>	<b>\$17.70</b>
<b>New Hope-Lambertville</b>											
Cars	\$1.80	\$1.82	\$1.83	\$1.84	\$1.84	\$1.85	\$1.86	\$1.87	\$1.88	\$1.89	\$1.90
Trucks	\$1.44	\$1.45	\$1.47	\$1.49	\$1.51	\$1.53	\$1.55	\$1.57	\$1.59	\$1.61	\$1.63
<b>Total</b>	<b>\$3.24</b>	<b>\$3.27</b>	<b>\$3.30</b>	<b>\$3.33</b>	<b>\$3.35</b>	<b>\$3.38</b>	<b>\$3.41</b>	<b>\$3.44</b>	<b>\$3.47</b>	<b>\$3.50</b>	<b>\$3.53</b>
<b>I-78</b>											
Cars	\$9.63	\$10.52	\$10.64	\$10.74	\$10.85	\$10.96	\$11.07	\$11.18	\$11.29	\$11.40	\$11.52
Trucks	\$52.23	\$52.43	\$52.94	\$53.34	\$53.74	\$54.15	\$54.57	\$54.98	\$55.41	\$55.83	\$56.26
<b>Total</b>	<b>\$61.86</b>	<b>\$62.95</b>	<b>\$63.58</b>	<b>\$64.08</b>	<b>\$64.59</b>	<b>\$65.11</b>	<b>\$65.64</b>	<b>\$66.16</b>	<b>\$66.70</b>	<b>\$67.23</b>	<b>\$67.78</b>
<b>Easton-Phillipsburg</b>											
Cars	\$5.24	\$5.04	\$5.05	\$5.06	\$5.07	\$5.08	\$5.09	\$5.10	\$5.11	\$5.12	\$5.13
Trucks	\$4.29	\$4.23	\$4.24	\$4.25	\$4.25	\$4.26	\$4.27	\$4.28	\$4.29	\$4.30	\$4.31
<b>Total</b>	<b>\$9.53</b>	<b>\$9.27</b>	<b>\$9.29</b>	<b>\$9.31</b>	<b>\$9.32</b>	<b>\$9.34</b>	<b>\$9.36</b>	<b>\$9.38</b>	<b>\$9.40</b>	<b>\$9.42</b>	<b>\$9.44</b>
<b>Portland-Columbia</b>											
Cars	\$1.27	\$1.21	\$1.22	\$1.23	\$1.23	\$1.24	\$1.25	\$1.26	\$1.26	\$1.27	\$1.28
Trucks	\$1.35	\$1.28	\$1.29	\$1.29	\$1.30	\$1.30	\$1.31	\$1.31	\$1.32	\$1.32	\$1.32
<b>Total</b>	<b>\$2.62</b>	<b>\$2.49</b>	<b>\$2.51</b>	<b>\$2.52</b>	<b>\$2.53</b>	<b>\$2.54</b>	<b>\$2.56</b>	<b>\$2.57</b>	<b>\$2.58</b>	<b>\$2.59</b>	<b>\$2.60</b>
<b>Delaware Water Gap</b>											
Cars	\$8.47	\$8.92	\$9.03	\$9.11	\$9.19	\$9.28	\$9.36	\$9.44	\$9.53	\$9.62	\$9.71
Trucks	\$25.18	\$25.31	\$25.52	\$25.71	\$25.89	\$26.08	\$26.27	\$26.46	\$26.65	\$26.84	\$27.04
<b>Total</b>	<b>\$33.66</b>	<b>\$34.23</b>	<b>\$34.55</b>	<b>\$34.82</b>	<b>\$35.08</b>	<b>\$35.36</b>	<b>\$35.63</b>	<b>\$35.90</b>	<b>\$36.18</b>	<b>\$36.46</b>	<b>\$36.75</b>
<b>Milford Montague</b>											
Cars	\$1.28	\$1.31	\$1.31	\$1.31	\$1.32	\$1.32	\$1.32	\$1.33	\$1.33	\$1.33	\$1.33
Trucks	\$0.40	\$0.39	\$0.39	\$0.39	\$0.39	\$0.39	\$0.39	\$0.39	\$0.40	\$0.40	\$0.40
<b>Total</b>	<b>\$1.69</b>	<b>\$1.70</b>	<b>\$1.70</b>	<b>\$1.70</b>	<b>\$1.71</b>	<b>\$1.71</b>	<b>\$1.71</b>	<b>\$1.72</b>	<b>\$1.73</b>	<b>\$1.73</b>	<b>\$1.73</b>
<b>Legacy Toll Bridges - SubTotal</b>											
Cars	\$36.19	\$37.46	\$37.78	\$38.04	\$38.30	\$38.57	\$38.84	\$39.12	\$39.39	\$39.67	\$39.96
Trucks	\$92.46	\$92.62	\$93.44	\$94.18	\$94.91	\$95.66	\$96.44	\$97.20	\$98.00	\$98.77	\$99.57
<b>Total</b>	<b>\$128.65</b>	<b>\$130.08</b>	<b>\$131.22</b>	<b>\$132.22</b>	<b>\$133.21</b>	<b>\$134.23</b>	<b>\$135.28</b>	<b>\$136.32</b>	<b>\$137.39</b>	<b>\$138.44</b>	<b>\$139.53</b>
<b>Scudder Falls</b>											
Toll Revenue				\$10.06	\$19.12	\$19.31	\$19.49	\$19.68	\$19.88	\$20.07	\$20.27
Late Fees				\$0.87	\$2.20	\$2.00	\$1.85	\$1.74	\$1.65	\$1.60	\$1.55
Trenton-Morrisville Additional Revenue				\$0.94	\$1.61	\$1.62	\$1.63	\$1.64	\$1.65	\$1.67	\$1.68
Adtl Costs				-\$2.42	-\$3.72	-\$3.49	-\$3.32	-\$3.20	-\$3.11	-\$3.05	-\$3.01
<b>Total</b>				<b>\$9.46</b>	<b>\$19.22</b>	<b>\$19.44</b>	<b>\$19.65</b>	<b>\$19.86</b>	<b>\$20.07</b>	<b>\$20.29</b>	<b>\$20.50</b>
<b>All Toll Bridges</b>											
<b>Total</b>	<b>\$128.65</b>	<b>\$130.08</b>	<b>\$131.22</b>	<b>\$141.68</b>	<b>\$152.43</b>	<b>\$153.67</b>	<b>\$154.93</b>	<b>\$156.18</b>	<b>\$157.46</b>	<b>\$158.73</b>	<b>\$160.03</b>

Note: 2016 data shown is unaudited.

Figure 6-4: Historical and Forecasted Toll Transactions, millions

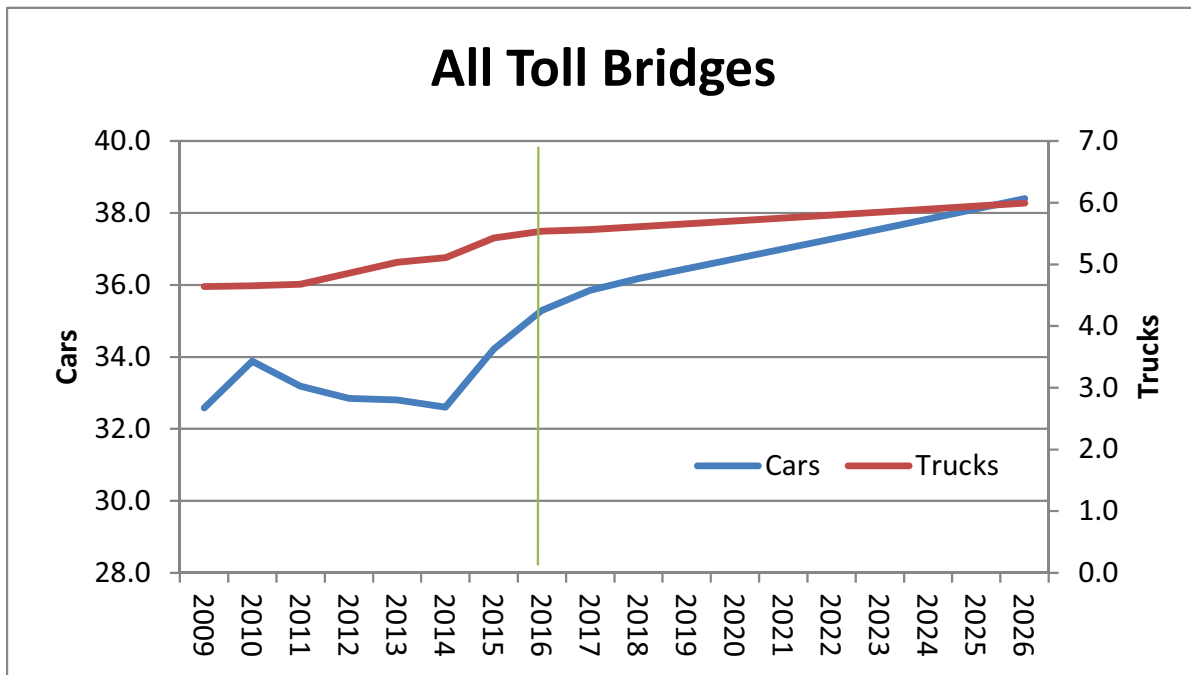
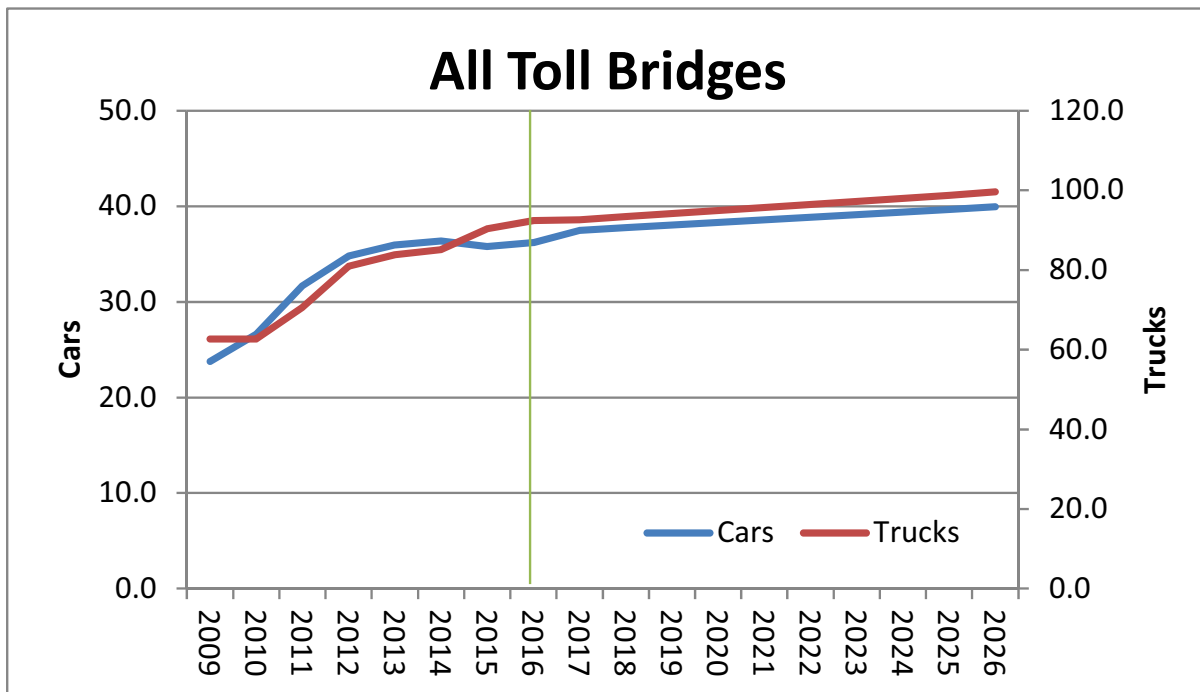
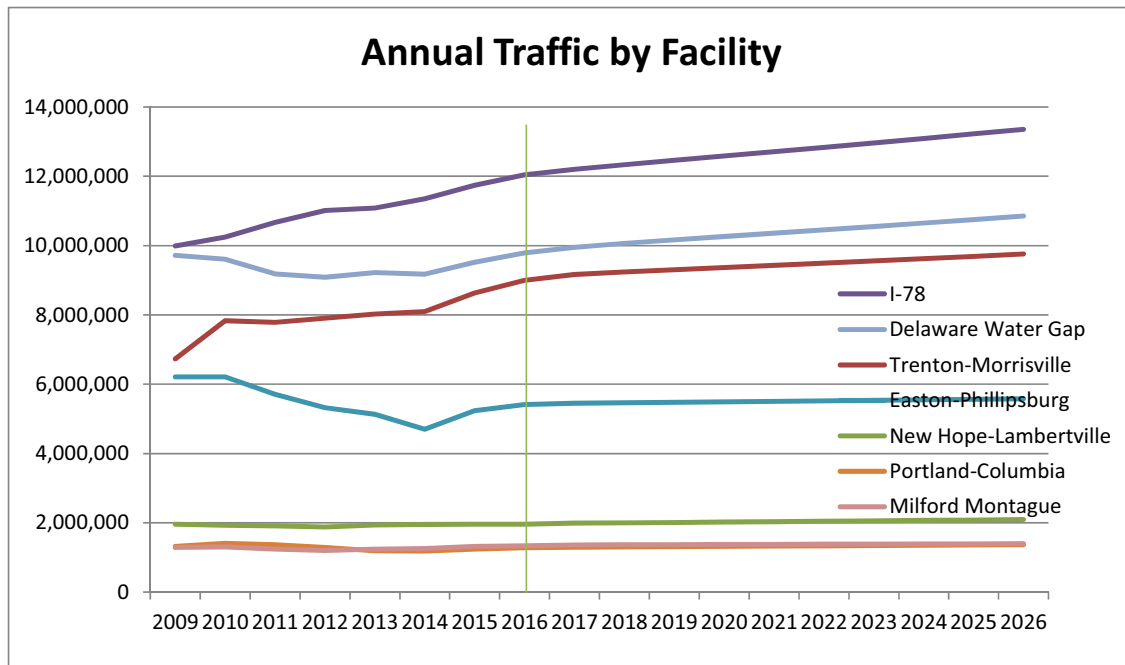


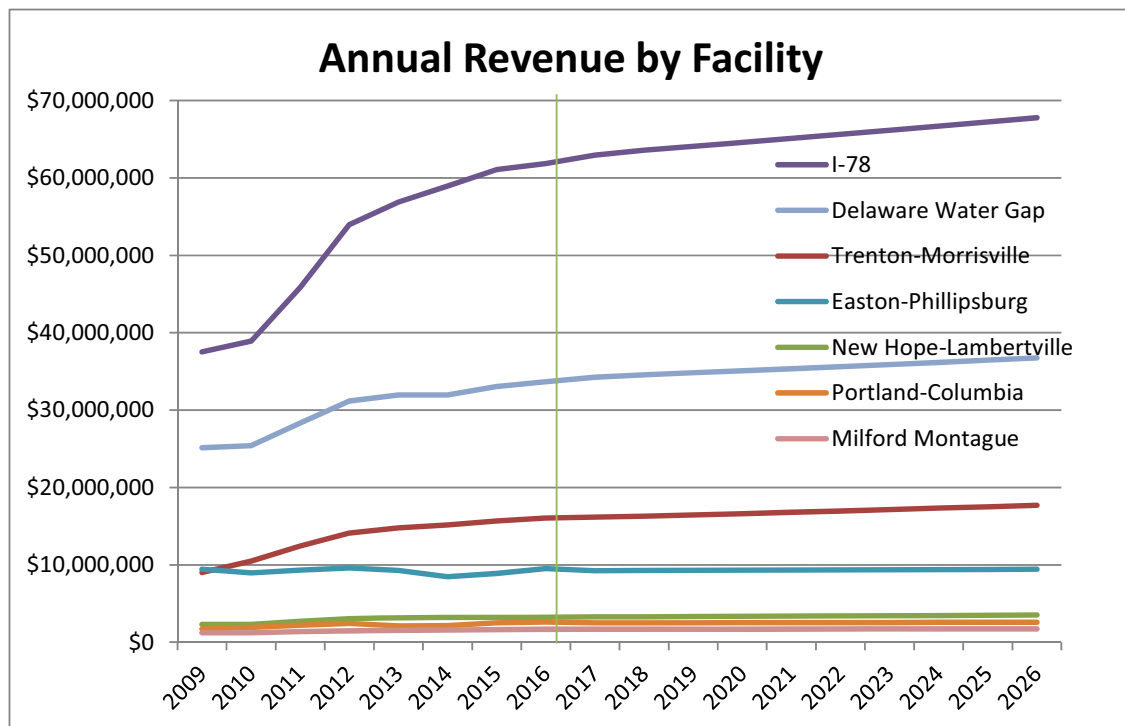
Figure 6-5: Historical and Forecasted Gross Toll Revenues, millions



**Figure 6-6: Historical and Forecasted Toll Transactions, by Facility**



**Figure 6-7: Historical and Forecasted Gross Toll Revenue, by Facility**





**Table 6-4: Toll Transaction Growth Forecasts**

Facility	Year													
	2013*	2014*	2015*	2016	2017	2018	2019	2020	2021	2022	2023	2024	2025	2026
<b>Trenton-Morrisville</b>														
Cars	1.05%	0.66%	6.77%	4.61%	2.0%	0.8%	0.6%	0.6%	0.6%	0.6%	0.6%	0.6%	0.6%	0.6%
Trucks	7.56%	4.56%	4.02%	0.68%	-0.5%	0.7%	1.6%	1.6%	1.6%	1.6%	1.6%	1.6%	1.6%	1.6%
<b>Total</b>	<b>1.46%</b>	<b>0.93%</b>	<b>6.57%</b>	<b>4.35%</b>	<b>1.9%</b>	<b>0.8%</b>	<b>0.7%</b>	<b>0.7%</b>	<b>0.7%</b>	<b>0.7%</b>	<b>0.7%</b>	<b>0.7%</b>	<b>0.7%</b>	<b>0.7%</b>
<b>New Hope-Lambertville</b>														
Cars	2.78%	1.20%	0.35%	-0.19%	1.6%	0.5%	0.5%	0.5%	0.5%	0.5%	0.5%	0.5%	0.5%	0.5%
Trucks	5.31%	-0.26%	1.97%	2.44%	-1.8%	1.3%	1.3%	1.3%	1.3%	1.3%	1.3%	1.3%	1.3%	1.3%
<b>Total</b>	<b>2.93%</b>	<b>1.12%</b>	<b>0.45%</b>	<b>-0.03%</b>	<b>1.4%</b>	<b>0.6%</b>	<b>0.6%</b>	<b>0.6%</b>	<b>0.6%</b>	<b>0.6%</b>	<b>0.6%</b>	<b>0.6%</b>	<b>0.6%</b>	<b>0.6%</b>
<b>I-78</b>														
Cars	-0.50%	2.08%	2.57%	2.70%	1.5%	1.2%	1.1%	1.1%	1.1%	1.1%	1.1%	1.1%	1.1%	1.1%
Trucks	4.40%	3.53%	6.07%	2.20%	0.7%	1.0%	0.8%	0.8%	0.8%	0.8%	0.8%	0.8%	0.8%	0.8%
<b>Total</b>	<b>0.61%</b>	<b>2.42%</b>	<b>3.40%</b>	<b>2.58%</b>	<b>1.3%</b>	<b>1.1%</b>	<b>1.0%</b>	<b>1.0%</b>	<b>1.0%</b>	<b>1.0%</b>	<b>1.0%</b>	<b>1.0%</b>	<b>1.0%</b>	<b>1.0%</b>
<b>Easton-Phillipsburg</b>														
Cars	-3.76%	-8.15%	11.56%	3.48%	0.6%	0.3%	0.3%	0.3%	0.3%	0.3%	0.3%	0.3%	0.3%	0.3%
Trucks	0.13%	-13.06%	7.98%	3.78%	1.3%	0.2%	0.2%	0.2%	0.2%	0.2%	0.2%	0.2%	0.2%	0.2%
<b>Total</b>	<b>-3.52%</b>	<b>-8.47%</b>	<b>11.34%</b>	<b>3.50%</b>	<b>0.6%</b>	<b>0.3%</b>	<b>0.3%</b>	<b>0.3%</b>	<b>0.3%</b>	<b>0.3%</b>	<b>0.3%</b>	<b>0.3%</b>	<b>0.3%</b>	<b>0.3%</b>
<b>Portland-Columbia</b>														
Cars	-7.23%	-1.07%	3.20%	3.51%	1.2%	0.7%	0.7%	0.7%	0.7%	0.7%	0.7%	0.7%	0.7%	0.7%
Trucks	-10.96%	5.97%	31.86%	-4.54%	-5.2%	0.3%	0.3%	0.3%	0.3%	0.3%	0.3%	0.3%	0.3%	0.3%
<b>Total</b>	<b>-7.46%</b>	<b>-0.65%</b>	<b>5.02%</b>	<b>2.87%</b>	<b>0.7%</b>	<b>0.6%</b>	<b>0.6%</b>	<b>0.6%</b>	<b>0.6%</b>	<b>0.6%</b>	<b>0.6%</b>	<b>0.6%</b>	<b>0.6%</b>	<b>0.6%</b>
<b>Delaware Water Gap</b>														
Cars	1.39%	-0.59%	3.40%	2.89%	1.9%	1.3%	1.0%	1.0%	1.0%	1.0%	1.0%	1.0%	1.0%	1.0%
Trucks	2.34%	-0.10%	5.74%	2.71%	0.9%	0.9%	0.7%	0.7%	0.7%	0.7%	0.7%	0.7%	0.7%	0.7%
<b>Total</b>	<b>1.52%</b>	<b>-0.52%</b>	<b>3.74%</b>	<b>2.86%</b>	<b>1.7%</b>	<b>1.2%</b>	<b>0.9%</b>	<b>0.9%</b>	<b>0.9%</b>	<b>0.9%</b>	<b>0.9%</b>	<b>0.9%</b>	<b>0.9%</b>	<b>0.9%</b>
<b>Milford Montague</b>														
Cars	3.25%	0.84%	4.85%	1.70%	1.44%	0.5%	0.3%	0.3%	0.3%	0.3%	0.3%	0.3%	0.3%	0.3%
Trucks	6.62%	3.47%	12.15%	0.47%	1.28%	0.0%	0.3%	0.3%	0.3%	0.3%	0.3%	0.3%	0.3%	0.3%
<b>Total</b>	<b>3.34%</b>	<b>0.91%</b>	<b>5.05%</b>	<b>1.66%</b>	<b>1.43%</b>	<b>0.5%</b>	<b>0.3%</b>	<b>0.3%</b>	<b>0.3%</b>	<b>0.3%</b>	<b>0.3%</b>	<b>0.3%</b>	<b>0.3%</b>	<b>0.3%</b>
<b>All Toll Bridges</b>														
Cars	-0.13%	-0.59%	4.94%	3.14%	1.58%	0.9%	0.7%	0.7%	0.7%	0.7%	0.7%	0.7%	0.7%	0.7%
Trucks	3.66%	1.53%	6.19%	2.13%	0.53%	0.9%	0.8%	0.8%	0.8%	0.8%	0.8%	0.8%	0.8%	0.8%
<b>Total</b>	<b>0.35%</b>	<b>-0.30%</b>	<b>5.11%</b>	<b>3.00%</b>	<b>1.44%</b>	<b>0.9%</b>	<b>0.8%</b>	<b>0.8%</b>	<b>0.8%</b>	<b>0.8%</b>	<b>0.8%</b>	<b>0.8%</b>	<b>0.8%</b>	<b>0.8%</b>

\*Actual (Annual Traffic Engineering Reports and Monthly Comparatives)

Note: 2016 data shown is unaudited.

**Table 6-5: Gross Toll Revenue Growth Forecasts**

Facility	Year													
	2013*	2014*	2015*	2016	2017	2018	2019	2020	2021	2022	2023	2024	2025	2026
<b>Trenton-Morrisville</b>														
Cars	2.78%	1.29%	2.75%	4.87%	1.7%	0.7%	0.5%	0.5%	0.5%	0.5%	0.6%	0.6%	0.6%	0.6%
Trucks	6.82%	4.37%	3.72%	-0.15%	-0.4%	0.7%	1.6%	1.6%	1.6%	1.6%	1.6%	1.6%	1.6%	1.6%
<b>Total</b>	<b>4.65%</b>	<b>2.75%</b>	<b>3.22%</b>	<b>2.44%</b>	<b>0.7%</b>	<b>0.7%</b>	<b>1.0%</b>	<b>1.0%</b>	<b>1.0%</b>	<b>1.0%</b>	<b>1.0%</b>	<b>1.1%</b>	<b>1.1%</b>	<b>1.1%</b>
<b>New Hope-Lambertville</b>														
Cars	4.06%	0.76%	-2.45%	-0.20%	1.2%	0.4%	0.4%	0.4%	0.4%	0.4%	0.5%	0.5%	0.5%	0.5%
Trucks	3.41%	2.49%	3.13%	3.09%	0.7%	1.3%	1.3%	1.3%	1.3%	1.3%	1.3%	1.3%	1.3%	1.3%
<b>Total</b>	<b>3.79%</b>	<b>1.49%</b>	<b>-0.09%</b>	<b>1.24%</b>	<b>1.0%</b>	<b>0.8%</b>	<b>0.8%</b>	<b>0.8%</b>	<b>0.8%</b>	<b>0.8%</b>	<b>0.8%</b>	<b>0.8%</b>	<b>0.8%</b>	<b>0.8%</b>
<b>I-78</b>														
Cars	11.49%	4.00%	-6.48%	-4.63%	9.2%	1.1%	1.0%	1.0%	1.0%	1.0%	1.0%	1.0%	1.0%	1.0%
Trucks	4.19%	3.49%	5.93%	2.43%	0.4%	1.0%	0.8%	0.8%	0.8%	0.8%	0.8%	0.8%	0.8%	0.8%
<b>Total</b>	<b>5.45%</b>	<b>3.59%</b>	<b>3.66%</b>	<b>1.26%</b>	<b>1.8%</b>	<b>1.0%</b>	<b>0.8%</b>	<b>0.8%</b>	<b>0.8%</b>	<b>0.8%</b>	<b>0.8%</b>	<b>0.8%</b>	<b>0.8%</b>	<b>0.8%</b>
<b>Easton-Phillipsburg</b>														
Cars	-5.91%	-3.64%	2.70%	8.10%	-3.8%	0.2%	0.2%	0.2%	0.2%	0.2%	0.2%	0.2%	0.2%	0.2%
Trucks	0.39%	-14.89%	8.79%	5.63%	-1.5%	0.2%	0.2%	0.2%	0.2%	0.2%	0.2%	0.2%	0.2%	0.2%
<b>Total</b>	<b>-3.03%</b>	<b>-8.96%</b>	<b>5.39%</b>	<b>6.97%</b>	<b>-2.8%</b>	<b>0.2%</b>	<b>0.2%</b>	<b>0.2%</b>	<b>0.2%</b>	<b>0.2%</b>	<b>0.2%</b>	<b>0.2%</b>	<b>0.2%</b>	<b>0.2%</b>
<b>Portland-Columbia</b>														
Cars	-12.39%	-0.91%	0.40%	9.26%	-4.4%	0.6%	0.6%	0.6%	0.6%	0.6%	0.6%	0.6%	0.6%	0.6%
Trucks	-11.98%	6.93%	34.17%	-1.30%	-5.4%	0.3%	0.3%	0.3%	0.3%	0.3%	0.3%	0.3%	0.3%	0.3%
<b>Total</b>	<b>-12.21%</b>	<b>2.62%</b>	<b>16.26%</b>	<b>3.54%</b>	<b>-4.9%</b>	<b>0.5%</b>	<b>0.5%</b>	<b>0.5%</b>	<b>0.5%</b>	<b>0.5%</b>	<b>0.5%</b>	<b>0.5%</b>	<b>0.5%</b>	<b>0.5%</b>
<b>Delaware Water Gap</b>														
Cars	2.98%	0.23%	-2.18%	-0.65%	5.3%	1.2%	0.9%	0.9%	0.9%	0.9%	0.9%	0.9%	0.9%	0.9%
Trucks	2.47%	-0.25%	5.57%	2.75%	0.5%	0.8%	0.7%	0.7%	0.7%	0.7%	0.7%	0.7%	0.7%	0.7%
<b>Total</b>	<b>2.61%</b>	<b>-0.12%</b>	<b>3.45%</b>	<b>1.87%</b>	<b>1.7%</b>	<b>0.9%</b>	<b>0.8%</b>	<b>0.8%</b>	<b>0.8%</b>	<b>0.8%</b>	<b>0.8%</b>	<b>0.8%</b>	<b>0.8%</b>	<b>0.8%</b>
<b>Milford Montague</b>														
Cars	1.82%	2.83%	3.04%	1.57%	2.0%	0.4%	0.2%	0.2%	0.2%	0.2%	0.2%	0.2%	0.2%	0.2%
Trucks	5.45%	-0.03%	12.70%	2.02%	-3.21%	0.0%	0.3%	0.3%	0.3%	0.3%	0.3%	0.3%	0.3%	0.3%
<b>Total</b>	<b>2.62%</b>	<b>2.18%</b>	<b>5.19%</b>	<b>1.68%</b>	<b>0.74%</b>	<b>0.3%</b>	<b>0.2%</b>	<b>0.2%</b>	<b>0.2%</b>	<b>0.2%</b>	<b>0.2%</b>	<b>0.3%</b>	<b>0.3%</b>	<b>0.3%</b>
<b>All Toll Bridges</b>														
Cars	3.31%	1.10%	-1.51%	1.08%	3.50%	0.9%	0.7%	0.7%	0.7%	0.7%	0.7%	0.7%	0.7%	0.7%
Trucks	3.49%	1.57%	6.09%	2.40%	0.18%	0.9%	0.8%	0.8%	0.8%	0.8%	0.8%	0.8%	0.8%	0.8%
<b>Total</b>	<b>3.44%</b>	<b>1.43%</b>	<b>3.81%</b>	<b>2.02%</b>	<b>1.11%</b>	<b>0.9%</b>	<b>0.8%</b>	<b>0.8%</b>	<b>0.8%</b>	<b>0.8%</b>	<b>0.8%</b>	<b>0.8%</b>	<b>0.8%</b>	<b>0.8%</b>

\*Actual (Annual Traffic Engineering Reports and Monthly Comparatives)

Note: 2016 data shown is unaudited.

## 6.2 Scudder Falls Bridge

This section provides a narrative of the methodology used for developing the traffic and revenue forecasts for the Scudder Falls Bridge, which has no direct tolling history. Although the approaches are described independently in this report, the analyses overall consider the entire system and are reflected in the results.

### 6.2.1 Toll Rate-Setting Goals and Assumptions

Jacobs conducted its most recent tolling policy forum for traffic and revenue forecasts with the Commission on March 22, 2016 in order to revisit policy decisions/assumptions used in 2014 traffic and revenue forecasting for the new Scudder Falls Bridge. The primary tolling decisions made by the Commission at this forum were as follows:

- There is no goal of achieving relative parity between the Scudder Falls Bridge tolls and those at the Trenton-Morrisville Bridge or any other Delaware River Crossings
- The goal is for revenues to cover only debt service for the debt incurred to finance the new Scudder Falls Bridge, not the facility's O&M costs
- Any potential extra toll revenue collected due to diversions from the Scudder Falls Bridge to Trenton-Morrisville will count towards the Scudder Falls Bridge revenue goal
- No toll increase will be assumed in the forecast period
- The premium for image-based vs. E-ZPass tolls will be based only on the increased cost to process these tolls, not on uncollectable revenues
- E-ZPass discounts will remain the same as today (off-peak discount for trucks; 40% automatic discount for commuters if 16 or more trips made in a calendar month)
- No discounts will be offered for Toll-by-Plate customers
- For Toll-by-Plate customers who do not pay their first invoice, a \$5 fee per invoice will be charged on the second invoice and a \$30 violation fee per transaction will be charged on the third invoice

Jacobs incorporated these policy decisions into our modeling process. We worked with the Commission to test various rates to meet their needs and goals, and developed a toll rate schedule (see Table 6-6), which was approved in September 2016. Tolls are assumed to begin June 1, 2019.

### **6.2.2 Methodology Used for Forecasting**

Because the Scudder Falls Bridge is not currently tolled, it is not suited to a traditional trend line analysis for forecasting purposes. In addition, it will be an AET facility with no cash toll collection. Because of these factors, a much more comprehensive analysis of the facility was required to achieve the depth and quality of report required for an investment-grade study.

In order to determine future background growth (i.e., growth in traffic without tolling or any other changes), Jacobs used historical DRJTBC data, correlating it to GDP and IPI, then

used forecasts of future GDP and IPI to estimate traffic growth rates. We used results from the regional Delaware Valley Regional Planning Commission (DVRPC) model as run by DVRPC staff in order to estimate potential traffic changes due to the replacement of the Scudder Falls Bridge with a wider bridge, and also due to the new I-95/Pennsylvania Turnpike interchange.

Estimates of diversions from toll rate changes (i.e., toll elasticities) were based on differences in Pennsylvania-bound vs. New Jersey-bound traffic in the area, travel times using the Scudder Falls Bridge versus alternative crossings, and origin-destination patterns from the online survey results. The survey data were also used to develop a customer profile, such as state of vehicle registration and frequency of travel, which enabled us to estimate the number of Toll-by-Plate accounts and the number of invoices to be mailed to customers.

Data from existing AET facilities on uncollectable revenues were incorporated into our models. In addition, Jacobs and the Commission worked with Xerox (now Conduent Incorporated) to estimate the costs associated with Toll-by-Plate collection. As part of the Tolling Policy, DRJTBC needed to set a higher rate for Toll-by-Plate tolls to cover the additional cost of collecting these tolls. Part of Jacobs' modeling process was to estimate the higher amount to charge for Toll-by-Plate tolls. In addition, as is typical on AET facilities throughout the country, late fees will be imposed. The Commission will charge a \$5.00 late payment fee *per invoice* on the second bill if tolls are not paid on the first invoice, and a \$30 violation fee *per transaction* on the third Toll-by-Plate invoice if toll transactions are not paid on the first two invoices. The late payment and violation fee revenues were also estimated by Jacobs for each year of the estimate.

Our model is segmented by vehicle classification (truck vs. passenger car), travel frequency, and payment type. It is important to note that there may be some trips currently utilizing the Scudder Falls Bridge simply because it is free. Once tolling is introduced, it is probable that some trips that are currently using the Scudder Falls Bridge simply because it is free will move to other tolled facilities such as the Trenton-Morrisville Toll Bridge. Jacobs has also developed estimates of additional revenue at the Trenton-Morrisville Toll Bridge due to Scudder Falls Bridge tolling.

The work, analyses, and results for the DRJTBC included in this report are of investment-grade quality and are suitable for financing. The background and methodology for Jacobs' traffic and toll revenue projections for the DRJTBC are presented herein.

### 6.2.3 DVRPC Forecast Model

The Delaware Valley Regional Planning Commission (DVRPC) travel forecasting model was used to estimate the future traffic changes that may occur due to the new, wider Scudder Falls Bridge (the “Scudder Falls Bridge Improvement Project”) and due to the Pennsylvania Turnpike/I-95 Interchange Project. DVRPC calibrated their latest model – Travel Improvement Model version 2.0 (TIM 2.0) – to match base year 2013 volumes on the Scudder Falls Bridge and other area bridges as closely as possible, and then ran their future year models to determine impacts of the completion of these two projects on southbound Scudder Falls Bridge traffic volumes.

“Stage 1” of the Pennsylvania Turnpike/I-95 Interchange Project, which includes the completion of northbound-to-eastbound and westbound-to-southbound ramps only, is expected to be completed by the time the first span of the Scudder Falls Bridge is completed (and before tolling begins) in May 2019. The effects of the two improvements on Scudder Falls Bridge southbound traffic, separate and combined, as predicted by the DVRPC Model, are as follows:

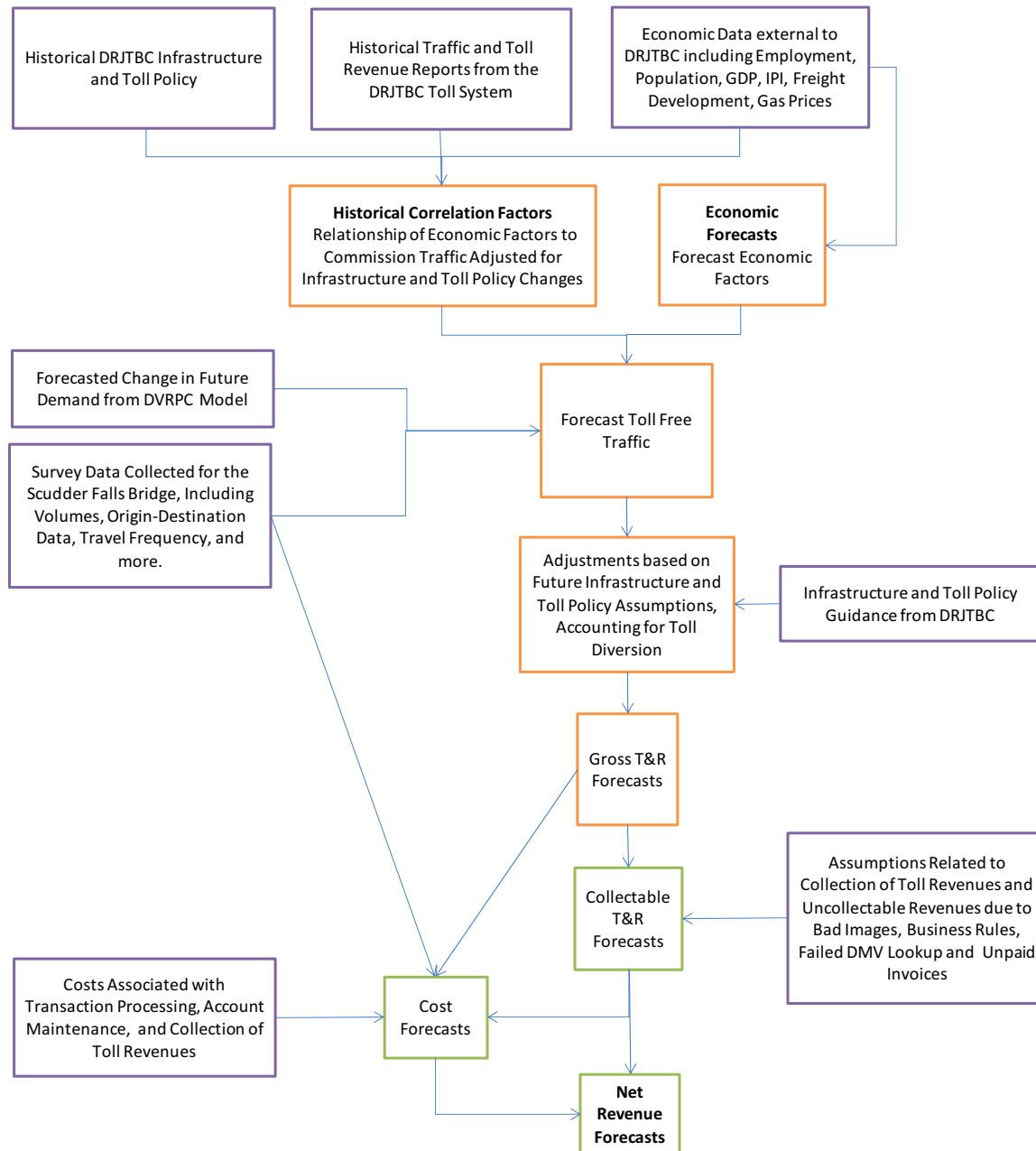
- Scudder Falls Bridge widening only: +8.3%
- I-95/Pennsylvania Turnpike interchange only: -3.8%
- Widening plus new I-95 Interchange: +3.6%

The impact of the two improvements together is an estimated 3.6 percent increase in southbound traffic on the Scudder Falls Bridge compared to a no build condition. This was applied to Jacobs’ traffic and revenue forecasting model.

### 6.2.4 Scudder Falls Traffic and Toll Revenue Model

Jacobs developed a spreadsheet-based forecast model specifically for the Scudder Falls Bridge facility. The model was designed to estimate toll transactions and revenues, as well as costs associated with the collection of tolls. Figure 6-8 presents a diagram of the major inputs and steps in the modeling process.

**Figure 6-8: Toll Traffic and Revenue Model Methodology**



The forecasting model is built off of a base of historical and recent traffic volume data. Growth rates were developed based on correlation of traffic to socioeconomic factors, historical data at other DRJTBC facilities and professional judgment and were applied to the existing volumes, creating a forecast of toll-free traffic through 2026. The model considers how toll-free traffic volumes would be distributed amongst available payment options if a toll were implemented, and then estimates changes in traffic volumes due to the toll rates applied. Toll rates are applied to these resulting toll volumes to generate forecasts of toll revenue.

The second portion of the model then takes the estimated number of toll transactions and models them through the collection process, estimating losses due to bad or missing license plate images, business rules, bad addresses or no matching DMV records, and failure to respond to invoicing. The results of this collection process analysis are used to determine the portion of “collectable” toll revenue, as well as the number of Toll-by-Plate accounts to be maintained and invoices to be mailed. The various costs associated with toll collection are then calculated and compared to the “collectable” toll revenue. The model cycles back to incorporate specified tolls and fees in the estimate of collectable revenues, allowing for the calculation of net revenues.

## **6.2.5 Inputs and Assumptions**

In the creation of a base structure for forecasting calculations, it is necessary to assume some information such as future infrastructure and consistency in historical trends on similar or nearby facilities. The following sections provide further detail on the assumptions used in the development of estimates for the Scudder Falls Bridge.

### **6.2.5.1 Potential Future Transportation Projects**

It was assumed that widening of the Scudder Falls Bridge and the construction of the new mainline flyovers of the Pennsylvania Turnpike / I-95 Interchange and associated I-95 and PA Turnpike mainline widening and reconstruction would be completed by the time Scudder Falls Bridge tolling begins on June 1, 2019. As discussed previously in Section 6.2.3, we used results from the regional DVRPC model as run by DVRPC staff specifically for this work assignment to estimate traffic changes due to these two projects.

#### **6.2.5.1.1 Scudder Falls Bridge Improvement Project**

The Scudder Falls Bridge, currently two lanes per direction, will be replaced with a new bridge that is three lanes per direction, plus auxiliary lanes that will improve access on both sides of the bridge. The portions of I-95 from the Scudder Falls Bridge to NJ Route 29 and

from the Scudder Falls Bridge to PA Route 332 will also be widened to three lanes per direction. Other project improvements include the reconfiguration of the Taylorsville Road Interchange and the reconstruction and reconfiguration of the Route 29 interchange through the use of roundabouts. A pedestrian/bicycle path will be built as part of the construction of the Scudder Falls Bridge.

#### **6.2.5.1.2 Pennsylvania Turnpike / I-95 Interchange Project, Bucks County, PA**

As noted in Section 6.1.1.3.1 (Transportation Projects, Potential Future or Completed), this Interstate completion project will connect I-95 and I-276 in Pennsylvania, facilitate a revised routing of I-95 in Pennsylvania and New Jersey, and make I-95 continuous along the east Coast from Florida to Maine. For details, see Section 6.1.1.3.1.

#### **6.2.5.2 Historical Traffic Correlation to Economic Factors**

In order to estimate future traffic growth, the growth in historical DRJTBC toll facility traffic was correlated to the growth in relevant socioeconomic factors. In the calculation of these correlations for each of the DRJTBC toll facilities, years that experienced unusual events, such as toll increases, were left out of the calculation in an effort to “normalize” the correlation.

Truck growth and IPI growth tend to follow the same trends – a given year with strong positive truck growth on average, also saw strong IPI growth, while years with strong negative growth, such as during the recent recession, also saw a large decrease in IPI.

Correlations were also calculated between car growth and GDP, and population growth was considered as well. The correlation factors were applied to consensus forecasts for GDP and IPI to estimate future background traffic growth on the Scudder Falls Bridge.

#### **6.2.5.3 Drivers’ Potential Reaction to Tolls**

When drivers are charged a new (or higher) toll for travel than they have previously been accustomed to paying for the roadway, they face the decision of whether or not to alter their travel behavior in reaction to the change in cost. They do this by changing their travel route, combining trips, abstaining from unnecessary trips, or by making no change to their behavior. In an effort to assess the willingness of drivers to continue travel on the toll facility, we must consider the driver’s “Willingness to Pay”. Willingness to pay (WTP) is defined as the “maximum amount an individual is willing to sacrifice to procure a good or avoid something undesirable.”



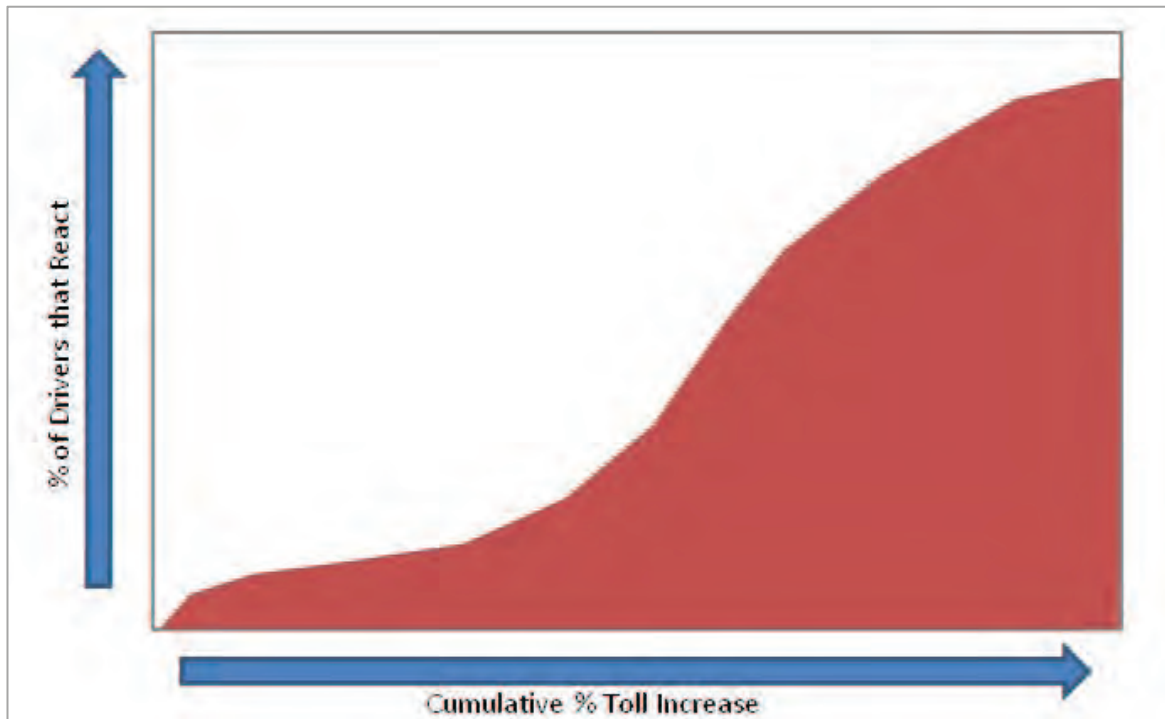
In terms of tolling, the driver's WTP is based on their consideration of cost, time, convenience, and reliability of travel on the toll route versus alternative route options. When they decide that the toll route is their best option, they are willing to pay the toll.

On a route where tolls already exist, such as the Trenton-Morrisville Toll Bridge (a competitor of the Scudder Falls Bridge), toll changes also elicit a reaction from drivers. Since a toll already exists and there is some history of how many drivers have chosen to pay the toll at certain toll rates, some relationship can often be determined between the change in traffic due to the change in toll rate. This relationship is referred to as "Toll Elasticity".

The amount of traffic that chooses to avoid a toll facility due to the inception of tolling or due to a toll increase is referred to as "Toll Diversion". Jacobs developed a methodology to estimate toll diversion due to initial tolling, and for any increases to this toll we used toll elasticity factors developed from data from other toll facilities.

Figure 6-9 presents a general representation of the relationship between toll increases and driver reaction. In general, the larger the toll increase, the larger the percentage of drivers that will react.

**Figure 6-9: Representative Driver Reaction to Toll Increase**



#### **6.2.5.3.1 Diversion Due to the Inception of Tolling**

Jacobs employed a methodology for estimating toll diversion similar to what was used in our previous Traffic and Revenue Studies and Toll Diversion Study completed for the Commission over the past seven years. Those diversions were estimated by grouping the origin-destination (O-D) data and estimating the likelihood of diverting versus remaining on the Scudder Falls Bridge based on travel time savings, traveler value of time, willingness to pay, and characteristics of customers.

One reason a driver would chose a toll route over a free route is time savings; in effect, time equals money. There is no one standard to determine how much a minute or ten minutes of driving is worth monetarily; however in the toll forecasting industry a good rule of thumb is that the value of time (VOT) is 33 percent to 60 percent of the median household income divided by 2080 (the approximate number of hours worked per year). A road with more commuters – who value their time higher than someone making a discretionary trip – should use a higher percent of the household income. Fifty percent was used for this study.

For this area we determined that \$1.00 is slightly more than three minutes travel time savings. What this tells us is that the average regular customer in this area will choose to use the Scudder Falls Bridge for a \$1.00 toll if it saved them a little over three minutes or more.

Travel time savings is not the only consideration; we also have to consider other characteristics such as trip purpose, frequency and length and well as method of payment. Long-distance travelers are typically infrequent customers who, since they will only be taking the toll bridge occasionally, are less likely to seek an alternate route. They are also less likely to be commuters. Commuters value their time higher than other travelers because they are on a schedule, and commuters also have a better understanding of the time savings available to them during their peak-period travel when choosing one local route versus another. Even though there may be time savings using an alternate route, long-distance and infrequent travelers are likely to stay with the route they know best.

Initial Scudder Falls Bridge diversion was estimated based on survey data and assumed the same toll rates as are currently charged on the other Commission bridges. O-D data for the Scudder Falls Bridge was divided into three “superzones”, which were used to approximate the number of local, mid-distance, and long-distance customers currently using the Scudder Falls Bridge. When the Scudder Falls trip diversion estimated for each superzone is multiplied by the share of trips in each, the combined total result is 17 percent diversion with a toll of \$1.00 for all cars on the AET facility. Trucks were estimated to have about double the amount of diversion – 34 percent – with a \$4.00 per axle toll. Greater diversion for trucks is expected due to the higher toll and the presence of many other less expensive

alternatives on their typically longer-distance trips. Since the chosen toll rate schedule for the Scudder Falls Bridge has rates different from these, toll elasticity factors were used to refine the traffic diversion estimates as described in this next section.

#### **6.2.5.3.2 Toll Elasticity**

Toll elasticity due to toll increases on facilities that already charge a toll is usually estimated based on historical data for the facility itself and other similar facilities. While no toll increases have been assumed at the Scudder Falls Bridge after tolling commences, expected on June 1, 2019, toll elasticity factors were applied to account for additional traffic diversion due to the difference between the base toll rates (as discussed in the previous section) and the approved toll rates. For the modeling of the future Scudder Falls Bridge toll schedule, toll elasticities were assumed based on experience at other toll facilities. An elasticity of -0.10 was used for passenger cars, while -0.20 was assumed for the estimation of truck diversion. These elasticities are similar to those on other similar toll facilities throughout the Northeast.

#### **6.2.5.4 E-ZPass Market Shares**

Historically, electronic toll collection (E-ZPass) market share on DRJTBC and other facilities offering electronic payment has slowly increased over time until it approached some level of market saturation, regardless of toll increases. The market share typically increases at a decreasing rate – rapidly in the first few years after implementation, and then at a decreasing rate until eventually leveling out as the market share approaches a maximum sustainable level for the toll facility.

E-ZPass market share on the current DRJTBC toll facilities varies dramatically by vehicle class with 2015 totals showing an average of 63.0 percent for car trips and 84.2 percent for truck trips. This calculates to an overall average E-ZPass market share of 68.0 percent. The market share has continued to grow. With the implementation of AET on the Scudder Falls Bridge expected on June 1, 2019, using recent measurements of E-ZPass market penetration and estimates of trips that will become E-ZPass when AET begins (from experience at other AET facilities), we have estimated that car market share will begin around 75 percent E-ZPass, with around 79 percent E-ZPass for heavy trucks. It is projected that the market share will increase quickly within a couple years of the inception of tolling as drivers realize that they could save money by using E-ZPass, and then growth will slow, reaching a maximum market penetration of roughly 85 percent E-ZPass for both cars and trucks in 2026.

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#### **6.2.5.5 Toll Rates and Late/Violation Fees**

Jacobs tested a number of toll scenarios for the Commission in order to meet its financial goals. The final, approved toll rate schedule is as follows in Table 6-6:

**Table 6-6: Scudder Falls Bridge Toll Rate Schedule- Approved September 2016**

VEHICLE TYPE	
<b>Passenger Vehicles</b>	
Vehicles with up to two axles and less than 8-feet in height.	
<b>CLASS 1</b>	
2-axle Class 1 vehicle with <i>E-ZPass</i>	\$1.25
<i>E-ZPass</i> Class 1 Commuter Discount Toll	\$0.75
Discount available for customers with passenger-vehicle transponders issued by the New Jersey <i>E-ZPass</i> Group.	40% Discount credited to eligible <i>E-ZPass</i> equipped vehicles that record 16 or more trips during a calendar month.
2-axle Class 1 vehicle Toll-by-Plate	\$2.60
<b>Light Trucks</b>	
Vehicles with two axles and eight feet and above in height.	
<b>CLASS 2</b>	
2-axle Class 2 vehicle with <i>E-ZPass</i>	\$7.00
2-axle Class 2 vehicle with <i>E-ZPass</i> Off-Peak Discount	\$6.30
2-axle Class 2 vehicle Toll-by-Plate	\$8.35
<b>Heavy Trucks</b>	
Vehicle-types with three or more total axles.	
<b>CLASS 3</b>	
3-axle vehicle with <i>E-ZPass</i>	\$12.75
3-axle vehicle with <i>E-ZPass</i> Off-Peak Discount	\$11.48
3-axle vehicle Toll-by-Plate	\$14.25
<b>CLASS 4</b>	
4-axle vehicle with <i>E-ZPass</i>	\$17.00
4-axle vehicle with <i>E-ZPass</i> Off-Peak Discount	\$15.30
4-axle vehicle Toll-by-Plate	\$19.00
<b>CLASS 5</b>	
5-axle vehicle with <i>E-ZPass</i>	\$21.25
5-axle vehicle with <i>E-ZPass</i> Off-Peak Discount	\$19.13
5-axle vehicle Toll-by-Plate	\$23.75
<b>CLASS 6</b>	
6-axle vehicle with <i>E-ZPass</i>	\$25.50
6-axle vehicle with <i>E-ZPass</i> Off-Peak Discount	\$22.95
6-axle vehicle Toll-by-Plate	\$28.50
<b>CLASS 7</b>	
7-axle vehicle with <i>E-ZPass</i>	\$29.75
7-axle vehicle with <i>E-ZPass</i> Off-Peak Discount	\$26.78
7-axle vehicle Toll-by-Plate	\$33.25
Off-Peak Hours: 9:01 PM to 5:59 AM	
<i>E-ZPass</i> per-axle truck rate is \$4.25; Toll-by-Plate per-axle rate is \$4.75	
Class 1 Passenger vehicles with a trailer will be charged an additional \$1.00.	
Class 2 through Class 7 vehicles with a trailer and/or towed vehicle will be charged for the total combined axles at the current per axle rate.	
Vehicles with a fifth wheel/gooseneck trailer will be charged for the total combined axles at the current per axle rate.	

The standard E-ZPass rates at the Scudder Falls Bridge will be \$1.25 for cars, \$7.00 for 2-axle trucks and \$4.25 per axle for three or more axle vehicles. These are relatively proportional to the \$1.00/\$6.50/\$4.00 rates, respectively, charged at the Commission's current toll facilities.

Similar to the Commission's other tolled facilities, E-ZPass passenger car commuters at the Scudder Falls Bridge will receive a 40 percent discount for 16 or more trips during a calendar month, thereby paying \$0.75 per trip. This frequency discount is offered as an automatic rebate for cumulative travel on any of the DRJTBC toll facilities (not bridge-specific) for all transponders that are attached to NJ E-ZPass Regional Consortium accounts.

Commercial vehicles at the Scudder Falls Bridge with E-ZPass traveling between 9:01AM and 5:59AM will receive a 10 percent off-peak discount, as they do at the other DRJTBC toll facilities. This discount applies to commercial vehicles with E-ZPass transponders issued by any toll agency that has E-ZPass.

Vehicles without E-ZPass, or Toll-by-Plate vehicles, will be charged a higher toll to help recover the additional costs associated with processing Toll-by-Plate transactions (over the cost to process E-ZPass transactions). This additional cost is discussed in Section 7.2.

In addition, Toll-by-Plate customers will be subject to violation fees if tolls are not paid on time. The billing method and associated late fees are as described below:

- 1st invoice sent 30 days after the 1st transaction, tolls only (at the Toll-by-Plate rate); 30 days to pay; will include all transactions made during that period.
- If 1<sup>st</sup> invoice is unpaid, 2nd invoice sent 30 days after the 1st invoice; a \$5 fee will be added to cover mailing and processing costs.
- If 2nd invoice is unpaid, Violation Notice sent 30 days after the 2nd invoice; customer now a violator and charged \$30 per transaction on top of tolls. Violation notice will indicate that account will be sent automatically to a collections agency if not paid in 30 days (no additional notice to customer will be sent).
- If Violation Notice not paid in 30 days, no further notice is sent by DRJTBC; it is then handled by a collections agency.

## 6.2.6 Average Daily Tolled Traffic Forecasts

Tolling in the Pennsylvania-bound direction on the Scudder Falls Bridge is expected to commence on June 1, 2019. As traffic reacts to the implementation of tolling on the Scudder Falls Bridge, some drivers who currently choose the Scudder Falls Bridge as a toll-free alternative to the Trenton-Morrisville Toll Bridge would instead choose to pay the toll on the Trenton-Morrisville Toll Bridge rather than on the Scudder Falls Bridge. Directional differences in traffic volumes on the Scudder Falls Bridge indicate that some drivers are currently using the Scudder Falls Bridge as toll-free alternative to the Trenton-Morrisville Toll Bridge in the Pennsylvania-bound direction; count data shows that Pennsylvania-bound volumes on the Scudder Falls Bridge are roughly 10 percent higher than New Jersey-bound volumes.

Moderate traffic growth has been assumed through 2026. Annual average daily traffic (southbound, in the toll direction only) at the Scudder Falls Bridge, along with the traffic volumes expected to shift from the Scudder Falls to Trenton-Morrisville Bridge, are shown in Table 6-7. More detail on these forecasts is included in the Appendix.

**Table 6-7: Average Annual Daily Tolled Traffic Forecasts**

Year	Scudder Falls Bridge AADT	Growth	New Trenton- Morrisville Bridge AADT*
2019	27,624		1,805
2020	27,968	1.2%	1,761
2021	28,225	0.9%	1,751
2022	28,464	0.8%	1,743
2023	28,689	0.8%	1,740
2024	28,905	0.8%	1,736
2025	29,114	0.7%	1,744
2026	29,317	0.7%	1,750

*Note: Assumes tolling begins on June 1, 2019.*

*\*Traffic shift due to Scudder Falls Bridge tolling*

## 6.2.7 Gross Toll Revenue Forecasts

Forecasted revenues for the Scudder Falls Bridge after tolling commences are shown in Table 6-8. At the Scudder Falls Bridge, revenues collected from E-ZPass tolls and Toll-by-Plate tolls are shown separately, along with the revenues collected from late and violation fees. In addition, the table includes the new toll revenue generated at the Trenton-Morrisville Bridge due to a shift in traffic from the Scudder Falls Bridge when it is tolled. More detail on these forecasts is included in the Appendix.

**Table 6-8: Annual Gross Toll and Fee Revenue Forecasts, \$millions**

Year	SFB E-ZPass Tolls	SFB Toll- by-Plate Tolls	Total Collected SFB Toll Revenue	SFB TBP Violations & Late Fees	<b>TOTAL SFB</b>	Trenton- Morrisville Add'l Toll Rev*	<b>TOTAL</b>
2019	\$8.8	\$1.3	\$10.1	\$0.9	<b>\$10.9</b>	\$0.9	<b>\$11.9</b>
2020	\$15.8	\$3.4	\$19.1	\$2.2	<b>\$21.3</b>	\$1.6	<b>\$22.9</b>
2021	\$16.2	\$3.1	\$19.3	\$2.0	<b>\$21.3</b>	\$1.6	<b>\$22.9</b>
2022	\$16.6	\$2.9	\$19.5	\$1.8	<b>\$21.3</b>	\$1.6	<b>\$23.0</b>
2023	\$16.9	\$2.7	\$19.7	\$1.7	<b>\$21.4</b>	\$1.6	<b>\$23.1</b>
2024	\$17.2	\$2.6	\$19.9	\$1.7	<b>\$21.5</b>	\$1.7	<b>\$23.2</b>
2025	\$17.5	\$2.6	\$20.1	\$1.6	<b>\$21.7</b>	\$1.7	<b>\$23.3</b>
2026	\$17.7	\$2.5	\$20.3	\$1.6	<b>\$21.8</b>	\$1.7	<b>\$23.5</b>

*Note: Assumes tolling begins on June 1, 2019.*

*\*Due to traffic shifting to the Trenton-Morrisville Bridge from the Scudder Falls Bridge when it is tolled*

It is important to note that a level of uncollectability has been factored into these forecasts. Collectability of Toll-by-Plate tolls is discussed in the following section.



## **7.0 AET TOLL OPERATION COSTS AND UNCOLLECTABLE TOLLS AT SCUDDER FALLS BRIDGE**

This section describes the collectability of tolls with AET at the Scudder Falls Bridge, and details the expected costs of toll collection at the Scudder Falls Bridge.

### **7.1 Collectible Toll-by-Plate Tolls**

Jacobs developed a “transaction waterfall” approach to estimating costs and collectable Toll-by-Plate revenues. A waterfall showing base assumptions for cars and sample transaction volumes is shown in Figure 7-1. With the implementation of AET, there are numerous independent variables that will each cause changes to the ultimate amount of revenue collected and the operating costs incurred. A set of base assumptions was developed that, in our opinion, is a reasonable estimation of what might be expected for AET in this region. The estimates were established based on experience at other currently operating AET facilities around the country.

Figure 7-1: Car Sample Toll Transaction Waterfall

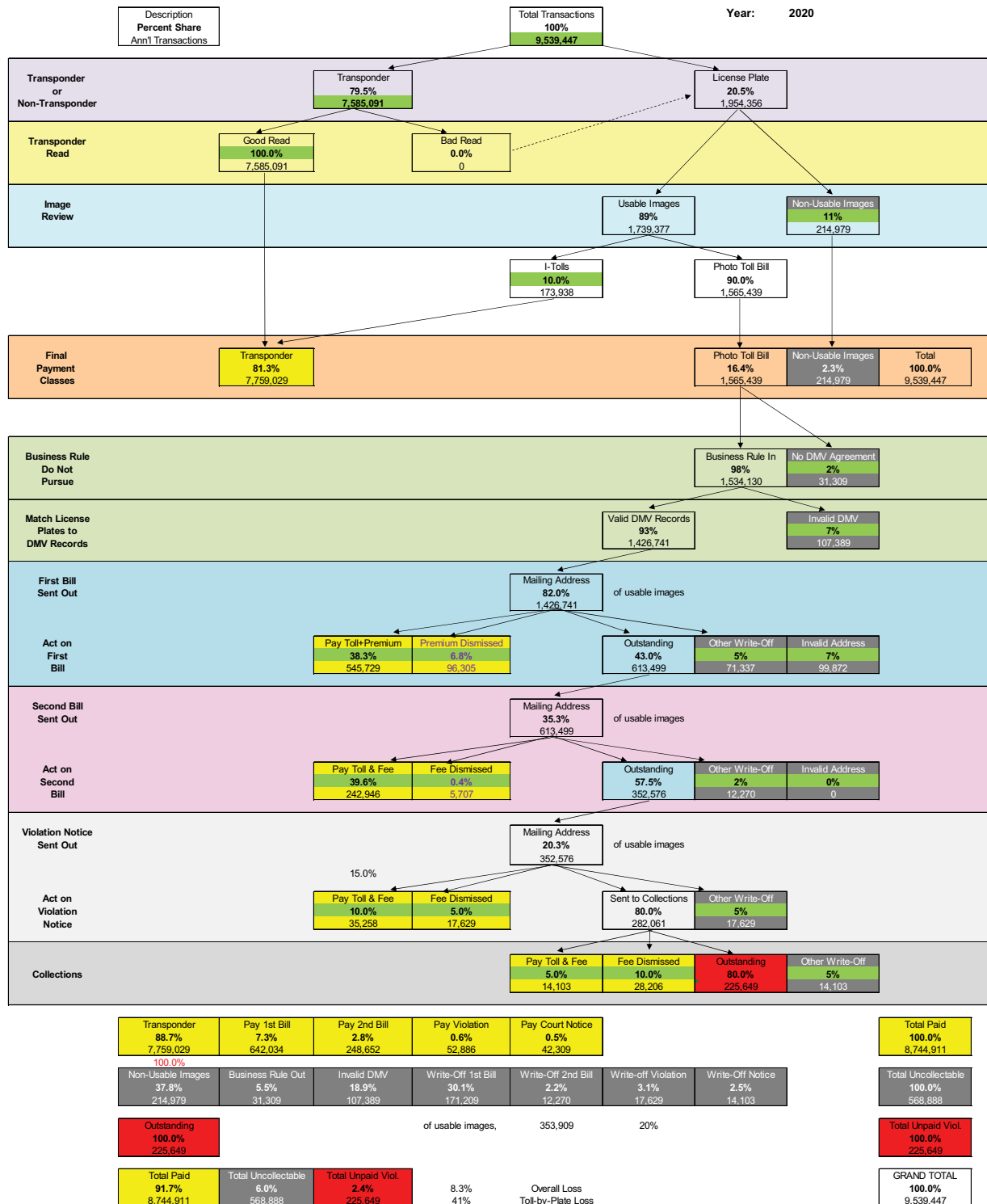


Table 7-1 summarizes the variables applied to the transaction waterfall for passenger cars. Included in this table are the actual performance characteristics of four other operating AET facilities. Each tolling agency requested anonymity with respect to its data. Table 7-2 presents additional variables for which we do not have comparable results from other agencies.

Each of these variables shown in the tables is described in detail in the following sections.

**Table 7-1: Summary of Factors Influencing Toll-by-Plate Revenue Collectability**

Category	Estimate for Cars	Estimate for Trucks	Agency A	Agency B	Agency C	Agency D
Non-Usable Images	11%	15%	4%	6%	10%	5%
Business Rule Out	2%	2%	1%	2%	Unavailable	1%
Invalid DMV Record	7%	2%	4%	2%	16%	1%
Invalid Addresses, 1st Bill Sent	7%	15%	9%	Unavailable	Included in Invalid DMV	4%
Invalid Addresses, 2nd Bill Sent	0%	0%	3%	Unavailable	Included in Invalid DMV	9%
Invalid Addresses, Violation Notices Sent	0%	0%	1%	Unavailable	Included in Invalid DMV	15%
% Paying 1st Bill (of those received)	45%	35%	44%	35%	28%	56%
% Paying 2nd Bill (of those received)	40%	60%	20%	Included in First Bill Pail	40%	45%
% Paying Violation Notice (of those received)	15%	15%	5%	26%	23%	27%
% Paying Collections Agency Notice	15%	15%	N/A	N/A	N/A	N/A

**Table 7-2: Summary of Additional Factors Influencing Toll-by-Plate Revenue Collectability**

Category	Estimate for Cars	Estimate for Trucks
1 <sup>st</sup> Bill Toll-by-Plate Premium Dismissed (of those paid)	15%	15%
1st Bills Dismissed (of those sent)	5%	5%
2nd Bill Late Fee Dismissed (of those paid)	1%	1%
2nd Bills Dismissed (of those sent)	2%	2%
Violation Notice Fee Dismissed (of those sent)	5%	5%
Violation Notices Dismissed (of those sent)	5%	5%
Court Notice Fee Dismissed (of those sent)	10%	10%
Court Notices Dismissed (of those sent)	5%	5%

### 7.1.1 Non-Usable Images

Not all license plates would be readable due to various reasons such as weather, dirt on the plate or other obstructions, a missing plate, or a temporary plate in the window of the vehicle. Current AET facilities, primarily located in the southern and western U.S., have four to 10 percent non-usable images, while attrition files provided by DRJTBC for 2012 and 2013 showed a range of 12 to 17 percent of images that were rejected system wide. It was assumed that with the installation of new equipment at the Scudder Falls Bridge, image statistics would be closer to current AET facilities than the Violation Processing Equipment currently in use on other DRJTBC toll facilities. For passenger cars, Jacobs estimated 11 percent non-usable images for the base case. This estimate was higher than the current AET facilities because the data from other facilities were from geographic locations that were not as impacted by winter weather.

Jacobs estimated that there would be a higher share of non-usable images for commercial vehicles; this was estimated based on a March 2013 survey conducted by staff at toll plazas on the New York State Thruway to see how many cash-paying commercial vehicles were missing a front license plate or had other issues with their plate. The survey revealed that 5 percent of commercial vehicles had no front license plate at all, while about 7 percent had a plate that was difficult to read because it was broken, dirty, bent, or covered with a dark plastic shield. This led to Jacobs' base assumption that 15 percent of commercial vehicle license plate images would not be usable for customers identified by license plate.

### 7.1.2 Business Rule Out

We expect that, like current AET facilities, the Commission would develop business rules that will determine which Toll-by-Plate customers they will and will not pursue. For example, they may choose that it is not feasible to pursue a customer with a Canadian

license plate. Current AET facilities do not pursue one to two percent of customers with readable license plates. We have assumed that the Commission would rule out two percent each for both passenger cars and commercial vehicles.

### **7.1.3 Invalid DMV record**

Jacobs estimated that seven percent of passenger cars and two percent of commercial Toll-by-Plate vehicles would not have a valid DMV record, and would therefore not be sent a toll invoice at all. Owner-operator vehicles comprise a large portion of the cash paying commercial vehicles. These types of commercial vehicles are subject to regular inspections and are owned by businesses, or individuals. Because of the regulatory environment and continual inspections, we are of the opinion they are likely to keep their addresses up-to-date and to remain compliant with motor vehicle laws. Other AET facilities have a range of one to four percent of total vehicles with invalid DMV records.

### **7.1.4 Invalid Addresses – Passenger Cars**

Many people who move do not change their address attached to their DMV vehicle registration and do not have mail forwarded; therefore, they would not receive a Toll-by-Plate invoice. On current AET facilities where information is available, four to nine percent of Toll-by-Plate vehicles who have a valid DMV record would not receive their first invoice. Jacobs estimated this share to be seven percent for passenger cars at the Scudder Falls Bridge.

When the first invoice is returned to the Commission because of a bad address, another invoice would not be sent. Because of this, it was assumed that the share of invalid addresses on the second bill and violation notice would be zero.

### **7.1.5 Invalid Addresses - Commercial Vehicles**

Other AET facilities did not differentiate between passenger cars and commercial vehicles when providing their share of invalid addresses. However, it is estimated that the share of commercial vehicles with invalid addresses would be higher than for passenger cars. Jacobs assumed 15 percent as a base. A primary reason for this is the difficulty of identifying vehicle owners and operators based upon the rear plate of multi-unit vehicles. The actual operator of the vehicle is often several layers removed from the owner of the trailer as identified by the rear plate. Similar to passenger cars, it was assumed that the share of invalid addresses on the second bill and violation notice would be zero.

## **7.1.6 Percent of Bills and Violation Notices Paid**

The most difficult factors to pinpoint are the percent of first bills, second bills, and violation notices paid. These factors would have the highest effect on the potential net revenues.

### **7.1.6.1 First Bill**

On current AET facilities there is a wide range in the share of transactions that are paid on the first toll invoice. Jacobs assumed that 45 percent of passenger car transactions on the first invoice would be paid. This was estimated based on the 28 to 56 percent first bill payment range on current AET facilities.

Because owner-operator commercial vehicle drivers are often on the road for a long period of time, we considered the possibility that they may not actually return to their home location and have the invoice in-hand to pay it on time. Therefore, a lower rate of first bill payment was estimated at 35 percent when compared to passenger cars.

### **7.1.6.2 Second Bill**

On current AET facilities, 20 to 45 percent of transactions are paid on the second toll bill. Jacobs estimated 40 percent of Scudder Falls Bridge passenger car transactions invoiced on the second bill would be paid. On both the Scudder Falls Bridge and on current AET facilities a late fee is incurred on the second bill.

To avoid hefty violation fees on their third bill, a higher share of commercial vehicle drivers that missed payment on their first bill are expected to pay on the second bill, estimated at 60 percent of transactions.

### **7.1.6.3 Violation Notices**

The third bill sent to customers who did not pay for the tolls on the first two bills is a violation notice. The share of violation notices paid is an important factor affecting the revenues collected, because of the substantial violation fee of \$30 per transaction. Most of the current AET facilities have a range of 23 to 27 percent paying their violation notices. Jacobs estimated that about 15 percent of violation notices for both passenger cars and commercial vehicles would be paid.

### **7.1.6.4 Collections Notices**

If a violation notice is not paid, the information is sent to a collections agency which then sends a notice. Jacobs estimated that 15 percent of transactions in collections would be paid in some form: five percent of the toll transactions and violation fees would be paid by

both cars and commercial vehicles, and another ten percent would pay their late tolls only and have the fees dismissed.

### **7.1.7 Customer Frequency of Travel**

In addition to transaction assumptions, it was also necessary to assume general frequency of travel for both E-ZPass and Toll-by-Plate patrons for the estimation of number of accounts and transactions per invoice. Overall frequency profiles were generated from 2014 survey data, and these profiles were found to be consistent with survey data collected previously by Jacobs in 2009.

Overall frequency data was used as a base for estimating frequency profiles for E-ZPass customers and Toll-by-Plate customers, separately. This allowed for the more precise estimation of E-ZPass accounts and Toll-by-Plate accounts.

### **7.1.8 Dismissals and Forgiveness of Tolls and Late/Violation Fees**

Other AET facilities typically offer forgiveness of fees, and some transactions are fully dismissed or written off. Reasons include incorrect identification of license plates, a transponder already charged for a trip, and other similar circumstances.

It was assumed that one percent of customers paying their second bill would have their late fee dismissed. Two percent of customers sent a second bill would have their entire bill dismissed or written off. Five percent of customers sent a violations notice were assumed to have their violation fees forgiven, with another five percent having their entire transaction dismissed. Of those customers that are sent a collections notice, we have estimated 10 percent would have their violation fee dismissed while five percent would be fully dismissed or written off.

It was also assumed that some of the Toll-by-Plate premium (i.e., the additional rate charged to these vehicles over the E-ZPass rate) would be dismissed for those that pay their tolls on the first bill: 15 percent for both passenger and commercial vehicles. This is due to potential incentives for Toll-by-Plate customers to get E-ZPass.

### **7.1.9 Resulting Uncollectable Toll-by-Plate Tolls**

As a result of all the “waterfall” factors discussed above, Toll-by-Plate revenue from an estimated 41 percent of passenger cars and 42 percent of commercial vehicles would be uncollectable. This is within the norm seen on other AET facilities within the United States.

In addition, because Toll-by-Plate toll revenue is not collected at the time of transaction, a lag of three months has been built into our forecasts of Toll-by-Plate toll revenue. This was applied to the first year of tolling, 2019.

## **7.2 Costs of Toll Collection**

This section presents a discussion of the assumptions used in the formulation of toll collection cost estimates.

### **7.2.1 Proposed Toll Collection Methods for Scudder Falls Bridge**

The Scudder Falls Bridge will have a one-way AET barrier toll, where tolls would be collected each time a vehicle passes a single point in the southbound direction. The toll barrier will most likely consist of a series of stand-alone overhead gantries. We assumed that a toll barrier would be located between the Route 29 interchange in New Jersey and the Taylorsville Road interchange in Pennsylvania. It is envisioned that tolls would be collected via the following two methods:

1. E-ZPass – Tolls will be collected using E-ZPass transponders. If customers do not already have an E-ZPass account, it is assumed that some of them will choose to become E-ZPass customers.
2. Toll-by-Plate – Tolls will be collected via camera images of license plates. This would entail image capture and review to identify the customer from an external vehicle registration database (e.g. DMV) and send an invoice to the registered owner of the vehicle. A monthly Toll-by-Plate invoice cycle is planned based on the AET experience of other agencies, the costs savings over more frequent billings, and the fact that people are accustomed to receiving monthly bills.

In previous analyses, Jacobs also had considered a third payment option, registered/prepaid Toll-by-Plate, which would allow customers to establish a Toll-by-Plate toll account before or immediately after their trip based on their license plate number. However, at the 2014 and 2016 tolling policy forums with the Commission, it was discussed that when this account option was available at other agencies with AET, it was used by very few customers; therefore, it has not been included as a payment method for this study.

The planned process for Toll-by-Plate invoicing at Scudder Falls is as follows:

- 1<sup>st</sup> invoice: 30 days after 1<sup>st</sup> transaction. Customer has 30 days to pay.



- 2<sup>nd</sup> invoice (late invoice): 30 days after 1<sup>st</sup> invoice. Customer is now late in paying, and will be charged \$5 per invoice. The customer has 30 days to pay.
- 3<sup>rd</sup> invoice (violation invoice): 30 days after 2<sup>nd</sup> invoice. Customer is now a violator, and will have a \$30 fee per violation transaction plus the toll charge.
- If Violation Notice not paid in 30 days, no further notice is sent by DRJTBC; it goes to a collections agency which receives a portion of the late fees collected.

An estimate of the costs to collect from a violator after the violation notice is not included in this estimate.

## 7.2.2 Jacobs' Methodology for AET Cost Estimate

The Commission has a contract with the New Jersey E-ZPass Regional Consortium Customer Service Center to provide E-ZPass Customer Service Activities for all of the DRJTBC facilities. There are some uncertainties as to precisely how Toll-by-Plate transactions would be handled by the New Jersey E-ZPass Customer Service Center under the current contract. Therefore we have prepared a unit pricing method for estimating the cost of toll collection for the Scudder Falls Bridge.

The 2020 cost estimate shown in Table 7-3 is based upon actual unit cost components that are representative of actual costs for similar facilities. Using information collected during our surveys on frequency of travel and forecasts from our traffic and toll revenue model, we developed an estimate of the various quantities such as the number of invoices and accounts. We estimated a total cost of about \$3.7M.

**Table 7-3: Year 2020 Cost for AET Collection on the Scudder Falls Bridge**

Description	Scudder Falls Quantity	Unit Price	Estimated Total Price
E-ZPass Transactions	8,129,000	\$0.0754 per Transaction	\$600,000
Toll-by-Plate Transactions	1,954,000	\$0.325 per Transaction	\$600,000
Toll-by-Plate Customer Accounts	98,000	\$15.72	\$1,500,000
Invoicing Costs	873,000	\$0.67	\$600,000
Credit Card Fees for E-ZPass	\$15,760,000	1.7986% of revenues	\$300,000
Credit Card Fees for Toll-by-Plate	\$5,564,000	1.7986% of revenues	\$100,000
<b>Total Cost</b>			<b>\$3,700,000</b>

Splitting this out into the two different payment methods, \$900,000 are expected in E-ZPass toll collection costs versus \$2.8M in Toll-by-Plate collection costs. Xerox (now Conduent), which runs the NJ E-ZPass Regional Consortium, has validated this estimate.

### 7.2.3 AET Future Cost Estimates

We have applied the unit cost method shown in Table 7-3 to our estimates for each year. These collection costs have not been escalated because we believe that as the scale of AET increases regionally it is likely the unit costs would remain constant or may decline.

The cost of tolling will vary from year to year, as it is based on the number of transactions by payment type, the number of Toll-by-Plate customer accounts, and the total revenue collected. Collection cost estimates for the years 2019 through 2026 are presented in Table 7-4. The decrease in the first few years is due to an estimated increase in E-ZPass participation.

**Table 7-4: Scudder Falls Bridge Annual Toll Collection Costs Estimates**

2019	\$2.4
2020	\$3.7
2021	\$3.5
2022	\$3.3
2023	\$3.2
2024	\$3.1
2025	\$3.0
2026	\$3.0

*Note: Assumes tolling begins on June 1, 2019.*

### 7.2.4 Costs and Toll-by-Plate Rate Setting

Toll collection costs figured into the analysis of the toll rate setting process. One of the Commission's goals was to set the toll rate for Toll-by-Plate vehicles to cover the extra cost to process these vehicles over the cost to process an E-ZPass transaction. Xerox (now Conduent) produced a ROM collection cost estimate of \$1.33 per Toll-by-Plate transaction; Jacobs had estimated a processing cost of \$1.35 per Toll-by Plate transaction. With an E-ZPass cost per transaction of \$0.08, the extra cost of Toll-by-Plate over E-ZPass was calculated to be about \$1.27 per transaction. The approved rates will cover slightly more than this, with an additional \$1.35 charged for 2-axle Toll-by-Plate tolls over the standard E-ZPass rate. Since three-or-more axle trucks are charged a per-axle rate, the Commission decided that their incremental rate for Toll-by-Plate would be \$0.50 per axle (or \$1.50 for a three-axle vehicle, \$2.00 for a four-axle vehicle, etc.).

## 8.0 NET REVENUES AND DEBT SERVICE COVERAGE RATIOS

In this section of the report, the net revenue and debt service coverage ratios are presented. Previously presented gross revenues are reduced as a function of various costs including additional toll collection costs for Scudder Falls Bridge and operations and maintenance costs for the full system to arrive at net revenues. These net revenues are then compared to existing and anticipated debt service by year and coverage ratios are presented.

### 8.1 Scudder Falls Bridge Net Revenues

The toll revenues for the Scudder Falls Bridge, netting out the costs of toll collection, are presented in Table 8-1. As stated previously, the toll rates on the Scudder Falls Bridge were set such that the extra price charged to Toll-by-Plate customers would cover the additional costs incurred by Toll-by-Plate over E-ZPass transactions, as described in the previous section.

**Table 8-1: Scudder Falls Bridge Net Revenues (millions of dollars)**

Year	Scudder Falls Bridge					Trenton-Morrisville Add'l Toll Revenue*	Total Gross Revenues	SFB Toll Collection Costs	Net Revenues
	E-ZPass Toll Revenues	Toll-by-Plate Toll Revenues	Total Collected Toll Revenues	Toll-by-Plate Violations & Late Fees	Total Revenues				
2019	\$8.8	\$1.3	\$10.1	\$0.9	<b>\$10.9</b>	\$0.9	<b>\$11.9</b>	(\$2.4)	<b>\$9.5</b>
2020	\$15.8	\$3.4	\$19.1	\$2.2	<b>\$21.3</b>	\$1.6	<b>\$22.9</b>	(\$3.7)	<b>\$19.2</b>
2021	\$16.2	\$3.1	\$19.3	\$2.0	<b>\$21.3</b>	\$1.6	<b>\$22.9</b>	(\$3.5)	<b>\$19.4</b>
2022	\$16.6	\$2.9	\$19.5	\$1.8	<b>\$21.3</b>	\$1.6	<b>\$23.0</b>	(\$3.3)	<b>\$19.6</b>
2023	\$16.9	\$2.7	\$19.7	\$1.7	<b>\$21.4</b>	\$1.6	<b>\$23.1</b>	(\$3.2)	<b>\$19.9</b>
2024	\$17.2	\$2.6	\$19.9	\$1.7	<b>\$21.5</b>	\$1.7	<b>\$23.2</b>	(\$3.1)	<b>\$20.1</b>
2025	\$17.5	\$2.6	\$20.1	\$1.6	<b>\$21.7</b>	\$1.7	<b>\$23.3</b>	(\$3.0)	<b>\$20.3</b>
2026	\$17.7	\$2.5	\$20.3	\$1.6	<b>\$21.8</b>	\$1.7	<b>\$23.5</b>	(\$3.0)	<b>\$20.5</b>

\*Due to traffic shifting to the Trenton-Morrisville Bridge from the Scudder Falls Bridge when it is tolled

Note: may not add due to rounding.

Note: Scudder Falls Bridge assumed to commence tolling June 1, 2019, which is half-way through the Fiscal Year.

### 8.2 System Operations and Maintenance Costs

Jacobs has reviewed historical and projected annual operating expenses provided by DRJTBC and the section below summarizes key observations and findings. The Commission's operating expenses include expenses associated with the operation,

maintenance, and repair of the bridges, and general administrative expenses. It can be generally summarized under the following categories:

- Labor: covers all DRJTBC employee salaries and benefits.
- General & Administrative: covers costs associated with office expenditures, utilities, communication, information system, and educational, subscriptions, conference & training.
- Operating and Maintenance: covers costs associated with maintenance of facilities, buildings and grounds, automotive repairs and expenses and uniform.
- Professional Fees: covers third party costs associated with Electronic Surveillance/Detection System (ESS) and operation, state police bridge security and ESS management.
- E-ZPass Costs: covers costs associated with E-ZPass transponder issuance, transaction processing and account maintenance.
- Miscellaneous Expenses: covers all other costs including advertising, insurance premiums, general emergency contingency and any other third party professional services.

Note that expenses associated with Other Postemployment Benefits (OPEB) were not accounted as part of annual operating expenses. Other non-operating expenses principally include expenses attributable to the Commission's interest on bonded debt and the compact authorized investment program.

Table 8-2 lists the Commission's historical actual operating expenses and budgets from 2011 through 2015 and Table 8-3 summarizes the Commission's projected operating expenses from 2017 to 2026. It shall be noted that ESS Maintenance/Operating Costs were grouped under Operation and Maintenance in Table 8-2 and the same costs were grouped under Professional Services in Table 8-3.

The actual operating expenses have been consistently under budget each year. The Commission's 2016 actual expenses are estimated to be under budget by almost \$6.0 million from the 2016 budget expenses.

**Table 8-2: Historical Budgeted and Actual Operating Expenses (2011 to 2016)**

Operating Expenses		2011		2012		2013		2014		2015*		2016	
		Budget	Actual	Budget	Actual	Budget	Actual	Budget	Actual	Budget	Actual	Budget	Actual
Labor	Salaries and wages	\$18,735,384	\$18,852,340	\$18,317,698	\$18,189,803	\$18,327,703	\$18,008,542	\$17,849,495	\$18,021,867	\$19,125,129	\$18,833,823	\$20,315,353	\$19,514,589
	Employee benefits	10,109,036	9,389,178	10,383,965	10,134,034	11,747,249	11,675,099	14,993,789	13,051,865	14,867,513	15,737,706	18,353,507	15,777,895
General & Administrative	Heat, light, and power	887,836	862,318	919,041	736,574	923,841	775,839	884,041	774,546	918,041	674,067	937,041	619,706
	Office expense	265,445	139,988	255,375	124,425	257,621	137,779	255,820	198,286	274,626	181,666	274,607	197,125
	IT and communications	1,006,421	783,090	1,044,570	770,492	1,069,770	894,294	1,099,903	887,697	1,134,525	1,033,754	1,215,506	1,040,844
	Travel, meetings, and education	146,911	120,612	156,766	127,710	156,690	101,664	194,530	117,990	228,980	122,671	251,680	122,816
Operating and Maintenance	Operating and maintenance & ESS Maintenance/Operating Cost	3,044,851	2,541,243	2,886,064	2,422,018	2,860,753	2,746,068	3,153,236	2,824,886	3,063,292	2,821,444	3,619,725	2,440,073
Professional Fees	State police bridge security	4,327,561	4,152,027	4,293,084	4,223,512	4,525,601	4,482,337	4,685,759	4,693,830	5,213,396	5,062,527	5,634,648	5,391,356
E-ZPass Charges	E-ZPass operating and maintenance	4,497,500	4,190,776	4,836,785	4,901,416	4,861,557	4,846,585	5,518,360	5,814,397	5,714,272	6,495,763	6,518,885	6,720,886
Miscellaneous Expenses	Insurance	2,896,013	2,410,179	2,775,215	2,438,954	2,885,859	2,879,048	2,753,987	2,889,489	2,950,846	2,737,619	2,914,531	2,917,674
	Professional service fees	1,123,250	1,178,663	1,153,950	1,070,383	1,183,950	1,251,015	1,146,616	1,348,895	1,119,700	976,298	1,347,000	1,217,427
	Advertising and marketing	64,200	37,794	51,500	44,321	51,500	28,808	60,500	29,183	60,500	15,579	60,500	23,047
	Contingency	300,000	-	300,000	-	300,000	189,341	300,000	32,599	300,000	11,009	300,000	500
Total Operating Expenses		\$47,404,408	\$44,658,208	\$47,374,013	\$45,183,642	\$49,152,094	\$48,016,419	\$52,896,036	\$50,685,530	\$54,970,820	\$54,703,926	\$61,742,983	\$55,983,938
Growth over previous year (Actual)			n/a		1.2%		6.3%		5.6%		7.9%		2.3%
Difference (Actual less Budget)			(\$2,746,200)		(\$2,190,371)		(\$1,135,675)		(\$2,210,506)		(\$266,894)		(\$5,759,045)

\* Employee benefit expense is higher by \$1,126,380 in the 2015 audit report due to a non-cash entry related to the adoption of GASB 68 (Accounting and Financial Reporting for Pensions).

**Table 8-3: Projected Operating Expenses (2017 to 2026)**

Operating Expenses	Projected Operating Expenses									
	2017	2018	2019	2020	2021	2022	2023	2024	2025	2026
<b>Labor</b>	\$38,695,713	\$40,870,021	\$42,787,452	\$44,407,620	\$47,427,602	\$49,321,587	\$51,410,350	\$53,185,548	\$55,434,343	\$57,785,376
<b>General &amp; Administrative</b>	2,858,611	2,472,586	2,773,836	2,792,765	2,781,862	2,909,764	2,966,011	3,030,997	3,118,812	3,191,764
<b>Operating and Maintenance</b>	2,120,112	2,068,680	2,133,223	2,178,164	2,283,557	2,331,769	2,391,986	2,453,581	2,513,020	2,576,516
<b>Professional Fees*</b>	6,927,711	7,037,466	7,177,402	7,349,524	7,526,810	7,739,848	7,960,343	8,224,555	8,497,655	8,779,943
<b>EZ Pass Charges**</b>	5,713,790	5,814,208	8,391,955	9,764,943	9,733,561	9,738,140	9,849,539	9,967,988	10,093,726	10,326,999
<b>Miscellaneous Expenses</b>	4,424,882	4,458,954	4,688,219	5,141,688	5,039,368	5,172,441	5,289,786	5,420,978	5,554,569	5,688,182
<b>Total Operating Expenses</b>	<b>60,740,819</b>	<b>62,721,915</b>	<b>67,952,087</b>	<b>71,634,704</b>	<b>74,792,760</b>	<b>77,213,549</b>	<b>79,868,015</b>	<b>82,283,647</b>	<b>85,212,125</b>	<b>88,348,780</b>
<b>Growth over previous year</b>		3.3%	8.3%	5.4%	4.4%	3.2%	3.4%	3.0%	3.6%	3.7%

\* including both ESS Maintenance/Operating Costs and State Police Bridge Security/ESS Management.

\*\* assume additional E-ZPass cost of \$2.4 million in 2019 due to the opening of new toll Scudder Fall Bridge in June 2019.

After further review of the estimate and through discussion with the DRJTBC staffs, some of the key factors/assumptions affecting the future projections are listed below:

- The forecasting methodology uses a 3-year running average plus inflation on many of the expenses. The annual inflation rate is assumed to be 2.5%.
- Salaries and benefits are assumed to grow at a higher pace than inflation. For example, salaries and pensions are assumed to grow around 3.5% annually and health care benefit will grow at nearly 6% annually in future years.
- The 2017 operating expenses are based on a conservative average of prior years' actual expenditures to budget.
- The additional spikes in 2019 and 2021 are mainly due to the following:
  - The Commission is coming off a number of years with no salary increases in the recent years prior to 2015. Although there are some salary increases in 2015 and 2016, numerous vacancies have held down the rate of increase. These vacancies are not anticipated to continue into the future years.
  - It is anticipated that there are some additional staff that would be added around 2021 for the operation of the Scudder Falls toll bridge.
  - Pension matching rates have been increasing significantly for a number of years. The increases are anticipated to peak in the next several years and then decrease.
  - 2019 has additional expense of \$100,000 for the new Administration building which will go online.
  - It is assumed that the new Scudder Falls Bridge will begin tolling in June 2019 and additional costs associated with Scudder Falls Bridge E-ZPass transactions have been added in 2019 and onward.
- The merger of the DRJTBC E-ZPass customer service center with the NJ Customer Service Center (CSC) in 2014 will continue to lower expenses associated with E-ZPass in future years. With the NJ CSC agencies entering into a new agreement with Conduent (formerly Xerox) to begin operating in July 2017, the Commission should save approximately \$2 million per year in operating expenses for the existing seven toll bridges. The Commission also could realize further savings as system upgrades and enhancement costs are shared among the other member agencies in the NJ E-ZPass Regional Consortium. The Commission, which operates seven (7) toll bridges between Pennsylvania and New Jersey, had 137,725 active E-ZPass transponders in circulation and 67,066 accounts as of December 2016. In contrast,

the NJ CSC manages more than 2 million accounts with approximately 4 million transponders.

The overall projected growth rate for future operating expenses is in line with the historical averages, and the projected future operating expenses are considered reasonable and include the consideration of the opening of the Scudder Falls Bridge as a tolled facility.

### 8.3 Debt Service Coverage Ratios

The debt service coverage ratios for the DRJTBC system are presented in Table 8-4. The coverage ratios range from 1.97 to 1.71. There remains capacity from the DRJTBC system to generate additional revenue if needed through future toll adjustments because of the current relatively low toll rates, and lack of alternate competitive routes.

**Table 8-4: DRJTBC Net Revenues (millions of dollars) and Debt Service Coverage Ratios**

Year	Gross Revenues Scudder Falls Bridge <sup>(1)</sup>	Gross Revenues Existing System	Other Revenues <sup>(2)</sup>	Operations and Maintenance Costs	Total Net Revenues	Estimated Net Debt Service <sup>(3)</sup>	Debt Service Coverage Ratio <sup>(4)</sup>
<b>2017</b>		\$130.1	\$1.1	<b>\$60.7</b>	\$70.5	\$36.3	1.94
<b>2018</b>		\$131.2	\$1.1	<b>\$62.7</b>	\$69.6	\$36.1	1.93
<b>2019</b>	\$11.9	\$132.2	\$1.1	<b>\$68.0</b>	\$77.2	\$39.2	1.97
<b>2020</b>	\$22.9	\$133.2	\$1.1	<b>\$71.6</b>	\$85.6	\$48.0	1.78
<b>2021</b>	\$22.9	\$134.2	\$1.1	<b>\$74.8</b>	\$83.4	\$48.0	1.74
<b>2022</b>	\$23.0	\$135.3	\$1.1	<b>\$77.2</b>	\$82.2	\$48.0	1.71

<sup>(1)</sup> Includes additional revenue to Trenton-Morrisville.

<sup>(2)</sup> Other revenues include interest income and other miscellaneous income.

<sup>(3)</sup> Debt Service is net of capitalized interest; net debt service projection provided is an estimate and is subject to change based on final pricing.

<sup>(4)</sup> Ratio is not calculated pursuant to terms of Indenture.

Notes: May not add due to rounding.

Other Revenues and Debt Service payments provided by the Commission.

The terms used in Table 8-4 in are not intended to be the defined terms set forth in the Indenture.



## 9.0 LIMITS AND DISCLAIMERS

It is Jacobs' opinion that the traffic and gross toll revenue forecasts provided herein are reasonable and that they have been prepared in accordance with accepted industry-wide practice. However, given the uncertainties in any forecast, it is important to note the following assumptions which, in our opinion, are reasonable:

- i. This report presents the results of Jacobs' consideration of the information available as of the date hereof and the application of our experience and professional judgment to that information. It is not a guarantee of any future events or trends.
- ii. The traffic and gross toll revenue forecasts will be subject to future economic and social conditions, demographic developments and regional transportation construction activities that cannot be predicted with certainty.
- iii. The forecasts contained in this report, while presented with numeric specificity, are based on a number of estimates and assumptions which, though considered reasonable to us, are inherently subject to economic and competitive uncertainties and contingencies, most of which are beyond the control of an operating agency and cannot be predicted with certainty. In many instances, a broad range of alternative assumptions could be considered reasonable. Changes in the assumptions used could result in material differences in estimated outcomes.
- iv. Jacobs' traffic and gross toll revenue forecasts only represent our best judgment and we do not warrant or represent that the actual gross toll revenues will not vary from our forecasts.
- v. We do not express any opinion on the following items: socioeconomic and demographic forecasts, proposed land use development projects and potential improvements to the regional transportation network.
- vi. No other competing projects, tolled or non-tolled, are assumed to be constructed or significantly improved in the project corridor during the project period as to negatively impact DRJTBC toll traffic, except those identified within this report.
- vii. Major highway improvements that are currently underway or fully funded will be completed as planned.
- viii. The system will be well maintained, efficiently operated, and effectively signed to encourage maximum usage.
- ix. No reduced growth initiatives or related controls that would significantly inhibit normal development patterns will be introduced during the estimate period.

- x. There will be no future serious protracted recession during the estimate period.
- xi. There will be no protracted fuel shortage during the estimate period.
- xii. No local, regional, or national emergency will arise that will abnormally restrict the use of motor vehicles.

In Jacobs' opinion, the assumptions underlying the study provide a reasonable basis for the analysis. However, any financial projection is subject to uncertainties. Inevitably, some assumptions used to develop the projections will not be realized, and unanticipated events and circumstances may occur. There are likely to be differences between the projections and actual results, and those differences may be material. Because of these uncertainties, Jacobs makes no guaranty or warranty with respect to the projections in this Report.

This document, and the opinions, analysis, evaluations, or recommendations contained herein are for the sole use and benefit of the contracting parties. There are no intended third party beneficiaries, and Jacobs Engineering Group, Inc., (and its affiliates) shall have no liability whatsoever to any third parties for any defect, deficiency, error, omission in any statement contained in or in any way related to this document or the services provided.

Neither this document nor any information contained therein or otherwise supplied by Jacobs Engineering Group, Inc. in connection with the study and the services provided to our client shall be used in connection with any financing solicitation, proxy, proxy statement, proxy soliciting materials, prospectus, Securities Registration Statement or similar document without the express written consent of Jacobs Engineering Group, Inc.

\* \* \* \* \*

We greatly appreciate the invaluable assistance provided by the staff of the Delaware River Joint Toll Bridge Commission.

## APPENDIX

- Memorandum: Scudder Falls Bridge Data Collection and Survey Results  
(Conducted in 2014 for the previous Traffic and Revenue Study)
- Scudder Falls Bridge Annual Traffic and Revenue Details

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## **Scudder Falls Bridge**

### **2014 Data Collection and Survey Results Memo**

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2 Penn Plaza Suite 603  
New York, NY 10121  
212.944.2000

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**Date**           **9 May 2014**

**To**             Delaware River Joint Toll Bridge Commission

**From**          Jacobs Engineering Group Inc.

**Subject**       Scudder Falls Bridge Data Collection and Survey Results  
Delaware River Joint Toll Bridge Commission  
C-549AR – Level 3 - Investment Grade Traffic and Revenue Forecasts  
Capital Project No. 0920A

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### **Introduction**

Jacobs is providing an investment-grade traffic and revenue study for the Scudder Falls Bridge. As part of the study, Jacobs is collecting relevant data to support the forecasts. In addition to data readily available, Jacobs conducted an extensive data collection program in and around the Bridge specifically for this project. These studies included:

- hourly traffic counts on the Bridge
- license plate surveys
- counts of vehicles equipped with *E-ZPass*
- travel time surveys, and
- Bridge customer characteristic surveys via Jacobs-designed online surveys.

The results of these data collection efforts have been incorporated into Jacobs' traffic and revenue forecasting model, and are discussed and presented herein.

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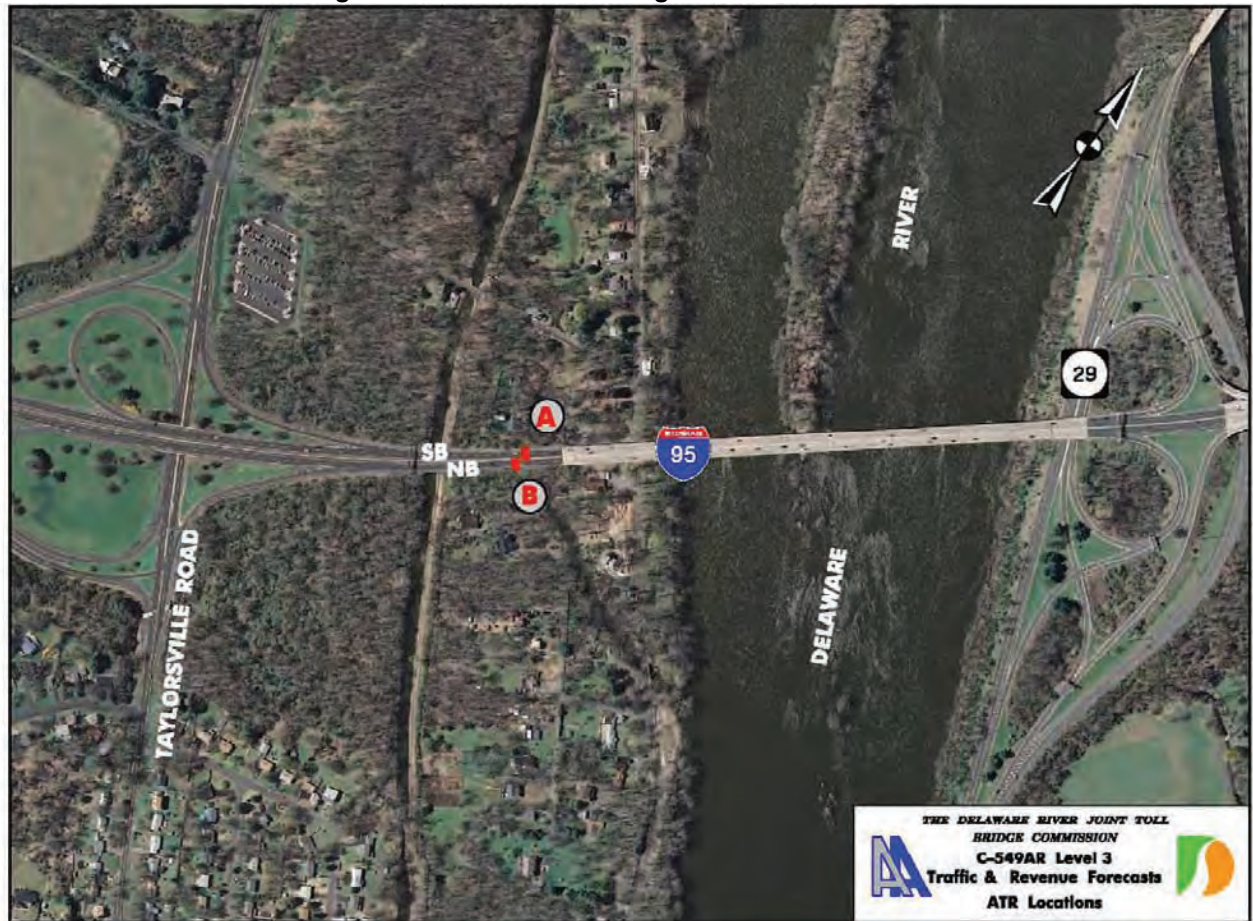
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## Traffic Counts

Traffic counts were conducted on the Scudder Falls Bridge by Arora and Associates, PC, between March 31<sup>st</sup> and April 7<sup>th</sup> 2014. The automatic traffic recorders (ATRs) were placed on the Pennsylvania side of the bridge separately for northbound and southbound traffic, as shown in Figure 1. Figure 2 and Figure 3 show the daily counts by hour for southbound and northbound traffic.

**Figure 1: Scudder Falls Bridge Count Locations**



Data from the Commission's facilities reveals that April is an average month in terms of daily traffic volumes. Therefore, 2014 AADT and AAWDT were estimated to be the same as the counted traffic.

**Table 1: 2014 Estimated AADT and AAWDT, based on March 31-April 7 2014 Count Data**

	Southbound	Northbound*
Annual Average Daily Traffic (AADT)	29,799	26,159
Annual Average Weekday Traffic (AAWDT)	32,207	27,980

\*Eight hours during the one week period had missing or faulty counts in the Northbound direction; Jacobs estimated counts for these hours.



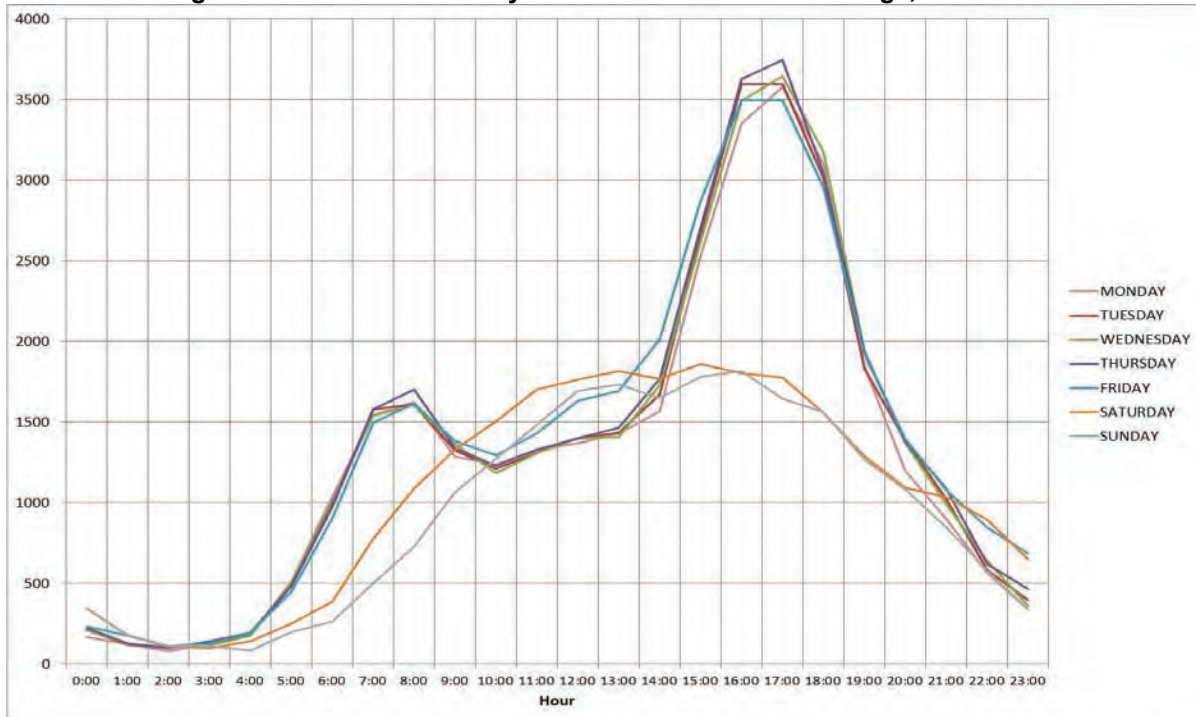
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The count data also separated vehicles by class. It was calculated from the data that 8.0 percent of average daily traffic is trucks – 6.4 percent light trucks, with fewer than five axles, and 1.6 percent heavy trucks, with five or more axles. The light trucks on the Bridge have an average of 3.1 axles per vehicle, while heavy trucks have an average of 5.2 axles. The overall average number of axles per truck is 3.5.

**Figure 2: Southbound Hourly Traffic on Scudder Falls Bridge, 3/31/14-4/7/14**

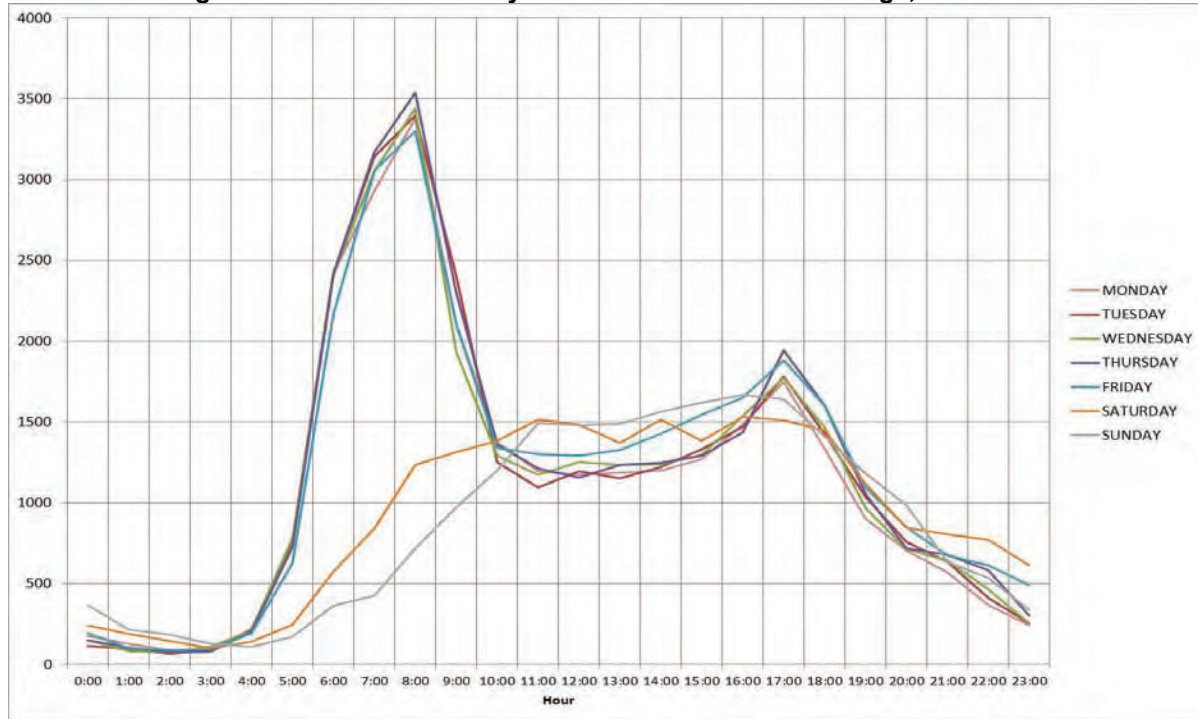


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**Figure 3: Northbound Hourly Traffic on Scudder Falls Bridge, 3/31/14-4/7/14**



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## License Plate Surveys

In order to determine the amount of traffic currently using the Bridge that is from New Jersey and Pennsylvania, and in order to help us determine potential invoicing for an All Electronic Toll Facility (AET), a license plate survey was conducted on the Scudder Falls Bridge by Arora and Associates, PC, on Tuesday, April 1<sup>st</sup> for two hours each during the AM peak, midday and PM peak periods. This survey was done in the southbound direction only (the direction of potential future tolling). Results are shown in Table 2. As expected, the majority of vehicles (some 90 percent) are registered in PA or NJ, with more from PA overall (as Pennsylvania to New Jersey is the major commute direction). Note that 8 percent of peak period and 12 percent of off-peak vehicles are from neither PA nor NJ.

**Table 2: Southbound Scudder Falls Bridge License Plate Count Results**

PERIOD	Traffic Volume by State License Plate								PERIOD TOTAL
	PA	NJ	NY	CT	DE	MD	OTHER NE*	OTHERS**	
7:30AM TO 9:30AM	671	2221	22	11	10	49	74	82	<b>3140</b>
	21%	71%	1%	0%	0%	2%	2%	3%	
12:00PM TO 2:00PM	1383	1062	45	12	15	29	60	185	<b>2791</b>
	50%	38%	2%	0%	1%	1%	2%	7%	
3:00PM TO 5:00PM	4920	1033	71	12	34	35	145	256	<b>6506</b>
	76%	16%	1%	0%	1%	1%	2%	4%	

\*- New England States of MA, RI, VT, NH, ME

\*\* - All other States except PA, NJ, NY, CT, DE, MD, RI, NH, VT, MA, ME

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## Counts of Vehicles Equipped with E-ZPass

A temporary *E-ZPass* reader was installed by the Commission at the Bridge for one week, from April 1<sup>st</sup> through April 7<sup>th</sup> 2014. This was done to determine how many vehicles currently crossing the Bridge in the southbound direction already are equipped with *E-ZPass*. Table 3 summarizes the counts of *E-ZPass* vehicles by tag agency. Along with this data collection effort, traffic counts were made during the same timeframe (see previous sections for details); these two data collection efforts helped us to determine the percentage of existing vehicles equipped with *E-ZPass*.

It was found that 49 percent of weekday vehicles and 46 percent of weekend vehicles crossing on the survey days had a readable *E-ZPass* transponder. Some 78 percent of those with *E-ZPass* have obtained it from the NJ Turnpike or the Pennsylvania Turnpike Commission. Only 5 percent have a DRJTBC-issued *E-ZPass* transponder. It is assumed that there were a small percentage of *E-ZPass* transponders that were not displayed and/or not read.

**Table 3: Southbound Scudder Falls Bridge E-ZPass Counts (Raw Data)**

Agency	Southbound Transponder Reads			Avg Day Share by Agency
	Avg Weekday	Avg Weekend Day	Avg Day	
NYSTA/NYSBA	509	336	460	3.2%
PANYNJ	990	795	934	6.5%
PTC	5,581	3,090	4,869	33.7%
MTAB&T	501	458	489	3.4%
DRPA	9	4	8	0.1%
VDOT	58	83	65	0.4%
Peace Br	4	2	4	0.0%
Illinois	57	37	51	0.4%
MdTA	121	160	132	0.9%
DelDOT	143	145	143	1.0%
MassPike	92	64	84	0.6%
NJTPKE	6,854	5,270	6,401	44.3%
WV	6	3	5	0.0%
DRBA	17	13	16	0.1%
NHDOT	12	10	11	0.1%
Maine	10	7	9	0.1%
DRJTBC	875	468	759	5.2%
Indiana	5	5	5	0.0%
Ohio	10	7	9	0.1%
RITBA	5	3	4	0.0%
NC	1	1	1	0.0%
<b>Total E-ZPass Reads</b>	<b>15,860</b>	<b>10,959</b>	<b>14,460</b>	<b>100.0%</b>
<b>Total SB Traffic</b>	<b>32,207</b>	<b>23,779</b>	<b>29,799</b>	
<b>% E-Zpass</b>	<b>49.2%</b>	<b>46.1%</b>	<b>48.5%</b>	

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## **Travel Time Surveys**

Travel time surveys were conducted in order to indicate time differences between trips taking the Scudder Falls Bridge and alternate routes. These results factor into our forecasts of who would remain on the Scudder Falls Bridge versus using another bridge in the area. The southbound origin-destination (O-D) study that was part of the surveys conducted by Jacobs during the Level II Scudder Falls Bridge T&R Study in 2008/2009, indicated two major clusters of origin points in New Jersey for Bridge customers. These were used as the starting locations for the travel time surveys:

- Ewing, NJ at Scotch Road and Parkway Avenue
- The I-95/Rte 1 interchange in Lawrence, NJ (which will include the majority of trips from the north and east)

Three major clusters of destination points were identified on the Pennsylvania side, and were used as the ending points for the travel time surveys:

- Newtown, PA at Lincoln Ave. and Washington Ave.
- Yardley, PA at Afton Ave. and Schuyler Dr.
- The I-95/Rte 1 interchange in Langhorne, PA (which will include the majority of the trips from the south and west)

The travel time surveys were conducted by Arora and Associates, PC, between each combination of O-D pairs during peak and off-peak periods. The surveys were conducted during the first week of April, from Tuesday through Thursday. Different routes were traveled between each O-D pair, using the Scudder Falls Bridge and using alternative bridges where they made sense as alternate routes (as an example, for a trip between Lawrence and Langhorne, the Washington Crossing Toll Supported Bridge is *not* a reasonable alternative because it is located well outside the area of travel and would add significant journey time, but the Route 1/Trenton-Morrisville Toll Bridge and the Lower Trenton Toll-Supported Bridge are). As shown in the following Table, the Scudder Falls Bridge is always the fastest route between these points, except between the two I-95/ Route 1 interchanges, where the travel time using the Trenton-Morrisville Toll Bridge is very similar to and sometimes shorter than the travel time using the Scudder Falls Bridge.

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**Table 4: Travel Times between O-D Pairs, Using Scudder Falls Bridge and Alternative Crossings  
 (in minutes)**

<b>AM Peak Period</b>						
From	To	Scudder Falls Br.	Trenton-Morrisville Toll Br.	Lower Trenton Toll Supported Br.	Calhoun St. Toll Supported Br.	Washington Crossing Toll Supported Br.
Ewing, NJ	Yardley, PA	12.4			18.3	
Ewing, NJ	I-95/Rte 1 Int., PA	11.5	18.0	17.8		
Ewing, NJ	Newtown, PA	13.0				23.0
I-95/Rte 1 Int., NJ	Yardley, PA	14.1		18.5		
I-95/Rte 1 Int., NJ	I-95/Rte 1 Int., PA	13.6	13.4	18.0		
I-95/Rte 1 Int., NJ	Newtown, PA	16.9	23.0	25.5		
<b>Midday / Off-Peak Period</b>						
From	To	Scudder Falls Br.	Trenton-Morrisville Toll Br.	Lower Trenton Toll Supported Br.	Calhoun St. Toll Supported Br.	Washington Crossing Toll Supported Br.
Ewing, NJ	Yardley, PA	10.8			18.4	
Ewing, NJ	I-95/Rte 1 Int., PA	13.0	17.5	18.3		
Ewing, NJ	Newtown, PA	14.0				21.5
I-95/Rte 1 Int., NJ	Yardley, PA	14.4		18.0		
I-95/Rte 1 Int., NJ	I-95/Rte 1 Int., PA	13.7	14.3	17.0		
I-95/Rte 1 Int., NJ	Newtown, PA	16.8	21.0	25.0		
<b>PM Peak Period</b>						
From	To	Scudder Falls Br.	Trenton-Morrisville Toll Br.	Lower Trenton Toll Supported Br.	Calhoun St. Toll Supported Br.	Washington Crossing Toll Supported Br.
Ewing, NJ	Yardley, PA	10.4			20.2	
Ewing, NJ	I-95/Rte 1 Int., PA	11.5	18.5	21.5		
Ewing, NJ	Newtown, PA	14.5				22.0
I-95/Rte 1 Int., NJ	Yardley, PA	14.2		24.0		
I-95/Rte 1 Int., NJ	I-95/Rte 1 Int., PA	13.7	13.9	17.9		
I-95/Rte 1 Int., NJ	Newtown, PA	17.5	23.5	32.0		

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## **Online Customer Characteristic Surveys**

The purpose of the online surveys was to obtain information on Scudder Falls Bridge current customer travel characteristics such as frequency of travel, state of residence, trip origin/destination, familiarity with electronic tolling, and stated preference (i.e., what a driver states they would do if the Scudder Falls Bridge were to be tolled). For the Level II Scudder Falls Bridge T&R Study in 2008/2009, Jacobs had conducted a survey advertised through roadside variable message signs (VMS). Our 2014 surveys contain almost all of the same questions as in the previous study, plus several new questions. The actual survey questions have been included at the end of this memorandum. Results of the surveys will be used in Jacobs' traffic and revenue forecasting model.

Two different methods were used to direct patrons to take the survey:

1. through e-Rewards, a service whereby e-Rewards members are e-mailed a survey link and earn e-Rewards points for completion of surveys, and
2. through variable message signs (VMS) displayed for several weeks near the Scudder Falls Bridge directing drivers to an internet link, "www.SURVEY-U.com".

## **eRewards Survey**

The purpose of conducting an eRewards survey in addition to the roadside VMS survey was:

- to obtain responses from additional customers, and
- to include infrequent customers who may not have seen - or did not respond to - the VMS sign.

The e-Rewards survey, since it is sent to essentially a random sampling of people throughout the area, provides a far better indication of frequency of travel across the Bridge than the VMS survey, mainly because a person who sees the VMS sign advertising the survey over and over again (i.e., a frequent traveler) is much more likely to complete the survey than someone who sees it only once or not at all.

Research Now (parent company of e-Rewards) conducted the survey through their e-Rewards program. e-Rewards participants who did not meet the survey requirements – such as people without a driver's license, and people who state that they have not crossed the Scudder Falls Bridge at all in the past year – were screened out of the survey and were not included in Jacobs' quota of 1,000 completed surveys.

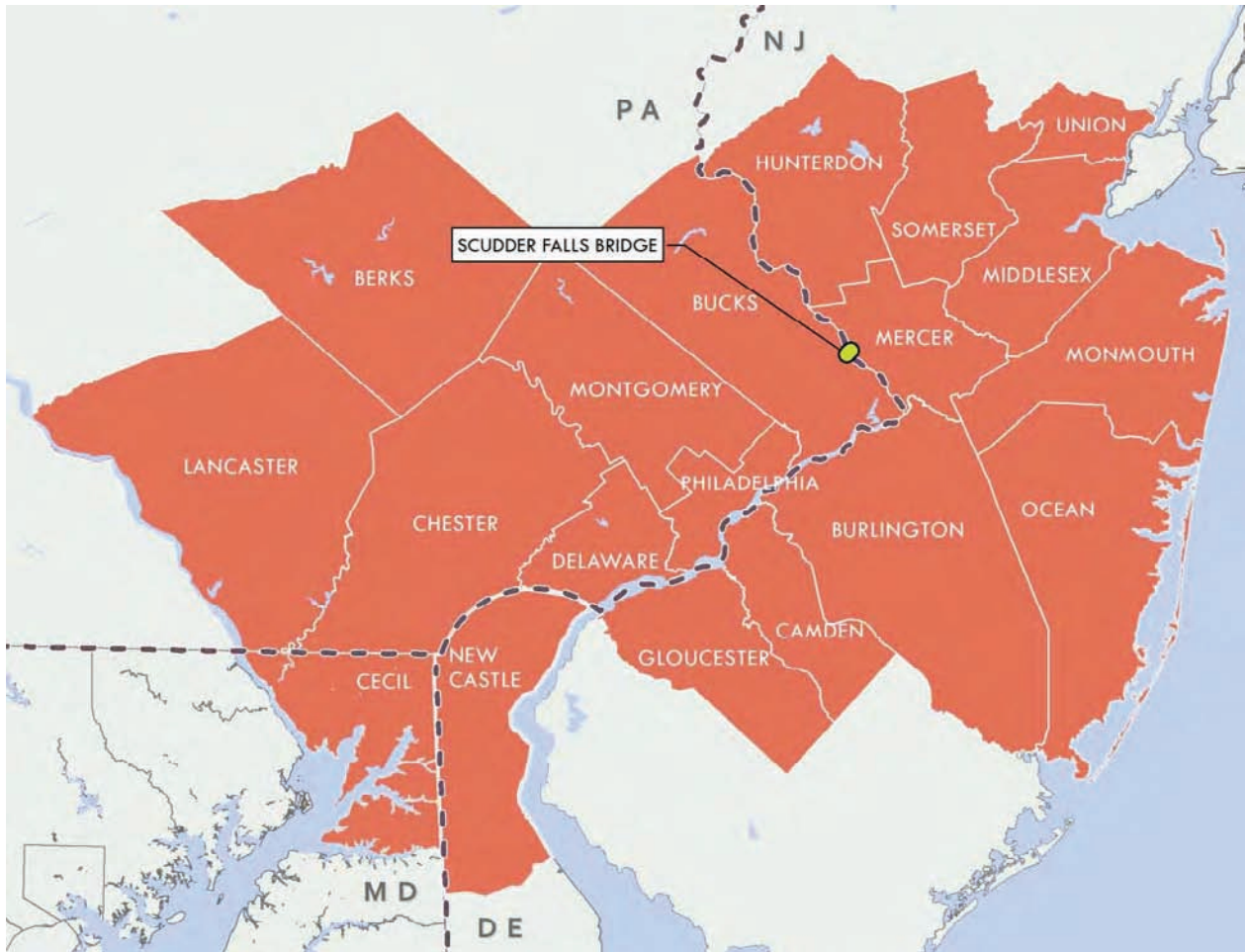
Research Now e-mailed the survey link to all e-Rewards participants within an area specified by Jacobs. This area, chosen by Jacobs to cover the parts of the DVRPC model region that were proximate to the Scudder Falls Bridge and I-95 – and therefore likely to contain both frequent and infrequent Bridge customers – consisted of 19 counties, as shown in Figure 4. The e-mails were sent and the survey commenced on March 25<sup>th</sup> 2014; the 1,000 quota was reached and the survey concluded on March 28<sup>th</sup>.

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**Figure 4: Counties Included in eRewards Survey Area**





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## **VMS-Advertised SurveyMonkey Survey**

The roadside VMS-advertised survey was administered through the internet survey site *SurveyMonkey*. Jacobs owns the web address “www.SURVEY-U.com,” which was linked to the Scudder Falls survey. “WWW.SURVEY-U.COM” was publicized to patrons of the Scudder Falls Bridge via four strategically located roadside variable message signs.

The two phases for the VMS were as follows:

Phase 1 -  
“TAKE  
TRAVEL  
SURVEY”

Phase 2 -  
“WWW.  
SURVEY-U  
.COM”

The Commission placed the VMS signs and displayed the messages on the two Pennsylvania signs for about three and a half weeks, from March 5<sup>th</sup> through March 28<sup>th</sup> 2014. The two signs in New Jersey were displayed from March 5<sup>th</sup> through March 14<sup>th</sup> 2014. The survey was kept open to collect responses until March 31<sup>st</sup>. Locations for these variable message signs are shown in Figure 5.

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**Figure 5: Location of Variable Message Signs at Scudder Falls Bridge**



**Notes:**

VMS 1 & 3 faced Northbound (NB) traffic. VMS 2 & 4 faced Southbound (SB) traffic.  
VMS 3 & 4 were removed on March 14, the 10<sup>th</sup> day of the survey.

## **Online Customer Characteristic Survey Results: Customer Responses**

We received 1,001 fully completed surveys from e-Rewards and 477 completed plus 32 partially-completed surveys from SurveyMonkey, the VMS-advertised survey. (This is in comparison to the 445 full and 27 partial surveys completed via the VMS surveys in the 2008-2009 Level II Traffic & Revenue study.) This section presents the customer responses for each survey. The results for several of the questions that were expanded to represent total trips are presented in the following section on page 28.

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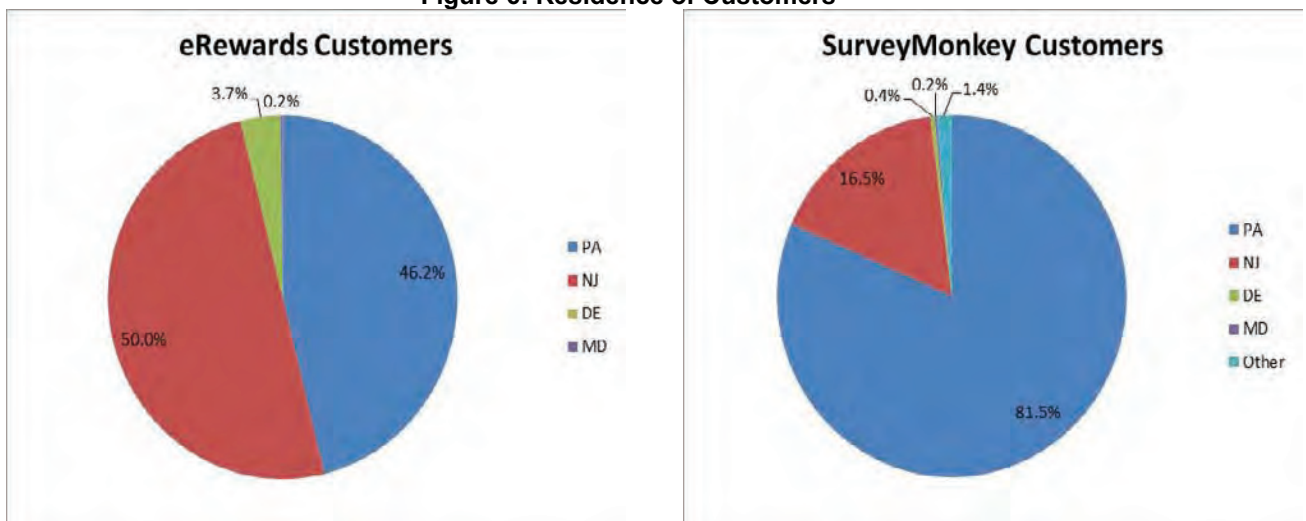
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## What is your city, state, and zip code of residence?

Customers were asked in which city and state they reside. As Figure 6 shows, eRewards survey respondents were almost evenly split between Pennsylvania and New Jersey residents, with a small number of Delaware residents. Meanwhile the VMS (SurveyMonkey) survey was mainly taken by people who live in Pennsylvania, as the work commute across the Scudder Falls Bridge is primarily made by Pennsylvania residents traveling to work in New Jersey, and these commuters (frequent travelers) were more likely to see the VMS than other travelers.

Figure 6: Residence of Customers



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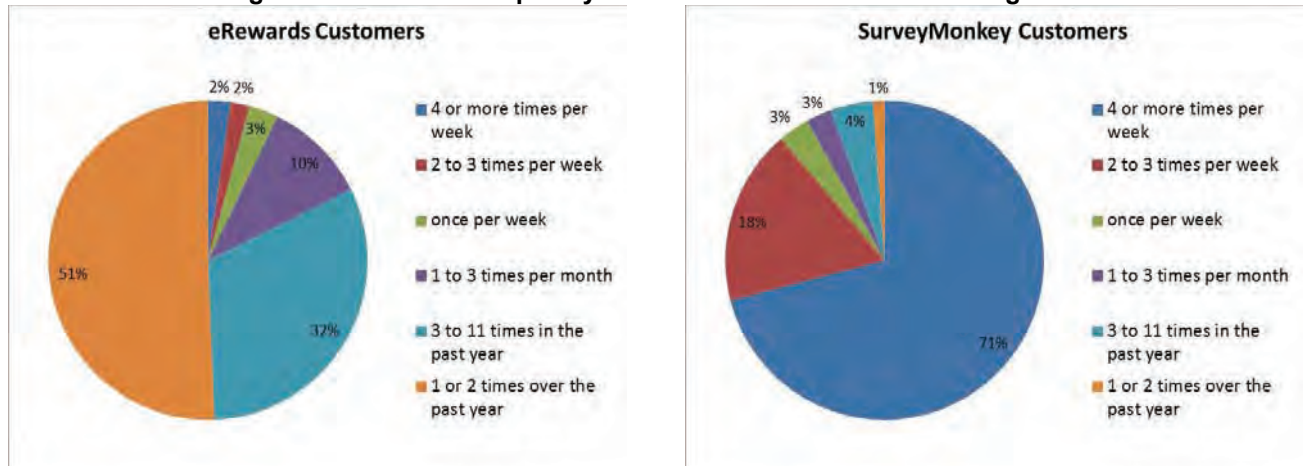
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## How often have you driven across the Scudder Falls Bridge over the past year?

Figure 7 shows how customers responded to the question on trip frequency. Anyone who stated that they had not used the Scudder Falls Bridge at all in the past year were screened out of the survey. As expected, there was a very large difference between the two surveys, as the eRewards survey was taken by a sampling of people throughout the central NJ and southeastern PA area, who are part of the eRewards program, and the SurveyMonkey survey was only taken by those who saw the roadside variable message sign, remembered the website name, and later went online to take the survey. Only 2 percent of the eRewards respondents cross the Bridge four or more times per week, while 71 percent of those responding to the VMS/SurveyMonkey survey do. The majority of eRewards customers – 51 percent – took the Bridge only once or twice in the past year, as compared to 1 percent of the SurveyMonkey respondents.

**Figure 7: Customer Frequency of Travel over Scudder Falls Bridge**



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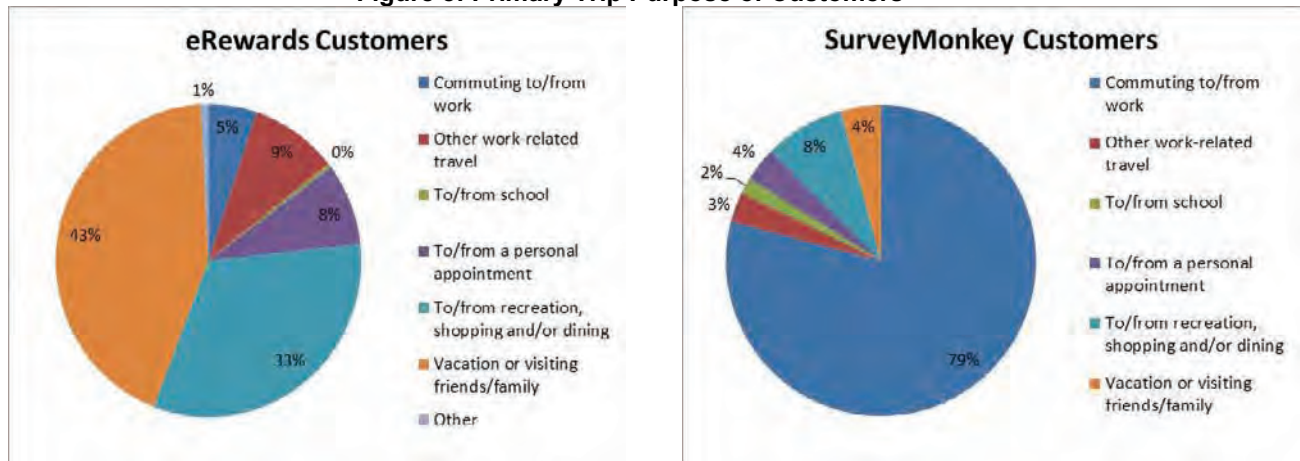
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## What was the primary purpose of your trip across the Scudder Falls Bridge?

Figure 8 compares the primary purpose of travel among Bridge customers for their most recent southbound crossing. Those taking the SurveyMonkey survey were primarily commuters while eRewards customers using the bridge used it for more discretionary trip purposes such as vacation travel, recreation and shopping.

Figure 8: Primary Trip Purpose of Customers





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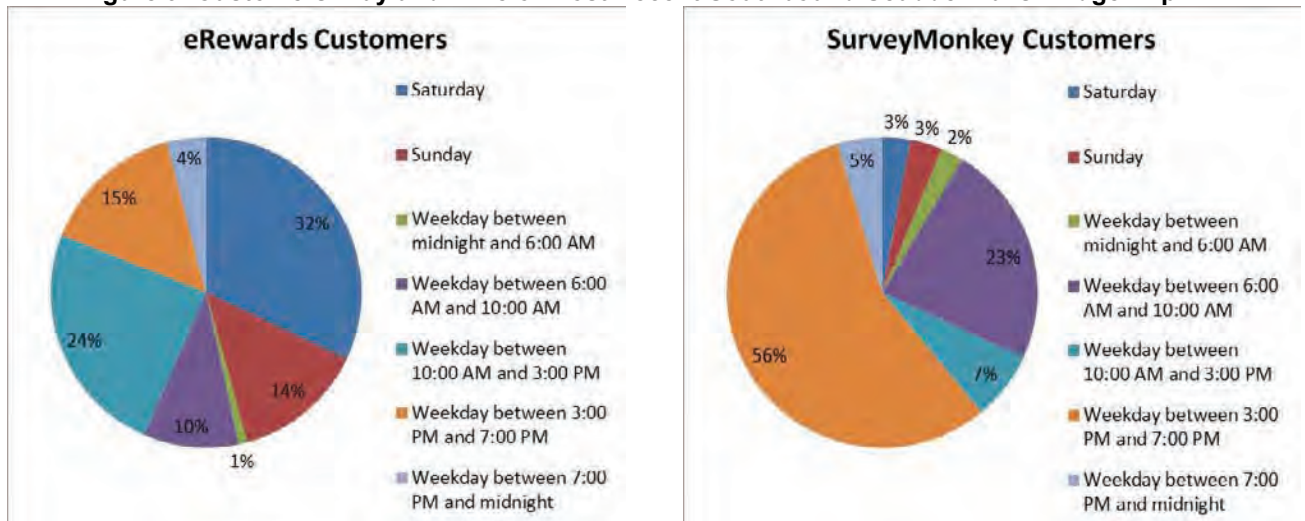
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## What day / time of day did you take this trip?

Customers' most recent time of crossing the Bridge in the southbound direction is shown in Figure 9. This follows the same pattern of the previous responses, with mainly infrequent, discretionary trips by eRewards customers and mainly commutation trips by SurveyMonkey respondents. Therefore, the eRewards' responses show more off-peak and weekend travel than those for the VMS surveys.

**Figure 9: Customers' Day and Time of Most Recent Southbound Scudder Falls Bridge Trip**



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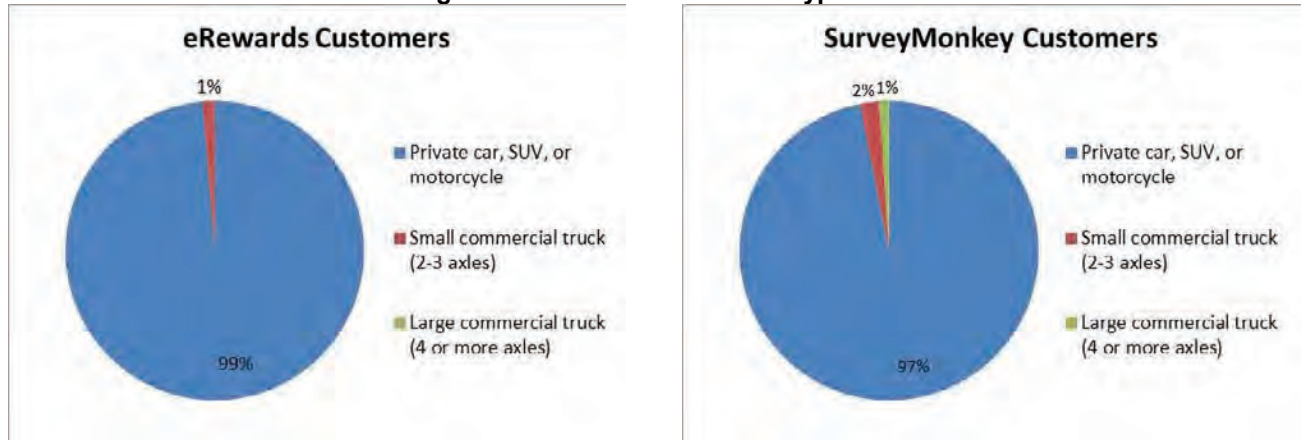
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## What type of vehicle were you driving for this trip?

The vast majority of respondents drove a car across the Bridge during their most recent southbound trip, as shown in Figure 10.

Figure 10: Customers' Vehicle Type



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## **Where did this trip begin? Where did this trip end?**

Customers were asked the origin and destination of their most recent southbound trip across the Bridge. A small number of patrons mistakenly gave their origin as Pennsylvania or south and their destination as New Jersey or north, corresponding to a northbound trip across the bridge; these origin-destination pairs were flipped to represent a southbound trip. Origins and destinations for the eRewards and SurveyMonkey respondents are shown in Figure 11 and Figure 12, respectively. Figure 13 shows the results of both surveys together, within about a 15-mile range of the Scudder Falls Bridge.

These results show, first of all, that there were differences between the two sets of customers. The respondents to the eRewards survey mainly took trips with origins and destinations outside the immediate area of the Scudder Falls Bridge, while those surveyed through SurveyMonkey were clustered in areas around the bridge, such as Newton, Langhorne, Yardley, the Trenton/Ewing area, and Princeton. This was expected because the eRewards survey link was emailed to people throughout the area including many who only use the bridge occasionally, while the SurveyMonkey respondents were more likely to be locals and commuters who took the survey because they saw the sign advertising it on multiple trips across the bridge.

The origins and destinations from the SurveyMonkey survey match well with those from the surveys conducted by Jacobs during the Level II Scudder Falls Bridge T&R Study in 2008/2009.



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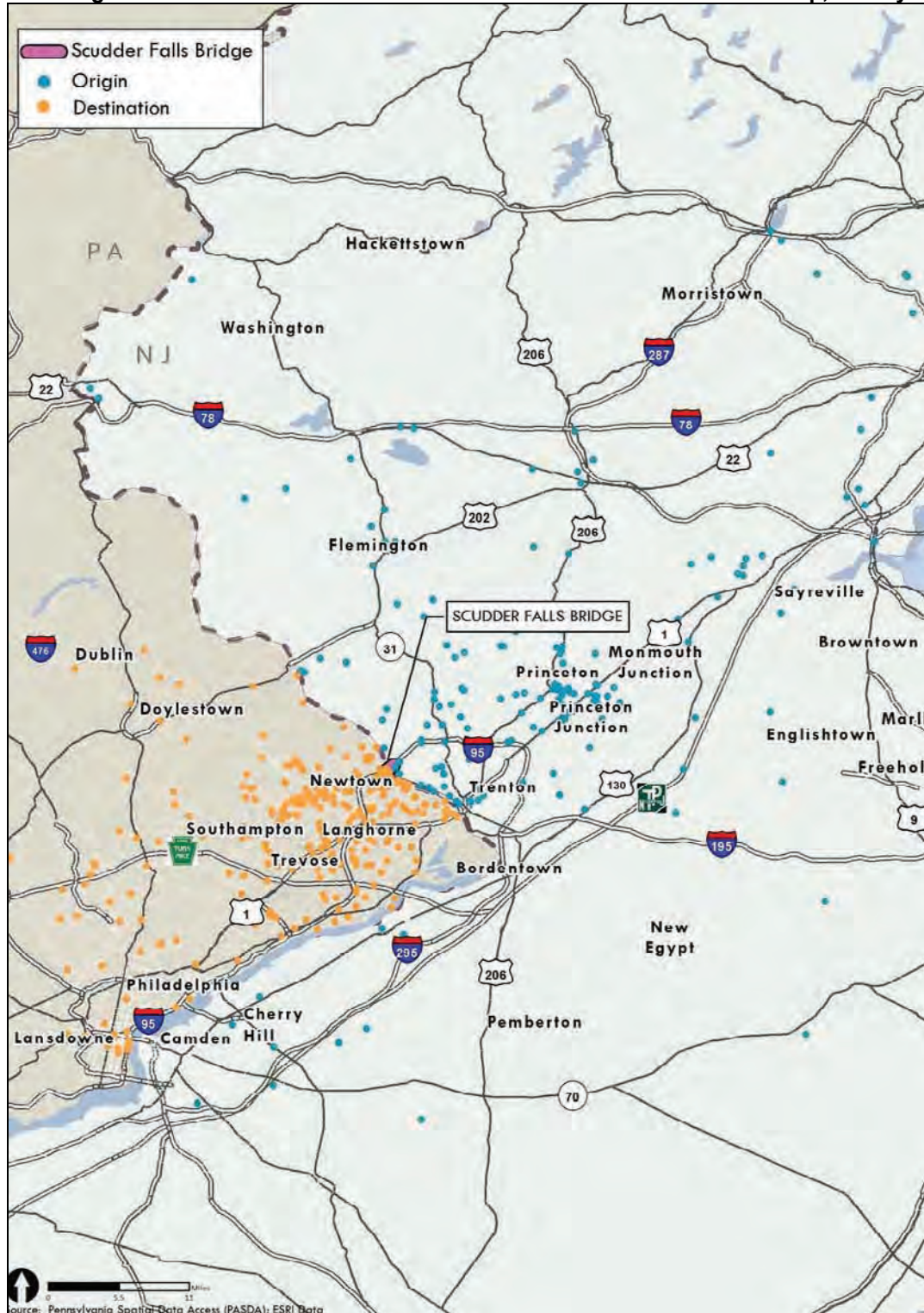
**Figure 11: Origins and Destinations of Customers on Most Recent Southbound Trip, eRewards**

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Figure 12: Origins and Destinations of Customers on Most Recent Southbound Trip, SurveyMonkey



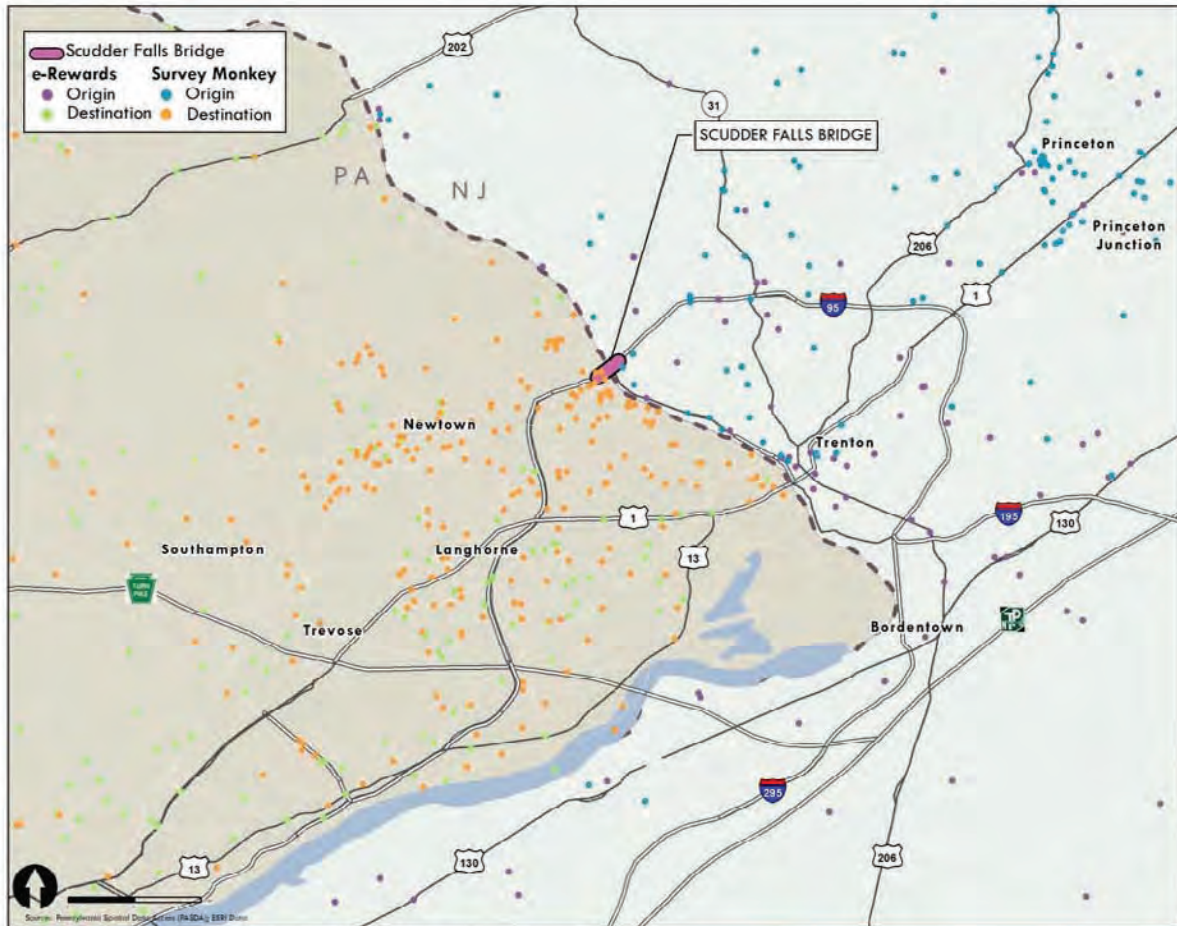


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**Figure 13: Origins and Destinations of Customers on Most Recent Southbound Trip, Vicinity of Scudder Falls Bridge**



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## What was your total approximate travel distance? What was your total approximate travel time?

As shown in Figure 14 and

Figure 15, the majority of eRewards customers drove more than 50 miles the last time they crossed the Scudder Falls Bridge in the southbound direction, with a travel time of more than an hour. Most SurveyMonkey respondents drove 20 miles or less with a travel time of 15 to 45 minutes.

Figure 14: Customers' Travel Distance

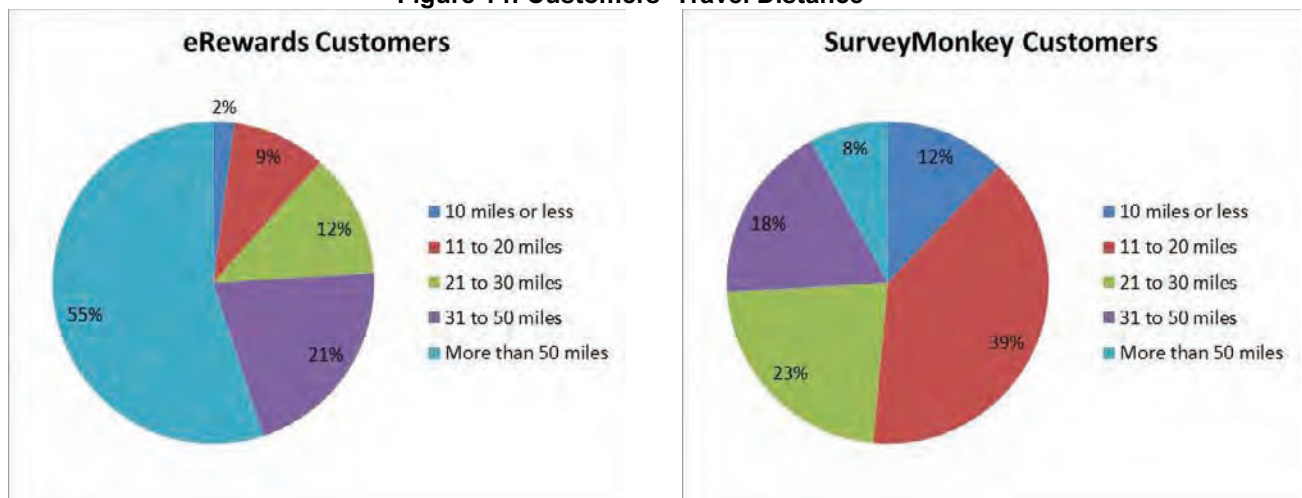
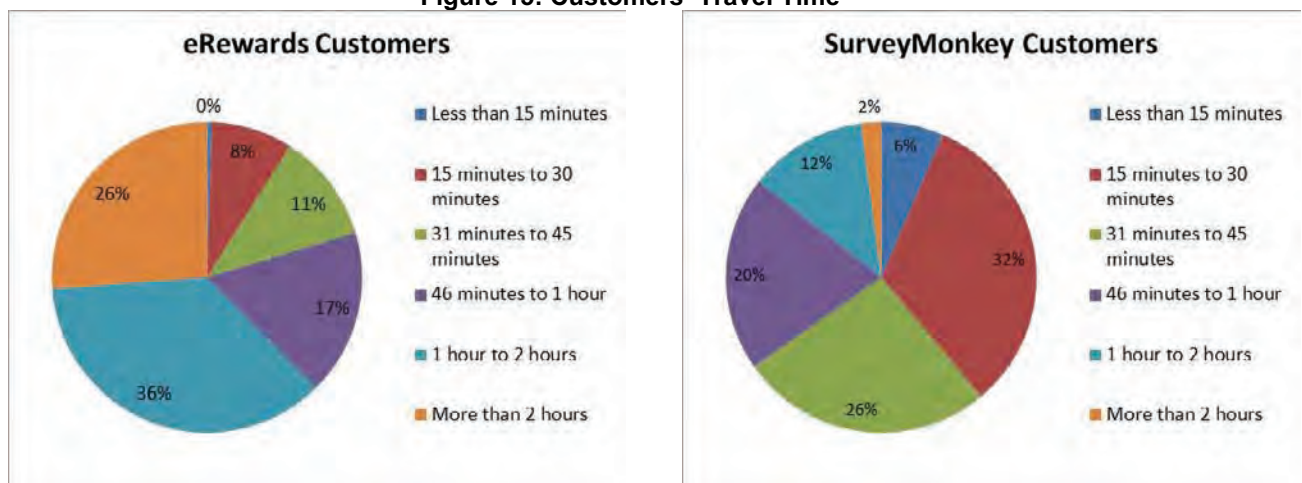


Figure 15: Customers' Travel Time



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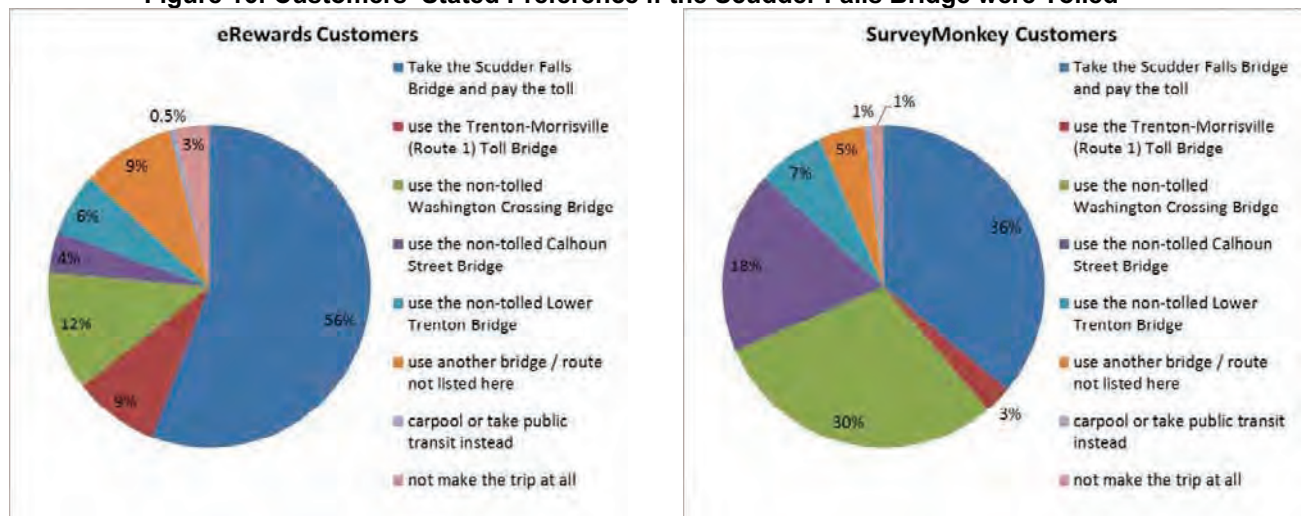
## **If the new Scudder Falls Bridge had the same Pennsylvania-bound toll as the Trenton-Morrisville Route 1 Toll Bridge, what would you do when you wanted to make this trip again across the Delaware River? {Stated Preference}**

Customers were asked what they would do if they were to make the same trip but with a southbound toll on the Scudder Falls Bridge that is similar to the toll on the Trenton-Morrisville (Route 1) Bridge. A majority of the eRewards customers (56 percent) stated that they would stay on the Scudder Falls Bridge and pay the toll, while only 36 percent of SurveyMonkey respondents said they would; most of them stated that they would move to a non-tolled bridge.

It should be noted that stated preference surveys and their results rely on hypothetical questions to elicit preferences or values. Hypothetical bias arises in stated preference valuation studies when respondents report a willingness to do something in laboratory or field experiments that in fact they would not normally do in the real world, and hypothetical biases typically exceed the actual values. In this situation, many respondents were likely to state that they would take a free bridge as a protest against tolling on the Scudder Falls Bridge, or in the belief that the collective answers would be used to decide whether or not to toll the bridge. Therefore, the results of this particular question – and stated preference data in general - should be looked at with a note of caution, especially prior to the expansion of these customer results to ‘total trips.’

Note that this question was not asked in the survey conducted by Jacobs during the Level II Scudder Falls Bridge T&R Study in 2008/2009.

**Figure 16: Customers’ Stated Preference if the Scudder Falls Bridge were Tolled**



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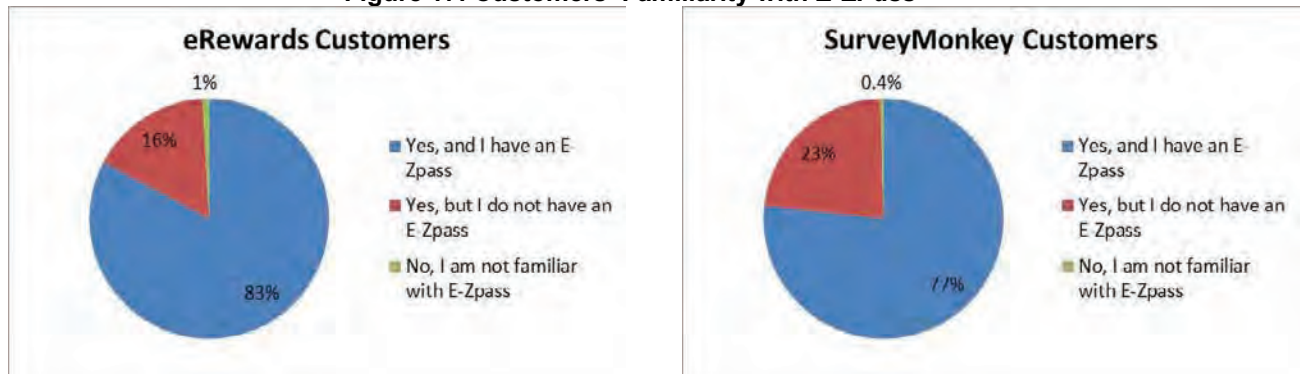
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## Are you familiar with *E-ZPass*? If you do not have an *E-ZPass*, why not?

Customers were asked if they are familiar with *E-ZPass* and if they have *E-ZPass*. As Figure 17 shows, almost all customers are familiar with *E-ZPass*, and the vast majority stated that they have it. Those who do not have *E-ZPass* were asked to select all the reasons why not (see Figure 18). For both surveys, the majority of non-*E-ZPass* customers stated that they do not use toll facilities often enough to get *E-ZPass*. Other reasons chosen by many customers were that they have privacy concerns, don't like automatic credit card charges, and that they do not like the idea of prepaying for tolls. Other reasons customers specified were that they were afraid that *E-ZPass* would be error-prone, they wanted to keep toll collector jobs, or they do not own a vehicle.

Figure 17: Customers' Familiarity with *E-ZPass*



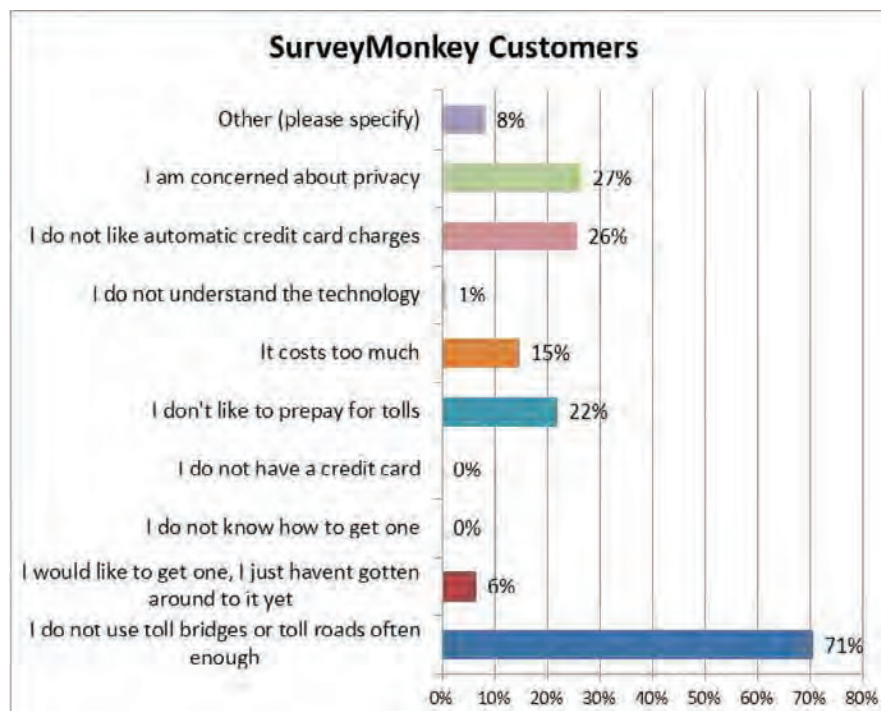
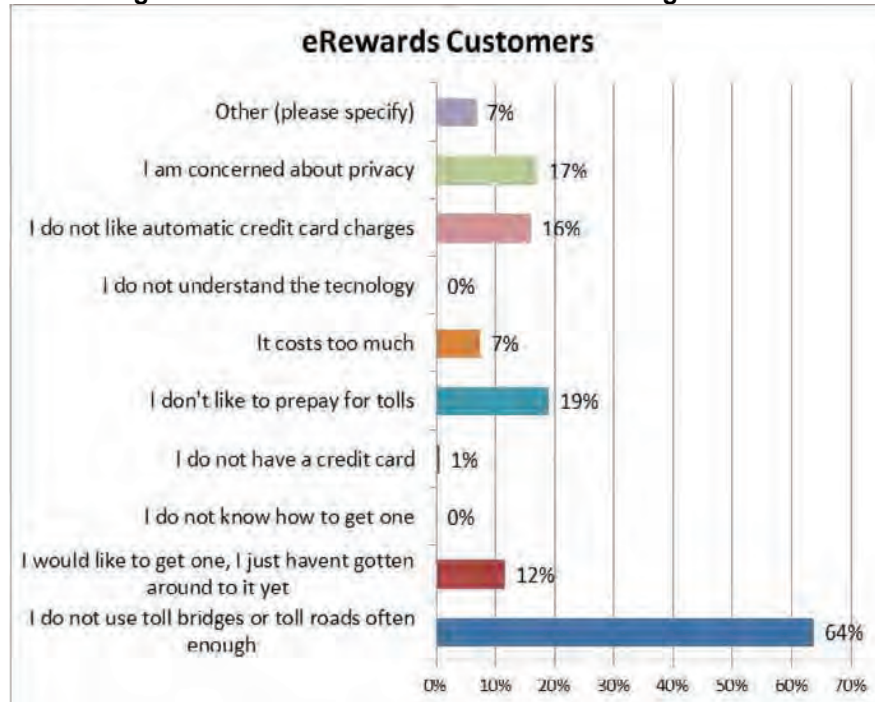


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**Figure 18: Customers' Reasons for Not Having E-ZPass**



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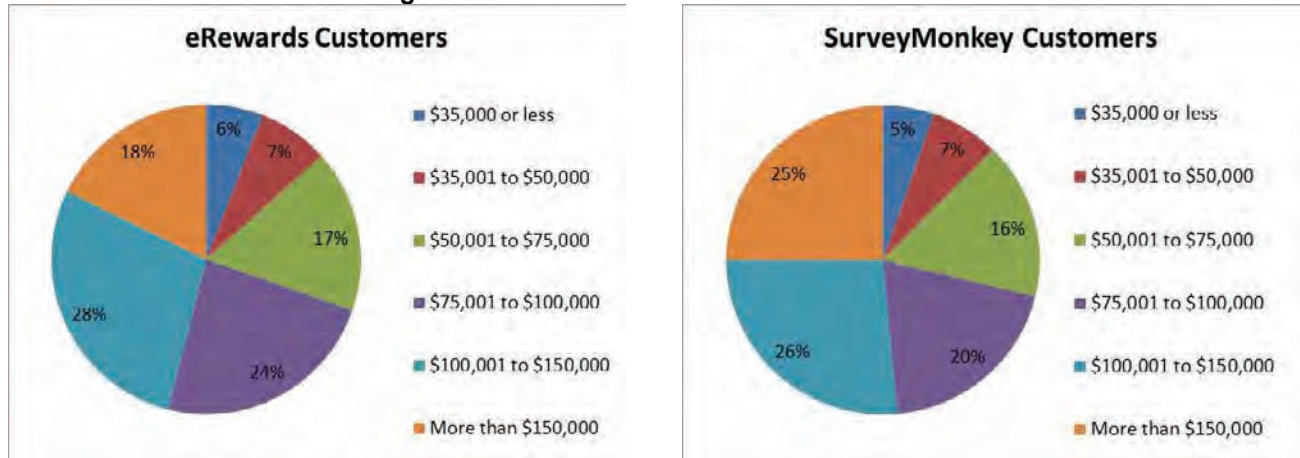
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## What is your annual household income?

Figure 19 graphs the household income of customers who took each survey. Those who preferred not to answer this question have been excluded from the resulting graphics.

**Figure 19: Customers' Household Income**





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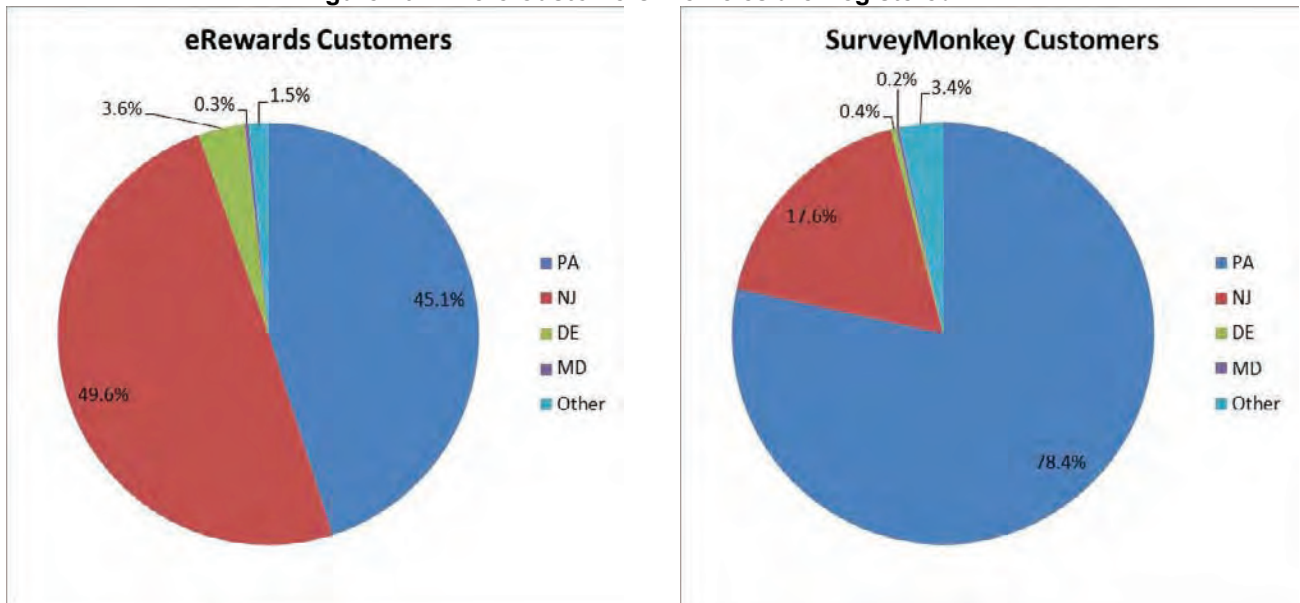
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## In what state is your vehicle registered?

Figure 20 shows the state of registration of each customer's vehicle. There are some small differences between this and Figure 6 (residence of customers), signifying that a person's state of residence does not always match the state on their license plate. Also, there is a greater share of customers in the "Other" category for state of vehicle registration. Some of these are due to car rentals.

**Figure 20: Where Customers' Vehicles are Registered**



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## Online Customer Characteristic Survey Results – Expanded to Total Trips

While the previous section presented the raw data from the surveys, some of the customer responses, in order to be effectively used in our traffic and revenue modeling, need to be expanded to represent total trips across the Bridge. This expansion was achieved using the customer trip frequency profile.

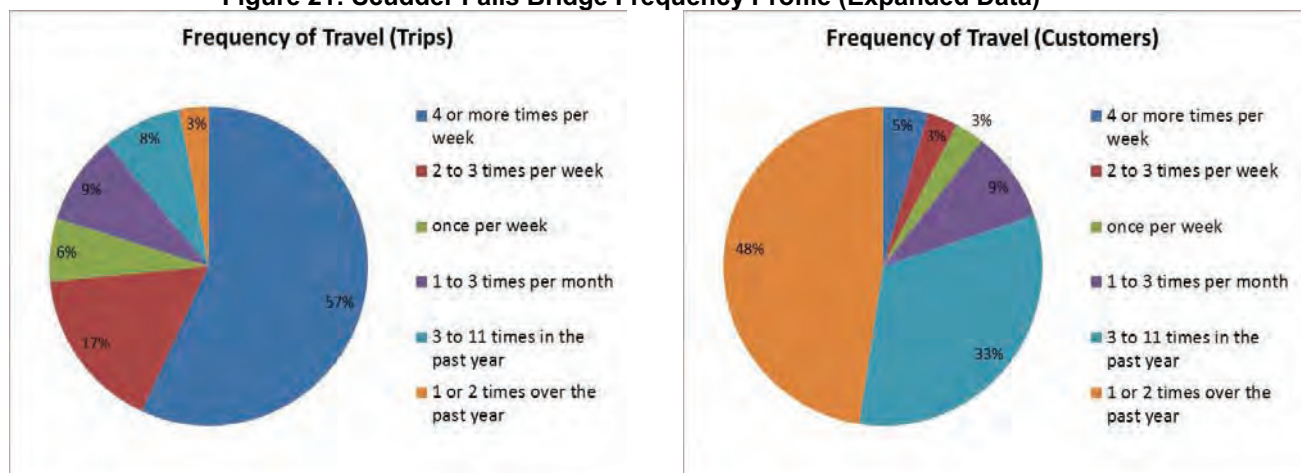
### **Trip Frequency**

Jacobs developed the frequency profile by taking the following steps:

- Each SurveyMonkey response to the frequency question was assumed to represent one trip, as the survey captured travelers across the bridge for nearly one month.
- The eRewards survey, since it was not advertised to people crossing the bridge, represented customers. Factors were applied to turn each customer (survey response) into trips. This is detailed in the paragraph following Figure 21.
- Because the SurveyMonkey responses were biased towards frequent users who saw the survey advertisements multiple times, and the eRewards respondents tended to be more infrequent users, the frequency profiles between the two surveys differed somewhat. We felt that by combining the eRewards and SurveyMonkey frequency data with equal weight, we would remove most of this bias.

Figure 21 represents the overall adjusted frequencies of trips and customers. As seen from these results, 5 percent of customers who travel four or more times a week across the Scudder Falls Bridge make 57 percent of the trips. The 48 percent of customers who cross the bridge once or twice a year make only 3 percent of the trips.

**Figure 21: Scudder Falls Bridge Frequency Profile (Expanded Data)**



The remaining expanded data charts shown in this section apply the trip frequency of each customer in order to turn customers into trips. For example, if a customer takes one trip per week across the bridge, this represents 52 trips per year. A customer who takes 4 or more trips per week

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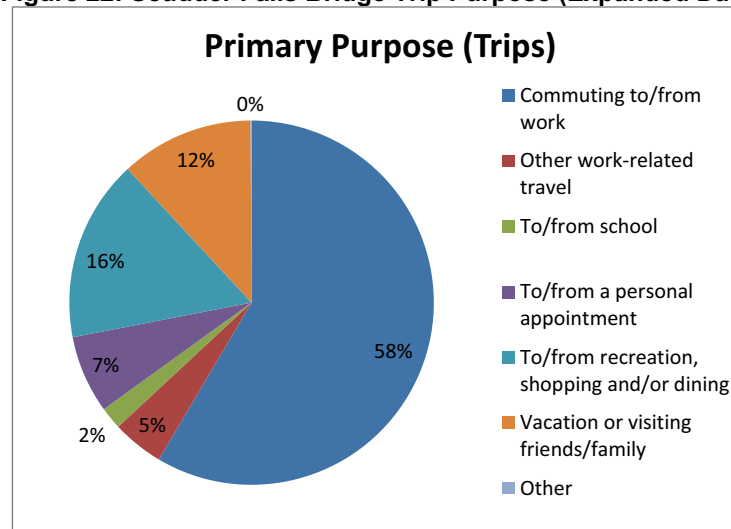
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makes about 300 trips per year. A customer who states they traveled over the bridge one or two times over the past year was assumed to make, on average, 1.5 trips per year. Therefore the survey results had to be expanded using the appropriate factors to represent trips. It is important to expand customer results to trips because a trip represents a potential *toll transaction*, and we would like to know if this *toll transaction* will be made by someone who has E-ZPass (rather than know the general population that has E-ZPass), or if a potential video toll transaction will be made by someone who travels frequently (and therefore receives one toll invoice with multiple transactions) or very infrequently (and receives one toll invoice with only one transaction on it). This is significant data that we incorporated into our forecasting models and estimates of video toll collection costs.

## Trip Purpose

Figure 22 shows survey customer data expanded to represent southbound total trips across the Bridge in terms of trip purpose. The expanded data shows that almost two-thirds of the trips (58 percent plus 5 percent) on the Bridge are for commuting or work-related travel. Only 2 percent of the trips are made for school, and the remaining one-third of trips on the Bridge are for more discretionary travel, such as personal trips, shopping, or vacation.

**Figure 22: Scudder Falls Bridge Trip Purpose (Expanded Data)**



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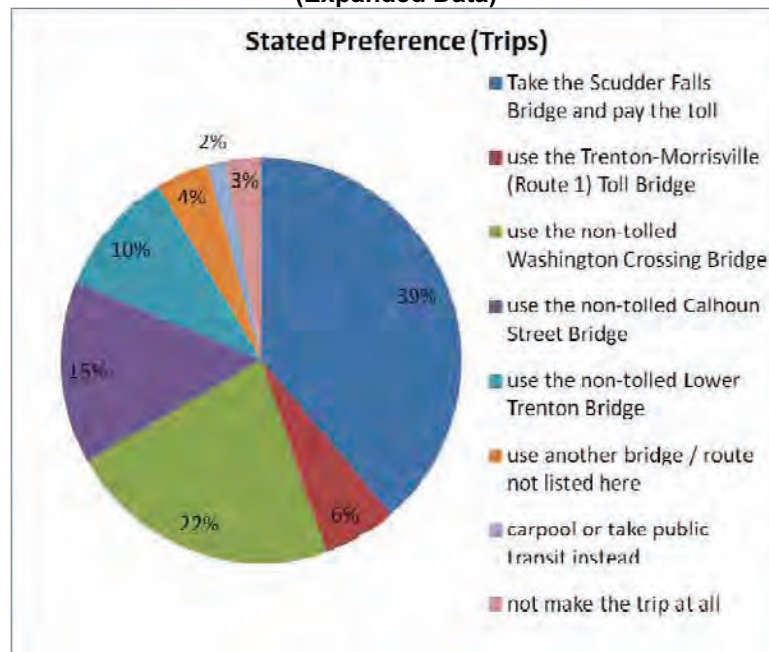
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## Stated Preference Survey Question (What would you do if...?)

As mentioned previously, customers were asked what they would do if they were to make the same trip but with a southbound toll on the Scudder Falls Bridge that is similar to the toll on the Trenton-Morrisville (Route 1) Bridge. From a *customer* standpoint, a majority of the eRewards customers (56 percent) stated that they would stay on the Scudder Falls Bridge and pay the toll, while only 36 percent of SurveyMonkey respondents said they would; most of them stated that they would move to a non-tolled bridge. However, on a total trip (expanded data) basis, 39 percent of the trips would stay on the Bridge after implementation of tolling, with 6 percent using other tolled Trenton-Morrisville Bridge, 50 percent switching to non-tolled bridges, and 5 percent changing travel patterns.

As mentioned previously, the results of this particular question – and stated preference data in general - should be looked at with a note of caution as many users of a currently-free bridge would be biased against tolling it. The answers to this question were used only to inform Jacobs' analyses and have not been used directly.

**Figure 23: Stated Preference if the Scudder Falls Bridge were Tolled (Expanded Data)**



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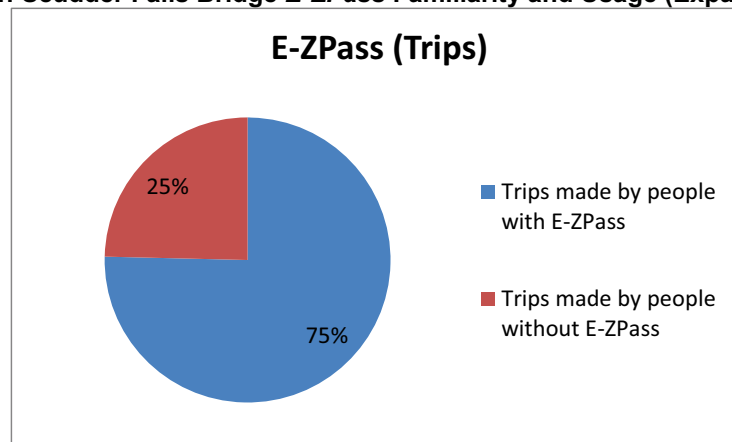
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## ***E-ZPass* Familiarity and Ownership**

Figure 24 shows customer data expanded to percent *E-ZPass* trips. Customers for this online survey were asked if they are familiar with *E-ZPass* and if they have *E-ZPass*. As may be seen in the Figure, according to the data, three-quarters of the trips would be made by *E-ZPass* customers. However, it must be noted that as these surveys were administered and completed online, the results are somewhat skewed to the more tech-savvy person, who would in fact be more likely to have and use *E-ZPass* than would a non-tech-savvy person. As such, one should keep in mind while looking at these data that the answers noted herein would be on the high side of the range of *E-ZPass* usage.

**Figure 24: Scudder Falls Bridge *E-ZPass* Familiarity and Usage (Expanded Data)**



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## **Scudder Falls Bridge Customer Characteristic Online Surveys**



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## Scudder Falls Bridge Driver Survey

The Scudder Falls Bridge carries I-95 across the Delaware River between New Jersey and Pennsylvania. It is DRJTBC's most heavily used non-tolled bridge.

*This survey seeks feedback/input from people who traveled across this bridge in the past year. Please take a few minutes to answer the following questions. Your responses will aid in future transportation planning.*

Your participation is very much appreciated!

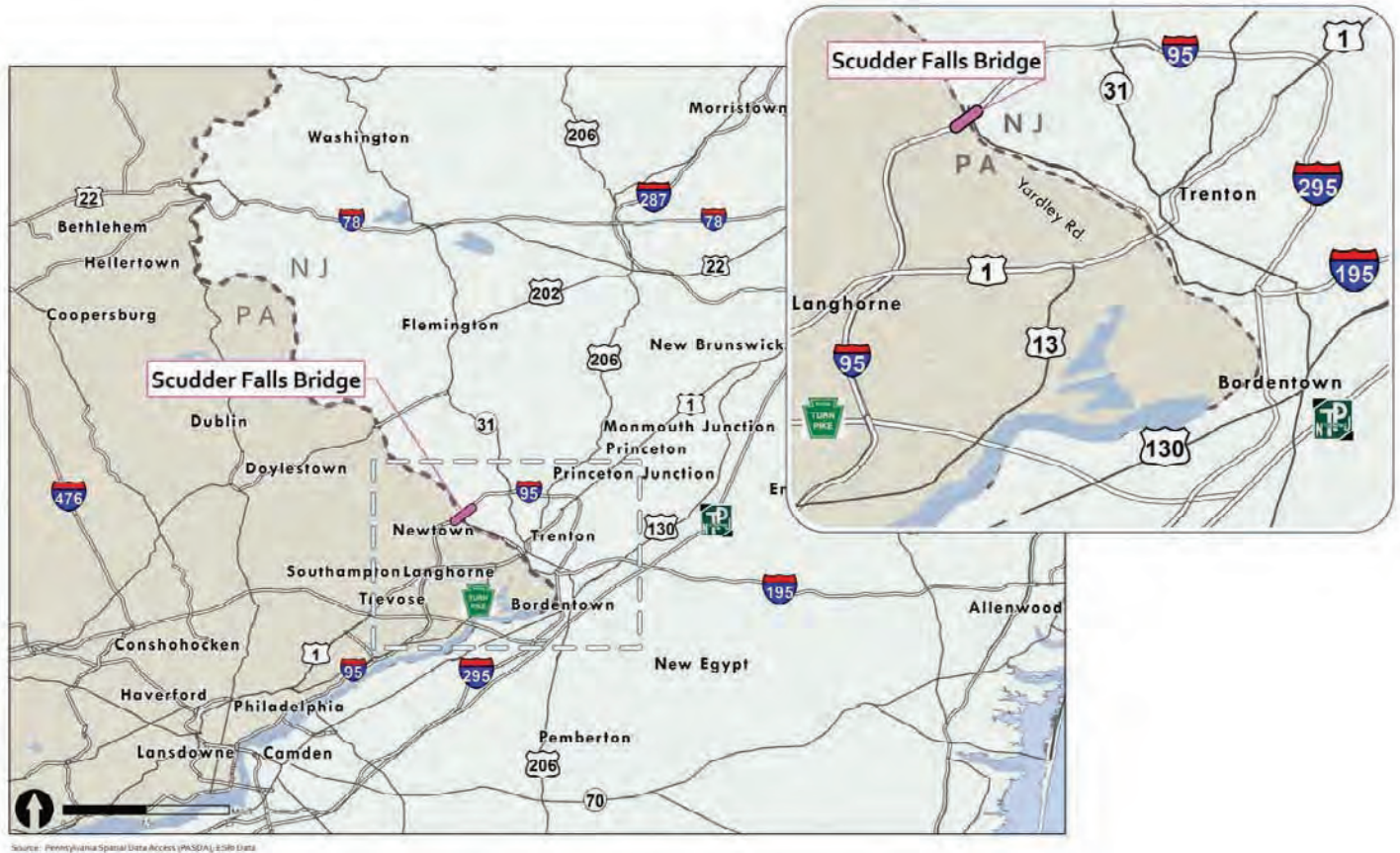
Below are a photo of the Scudder Falls Bridge and a map of its location northwest of Trenton.



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## 1. Do you currently have a valid driver's license?

- Yes
- No \*go to Disqualification page\*



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## **2. What is your city, state, and zip code of residence?**

- **City/Town:** \*Blank text box\*
- **State:** \*Drop Down\*
- **ZIP:** \*Blank text box\*

## **3. How often have you driven across the Scudder Falls Bridge over the past year, in the southbound direction (traveling west from New Jersey to Pennsylvania)?**

- 4 or more times per week
- 2 to 3 times per week
- Once per week
- 1 to 3 times per month
- 3 to 11 times in the past year
- 1 or 2 times over the past year
- I have not traveled southbound (Pennsylvania-bound) across this bridge in the past year \*go to Disqualification page\*

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For the next set of questions, we are going to ask you about your **most recent southbound (traveling west from New Jersey to Pennsylvania) trip** across the Scudder Falls Bridge.

**4. What was the primary purpose of your most recent southbound trip across the Scudder Falls Bridge?**

- *Commuting to/from work*
- *Other work-related travel*
- *To/from school*
- *To/from a personal appointment*
- *To/from recreation, shopping and/or dining*
- *Vacation or visiting friends/family*
- *Other (please specify)      \*Blank text box\**

**5. What day / time of day did you take this trip?**

- *On a Saturday*
- *On a Sunday*
- *On a weekday between midnight and 6:00 AM*
- *On a weekday between 6:00 AM and 10:00 AM*
- *On a weekday between 10:00 AM and 3:00 PM*
- *On a weekday between 3:00 PM and 7:00 PM*
- *On a weekday between 7:00 PM and midnight*

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**6. What type of vehicle were you driving for this trip?**

- *Private car, SUV, or motorcycle*
- *Small commercial truck (2-3 axles)*
- *Large commercial truck (4 or more axles)*
- *Other (please specify)*      \*Blank text box\*

**7. Where did this trip begin? Please be as specific as possible.**

- **Street, intersection, or nearest landmark:** \*Blank text box, answer not required\*
- **City:** \*Blank text box\*
- **State:** \*Drop Down\*
- **Zip (if known):** \*Blank text box, answer not required\*

**8. Where did this trip end? Please be as specific as possible; answer should be different than the previous response.**

- **Street, intersection, or nearest landmark:** \*Blank text box, answer not required\*
- **City:** \*Blank text box\*
- **State:** \*Drop Down\*
- **Zip (if known):** \*Blank text box, answer not required\*

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**9. What was your total approximate travel distance (in one direction) for this trip?**

- 10 miles or less
- 11 to 20 miles
- 21 to 30 miles
- 31 to 50 miles
- More than 50 miles

**10. What was your total approximate travel time (in one direction) for this trip?**

- Less than 15 minutes
- 15 minutes to 30 minutes
- 31 minutes to 45 minutes
- 46 minutes to 1 hour
- 1 hour to 2 hours
- More than 2 hours

*The Scudder Falls Bridge is going to be replaced with a new crossing that will have an additional through lane in each direction. The project also will involve significant improvements along I-95 and at the adjoining interchanges in New Jersey and Pennsylvania.*

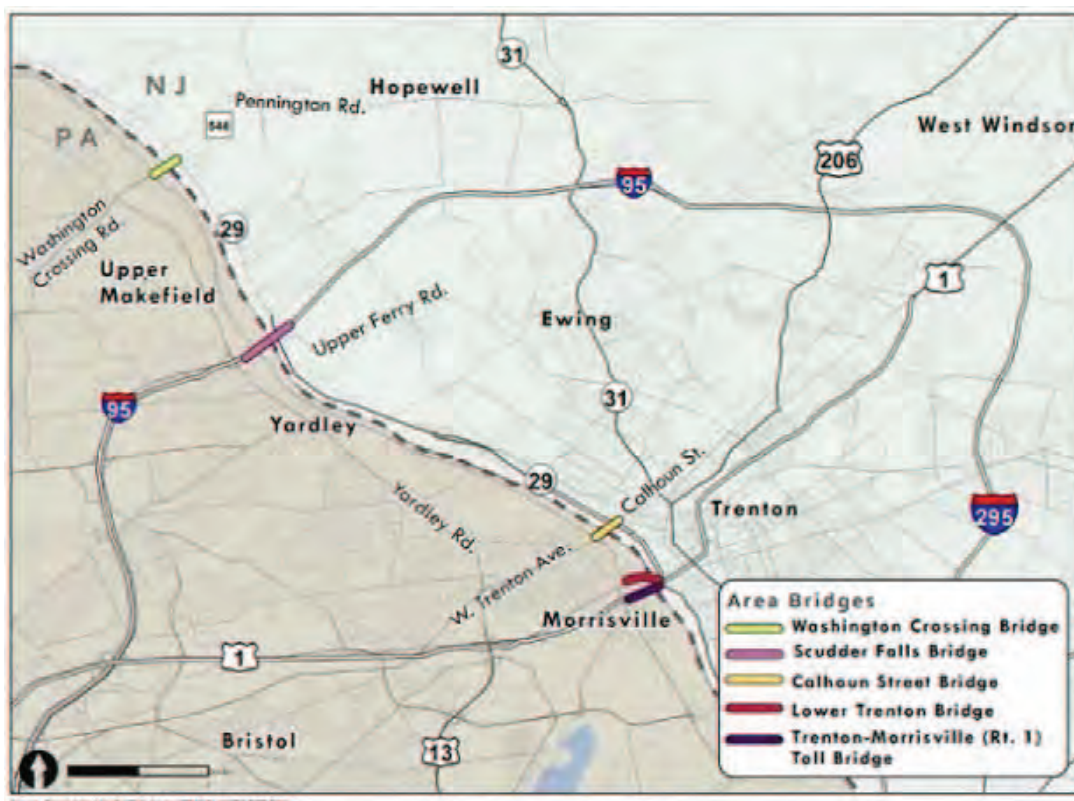
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**11. If this new Scudder Falls Bridge had the same Pennsylvania-bound toll as the Trenton-Morrisville Route 1 Toll Bridge, what would you do when you wanted to make this trip again across the Delaware River? (Refer to the map below.)**

- *I would still take the Scudder Falls Bridge and pay the toll*
- *I would use the Trenton-Morrisville (Route 1) Toll Bridge*
- *I would use the non-tolled Washington Crossing Bridge*
- *I would use the non-tolled Calhoun Street Bridge (aka “Trenton City Bridge”)*
- *I would use the non-tolled Lower Trenton Bridge (aka “Trenton Makes Bridge”)*
- *I would use another bridge / route not listed here*
- *I would carpool or take public transit instead*
- *I would not make the trip at all*



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## **12. Are you familiar with E-ZPass?**

- *Yes, and I have an E-ZPass* \*Skip to Question 14\*
- *Yes, but I do not have an E-ZPass* \*Go to next question\*
- *No, I am not familiar with E-ZPass* \*Skip to Question 14\*

## **13. Why do you not have an E-ZPass? (check all that apply)**

- *I do not use toll bridges or toll roads often enough.*
- *I would like to get one, I just have not gotten around to it yet.*
- *I do not know how to get one.*
- *I do not have a credit card.*
- *I do not like to prepay for tolls.*
- *It costs too much.*
- *I do not understand the technology.*
- *I do not like automatic credit card charges.*
- *I am concerned about privacy.*
- *Other (please specify)* \*Blank text box\*

## **14. What is your annual household income?**

- *\$35,000 or less*
- *\$35,001 to \$50,000*
- *\$50,001 to \$75,000*
- *\$75,001 to \$100,000*
- *\$100,001 to \$150,000*
- *More than \$150,000*
- *Prefer not to answer*

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## **15. In what state is your vehicle registered?**

*\*Drop down list of states\**

*\*Final Page for people who completed the survey:\**

The Delaware River Joint Toll Bridge Commission thanks you for your participation in this important travel survey. Your responses will aid in future transportation planning.

*\*Disqualification Page:\**

Sorry, you do not meet the criteria for this travel survey. The Delaware River Joint Toll Bridge Commission thanks you for your interest.

**Scudder Falls Bridge**  
**Annual Traffic and Revenue Details**



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**Scudders Falls Bridge**  
Revenue Build Up Detail  
*Approved Toll Scenario*

<u>Vehicle Type</u>	<u>Payment Type</u>	<u>Discount/Full Price</u>	<u>2019</u>	<u>2020</u>	<u>2021</u>	<u>2022</u>	<u>2023</u>	<u>2024</u>	<u>2025</u>	<u>2026</u>
<b>Annual SFB Transactions</b>	<b>Total Vehicles</b>		<b>5,881,646</b>	<b>10,208,327</b>	<b>10,302,201</b>	<b>10,389,241</b>	<b>10,471,662</b>	<b>10,550,401</b>	<b>10,626,479</b>	<b>10,700,667</b>
Total Vehicles	Annual Growth Rate			73.56%	0.92%	0.84%	0.79%	0.75%	0.72%	0.70%
Annual Transactions	E-ZPass	Commuter	1,716,744	3,146,515	3,258,121	3,347,359	3,419,756	3,479,477	3,529,667	3,572,697
Passenger Vehicles		Full Price	2,421,696	4,438,576	4,596,011	4,721,894	4,824,018	4,908,263	4,979,063	5,039,763
	Toll-by-Plate		1,359,225	1,954,356	1,769,676	1,632,063	1,529,963	1,454,657	1,399,574	1,359,753
	<i>Total Passenger Vehicles</i>		<i>5,497,665</i>	<i>9,539,447</i>	<i>9,623,808</i>	<i>9,701,317</i>	<i>9,773,737</i>	<i>9,842,398</i>	<i>9,908,304</i>	<i>9,972,212</i>
Annual Transactions	E-ZPass	Off Peak	11,655	21,550	22,488	23,284	23,987	24,611	25,175	25,696
2 Axle Commercial Vehs		Peak	88,808	164,206	171,352	177,415	182,772	187,524	191,825	195,792
	Toll-by-Plate		35,980	52,191	47,626	44,265	41,843	40,118	38,922	38,132
	<i>Total 2 Axle Commercial Vehicles</i>		<i>136,443</i>	<i>237,947</i>	<i>241,467</i>	<i>244,963</i>	<i>248,603</i>	<i>252,252</i>	<i>255,922</i>	<i>259,620</i>
Annual Transactions	E-ZPass	Off Peak	47,383	83,994	85,924	87,690	89,390	91,004	92,557	94,068
3+ Axle Commercial Vehs		Peak	154,474	273,827	280,120	285,878	291,420	296,681	301,744	306,673
	Toll-by-Plate		45,681	73,112	70,881	69,393	68,513	68,066	67,952	68,094
	<i>Total 3+ Axle Commercial Vehicles</i>		<i>247,538</i>	<i>430,933</i>	<i>436,926</i>	<i>442,961</i>	<i>449,322</i>	<i>455,751</i>	<i>462,253</i>	<i>468,835</i>
<b>Annual SFB Toll Revenue</b>	<b>Total Toll Revenue (Collected)</b>		<b>\$10,059,044</b>	<b>\$19,124,748</b>	<b>\$19,308,400</b>	<b>\$19,492,788</b>	<b>\$19,683,647</b>	<b>\$19,875,881</b>	<b>\$20,069,669</b>	<b>\$20,265,164</b>
Total Vehicle Rev	Growth Rate			90.12%	0.96%	0.95%	0.98%	0.98%	0.97%	0.97%
Annual Toll Revenue	E-ZPass	Commuter	\$1,325,195	\$2,414,002	\$2,492,593	\$2,555,711	\$2,607,181	\$2,649,887	\$2,686,004	\$2,717,174
Passenger Vehicle Rev		Full Price	\$3,115,605	\$5,675,450	\$5,860,220	\$6,008,615	\$6,129,624	\$6,230,028	\$6,314,941	\$6,388,223
	Toll-by-Plate		\$967,034	\$2,433,281	\$2,203,344	\$2,032,008	\$1,904,887	\$1,811,128	\$1,742,546	\$1,692,967
	<i>Total Passenger Vehicle Revenue</i>		<i>\$5,407,834</i>	<i>\$10,522,732</i>	<i>\$10,556,157</i>	<i>\$10,596,335</i>	<i>\$10,641,693</i>	<i>\$10,691,043</i>	<i>\$10,743,492</i>	<i>\$10,798,365</i>
Annual Toll Revenue	E-ZPass	Off Peak	\$75,113	\$138,428	\$144,226	\$149,157	\$153,532	\$157,425	\$160,961	\$164,233
2 Axle Commercial Veh Rev		Peak	\$635,926	\$1,171,963	\$1,221,047	\$1,262,795	\$1,299,830	\$1,332,792	\$1,362,726	\$1,390,430
	Toll-by-Plate		\$84,158	\$213,630	\$194,947	\$181,186	\$171,275	\$164,211	\$159,318	\$156,084
	<i>Total 2 Axle Commercial Vehicle Revenue</i>		<i>\$795,197</i>	<i>\$1,524,021</i>	<i>\$1,560,220</i>	<i>\$1,593,138</i>	<i>\$1,624,637</i>	<i>\$1,654,428</i>	<i>\$1,683,005</i>	<i>\$1,710,747</i>
Annual Toll Revenue	E-ZPass	Off Peak	\$778,930	\$1,376,223	\$1,405,640	\$1,432,887	\$1,459,427	\$1,484,849	\$1,509,492	\$1,533,617
3+ Axle Commercial Veh Rev		Peak	\$2,820,666	\$4,983,586	\$5,090,110	\$5,188,777	\$5,284,884	\$5,376,942	\$5,466,181	\$5,553,540
	Toll-by-Plate		\$256,416	\$718,185	\$696,273	\$681,651	\$673,007	\$668,619	\$667,499	\$668,896
	<i>Total 3+ Axle Commercial Vehicle Revenue</i>		<i>\$3,856,012</i>	<i>\$7,077,995</i>	<i>\$7,192,023</i>	<i>\$7,303,315</i>	<i>\$7,417,318</i>	<i>\$7,530,410</i>	<i>\$7,643,172</i>	<i>\$7,756,053</i>
<b>Annual SFB Net Revenue</b>	Toll Revenue Collected		\$10,059,044	\$19,124,748	\$19,308,400	\$19,492,788	\$19,683,647	\$19,875,881	\$20,069,669	\$20,265,164
	Late Fee Revenue		\$869,989	\$2,198,634	\$1,996,974	\$1,846,967	\$1,736,030	\$1,654,525	\$1,595,245	\$1,552,752
	ETC Transaction Costs		-\$504,439	-\$913,964	-\$942,026	-\$965,031	-\$984,352	-\$1,000,824	-\$1,015,161	-\$1,027,903
	Toll-by-Plate Toll Collection Costs		<u>-\$1,911,735</u>	<u>-\$2,802,747</u>	<u>-\$2,545,393</u>	<u>-\$2,353,942</u>	<u>-\$2,212,333</u>	<u>-\$2,108,274</u>	<u>-\$2,032,569</u>	<u>-\$1,978,278</u>
	<b>Net Revenue</b>		<b>\$8,512,858</b>	<b>\$17,606,671</b>	<b>\$17,817,956</b>	<b>\$18,020,782</b>	<b>\$18,222,992</b>	<b>\$18,421,308</b>	<b>\$18,617,184</b>	<b>\$18,811,735</b>
<b>Effects on T+R at Trenton-Morrisville Bridge</b>										
Change in AADT at TMB due to toll increases and diversion from SFB			1,805	1,761	1,751	1,743	1,740	1,736	1,744	1,750
Additional TMB revenue due to toll increases and diversion from SFB			<b>\$944,829</b>	<b>\$1,613,707</b>	<b>\$1,618,911</b>	<b>\$1,627,376</b>	<b>\$1,639,062</b>	<b>\$1,652,725</b>	<b>\$1,667,943</b>	<b>\$1,684,399</b>

Notes: Tolling assumed to begin June 1, 2019. There is a 3-month lag in Toll-by-Plate toll collection in 2019.

**SCUDDER FALLS BRIDGE TRAFFIC AND REVENUE DETAILS**

Year	2019	2020	2021	2022	2023	2024	2025	2026
<b>Toll Rates</b>								
E-ZPass Car Toll Rate	\$ 1.25	\$ 1.25	\$ 1.25	\$ 1.25	\$ 1.25	\$ 1.25	\$ 1.25	\$ 1.25
E-ZPass Car Commuter Toll Rate	\$ 0.75	\$ 0.75	\$ 0.75	\$ 0.75	\$ 0.75	\$ 0.75	\$ 0.75	\$ 0.75
E-ZPass Light Truck Toll Rate (2-ax 6-tire)	\$ 7.00	\$ 7.00	\$ 7.00	\$ 7.00	\$ 7.00	\$ 7.00	\$ 7.00	\$ 7.00
E-ZPass Heavy Truck Toll Rate (per axle)	\$ 4.25	\$ 4.25	\$ 4.25	\$ 4.25	\$ 4.25	\$ 4.25	\$ 4.25	\$ 4.25
Toll-by-Plate Car Toll Rate	\$ 2.60	\$ 2.60	\$ 2.60	\$ 2.60	\$ 2.60	\$ 2.60	\$ 2.60	\$ 2.60
Toll-by-Plate Light Truck Toll Rate (2-ax 6-tire)	\$ 8.35	\$ 8.35	\$ 8.35	\$ 8.35	\$ 8.35	\$ 8.35	\$ 8.35	\$ 8.35
Toll-by-Plate Heavy Truck Toll Rate (per axle)	\$ 4.75	\$ 4.75	\$ 4.75	\$ 4.75	\$ 4.75	\$ 4.75	\$ 4.75	\$ 4.75
<b>Scudder Falls Bridge Toll Transactions</b>								
Annual Toll Transactions	10,082,821	10,208,327	10,302,201	10,389,241	10,471,662	10,550,401	10,626,479	10,700,667
Car AADT	25,821	26,064	26,367	26,579	26,777	26,892	27,146	27,321
Truck AADT	1,803	1,828	1,859	1,885	1,912	1,934	1,968	1,996
<b>Toll Diversion</b>								
Car	-16%	-15%	-15%	-15%	-15%	-15%	-15%	-15%
Truck	-34%	-34%	-34%	-34%	-34%	-34%	-34%	-34%
Total Diversion	-17%	-17%	-17%	-17%	-16%	-16%	-16%	-16%
<b>Collectable Toll Revenue and Overall Toll Collection Costs</b>								
E-ZPass Toll Revenue (Collected)	\$ 8,751,436	\$ 15,759,652	\$ 16,213,837	\$ 16,597,943	\$ 16,934,478	\$ 17,231,923	\$ 17,500,305	\$ 17,747,218
Toll-by-Plate Revenue (Collected)	\$ 1,307,608	\$ 3,365,096	\$ 3,094,563	\$ 2,894,845	\$ 2,749,169	\$ 2,643,958	\$ 2,569,363	\$ 2,517,947
Total Toll Revenue (Collected)	\$ 10,059,044	\$ 19,124,748	\$ 19,308,400	\$ 19,492,788	\$ 19,683,647	\$ 19,875,881	\$ 20,069,669	\$ 20,265,164
Late / Violation Fee Revenue (Collected)	\$ 869,989	\$ 2,198,634	\$ 1,996,974	\$ 1,846,967	\$ 1,736,030	\$ 1,654,525	\$ 1,595,245	\$ 1,552,752
E-ZPass Transaction Costs	\$ (504,439)	\$ (913,964)	\$ (942,026)	\$ (965,031)	\$ (984,352)	\$ (1,000,824)	\$ (1,015,161)	\$ (1,027,903)
Toll-by-Plate Toll Collection Costs	\$ (1,911,735)	\$ (2,802,747)	\$ (2,545,393)	\$ (2,353,942)	\$ (2,212,333)	\$ (2,108,274)	\$ (2,032,569)	\$ (1,978,278)
<b>SFB Net Revenue (sum of Toll Rev, Fee Rev, and Toll Collection Costs)</b>	<b>\$ 8,512,858</b>	<b>\$ 17,606,671</b>	<b>\$ 17,817,956</b>	<b>\$ 18,020,782</b>	<b>\$ 18,222,992</b>	<b>\$ 18,421,308</b>	<b>\$ 18,617,184</b>	<b>\$ 18,811,735</b>
<b>Toll-by-Plate Toll Collection Costs</b>								
Cost of Invoicing	\$ (405,236)	\$ (584,898)	\$ (531,055)	\$ (490,994)	\$ (461,355)	\$ (439,570)	\$ (423,713)	\$ (412,334)
Toll-by-Plate Account Costs	\$ (1,066,931)	\$ (1,539,957)	\$ (1,398,195)	\$ (1,292,721)	\$ (1,214,687)	\$ (1,157,328)	\$ (1,115,579)	\$ (1,085,621)
Non-EZ Trx Costs (excl iToll)	\$ (400,403)	\$ (577,823)	\$ (524,567)	\$ (484,941)	\$ (455,620)	\$ (434,064)	\$ (418,372)	\$ (407,107)
Credit Card Fees (Toll-by-Plate Only)	\$ (39,166)	\$ (100,069)	\$ (91,576)	\$ (85,286)	\$ (80,671)	\$ (77,313)	\$ (74,905)	\$ (73,216)
<b>Toll-by-Plate Toll Collection Costs</b>	<b>\$ (1,911,735)</b>	<b>\$ (2,802,747)</b>	<b>\$ (2,545,393)</b>	<b>\$ (2,353,942)</b>	<b>\$ (2,212,333)</b>	<b>\$ (2,108,274)</b>	<b>\$ (2,032,569)</b>	<b>\$ (1,978,278)</b>
Cost per Toll-by-Plate Transaction	\$ 1.33	\$ 1.35	\$ 1.35	\$ 1.35	\$ 1.35	\$ 1.35	\$ 1.35	\$ 1.35
Cost per ETC Transaction	\$ 0.08	\$ 0.08	\$ 0.08	\$ 0.08	\$ 0.08	\$ 0.08	\$ 0.08	\$ 0.08
Incremental Cost of Toll-by-Plate per Transaction	\$ 1.25	\$ 1.27	\$ 1.27	\$ 1.27	\$ 1.27	\$ 1.27	\$ 1.27	\$ 1.27
<b>Additional Cost to Collect Toll-by-Plate Tolls (deducting cost of traditional E-ZPass Transaction)</b>	<b>\$ (1,803,092)</b>	<b>\$ (2,645,940)</b>	<b>\$ (2,403,024)</b>	<b>\$ (2,222,315)</b>	<b>\$ (2,088,653)</b>	<b>\$ (1,990,436)</b>	<b>\$ (1,918,982)</b>	<b>\$ (1,867,743)</b>
<b>Uncollectable Toll-by-Plate Toll Revenue (due to bad images, E-ZPass - calculated using E-ZPass Toll Rate)</b>								
Uncollectable Toll-by-Plate Toll Revenue	\$ (1,052,536)	\$ (1,554,197)	\$ (1,434,218)	\$ (1,346,253)	\$ (1,282,800)	\$ (1,237,549)	\$ (1,206,067)	\$ (1,185,015)
Uncollectable Toll-by-Plate Revenue considered in evaluation of Toll-by-Plate Premium?	No	No	No	No	No	No	No	No
% of Total Transactions that are Uncollectable	10%	8%	7%	7%	6%	6%	6%	6%
% of Car Image-Based Trans that are Uncollectable (incl iTolls)	41%	41%	41%	41%	41%	41%	41%	41%
% Truck Car Image-Based Trans that are Uncollectable (incl iTolls)	42%	42%	42%	42%	42%	42%	42%	42%
<b>Potential Additional Revenue and traffic changes at Trenton Morrisville due to Toll Diversion from Scudder Falls</b>								
Revenue Gain from Traffic switch to TM	\$ 944,829	\$ 1,613,707	\$ 1,618,911	\$ 1,627,376	\$ 1,639,062	\$ 1,652,725	\$ 1,667,943	\$ 1,684,399
AADT Switched from SF to TM - Total	1,805	1,761	1,751	1,743	1,740	1,736	1,744	1,750
AADT Switched from SF to TM - Cars	1,567	1,520	1,507	1,496	1,489	1,482	1,487	1,489
AADT Switched from SF to TM - Trucks	238	241	244	247	251	253	257	261
Total Revenue Gain at TM	\$ 944,829	\$ 1,613,707	\$ 1,618,911	\$ 1,627,376	\$ 1,639,062	\$ 1,652,725	\$ 1,667,943	\$ 1,684,399
Total AADT Change at TM	1,805	1,761	1,751	1,743	1,740	1,736	1,744	1,750

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**APPENDIX B**

**FINANCIAL STATEMENTS OF THE COMMISSION FOR THE YEARS ENDED  
DECEMBER 31, 2015 AND 2014**

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DELAWARE RIVER JOINT TOLL  
BRIDGE COMMISSION

REPORT ON AUDIT OF FINANCIAL STATEMENTS  
AND SUPPLEMENTAL INFORMATION  
FOR THE YEARS ENDED DECEMBER 31, 2015 AND 2014

DELAWARE RIVER JOINT TOLL BRIDGE COMMISSION  
FOR THE YEARS ENDED DECEMBER 31, 2015 AND 2014

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DELAWARE RIVER JOINT TOLL BRIDGE COMMISSION  
Roster of Officials  
As of December 31, 2015

**New Jersey Commissioners**

	<b><u>Position</u></b>
David R. DeGerolamo	Chairman
Yuki Moore Laurenti	Secretary-Treasurer
Garrett Leonard Van Vliet	Member
Geoffrey S. Stanley	Member
Michael Lavery	Member

**Pennsylvania Commissioners**

	<b><u>Position</u></b>
Wadud Ahmad	Vice Chairman
Melissa Starace	Member
Pamela Janvey	Member
Daniel Grace	Member
John Siptroth	Member

**Other Officials**

	<b><u>Position</u></b>
Joseph J. Resta	Executive Director
Arnold J. Conoline, Jr.	Chief Administrative Officer
Vacant	Chief Financial Officer
Sean M. Hill	Deputy Executive Director Operations
Joseph F. Donnelly	Deputy Executive Director Communications
Roy W. Little	Chief Engineer
Stephen Cathcart	Comptroller

# **Zelenkofske Axelrod LLC**

## **INDEPENDENT AUDITOR'S REPORT**

Board of Commissioners  
Delaware River Joint Toll Bridge Commission  
New Hope, Pennsylvania 18938

### ***Report on the Financial Statements***

We have audited the accompanying statements of net position of the Delaware River Joint Toll Bridge Commission as of December 31, 2015 and 2014, and the related statements of revenues, expenses, and changes in net position and cash flows, together with the financial statements of the fiduciary fund for the years then ended, and the related notes to the financial statements, which collectively comprise the Delaware River Joint Toll Bridge Commission's basic financial statements as listed in the table of contents.

### ***Management's Responsibility for the Financial Statements***

Management is responsible for the preparation and fair presentation of these financial statements in accordance with accounting principles generally accepted in the United States of America; this includes the design, implementation, and maintenance of internal control relevant to the preparation and fair presentation of financial statements that are free from material misstatement, whether due to fraud or error.

### ***Auditors' Responsibility***

Our responsibility is to express opinions on these financial statements based on our audits. We conducted our audits in accordance with auditing standards generally accepted in the United States of America. Those standards require that we plan and perform the audit to obtain reasonable assurance about whether the financial statements are free of material misstatement.

An audit involves performing procedures to obtain audit evidence about the amounts and disclosures in the financial statements. The procedures selected depend on the auditors' judgment, including the assessment of the risks of material misstatement of the financial statements, whether due to fraud or error. In making those risk assessments, the auditors consider internal control relevant to the Delaware River Joint Toll Bridge Commission's preparation and fair presentation of the financial statements in order to design audit procedures that are appropriate in the circumstances, but not for the purpose of expressing an opinion on the effectiveness of the Delaware River Joint Toll Bridge Commission's internal control. Accordingly, we express no such opinion. An audit includes evaluating the appropriateness of accounting policies used and the reasonableness of significant accounting estimates made by management, as well as evaluating the overall presentation of the financial statements.

We believe that the audit evidence we have obtained is sufficient and appropriate to provide a basis for our audit opinions.

### ***Opinions***

In our opinion, the financial statements referred to above present fairly, in all material respects, the financial position of the Delaware River Joint Toll Bridge Commission as of December 31, 2015 and 2014, and its changes in financial position and its cash flows and the net position and changes in net position of the fiduciary fund thereof for the years then ended, in accordance with accounting principles generally accepted in the United States of America.

<b><i>Harrisburg</i></b>	<b><i>Philadelphia</i></b>	<b><i>Pittsburgh</i></b>	<b><i>Greensburg</i></b>
830 Sir Thomas Court, Suite 100 Harrisburg, PA 17109 717.561.9200 Fax 717.561.9202	2370 York Road, Suite A-5 Jamison, PA 18929 215.918.2277 Fax 215.918.2302	3800 McKnight E. Drive, Suite 3805 Pittsburgh, PA 15237 412.367.7102 Fax 412.367.7103	210 Tollgate Hill Rd Greensburg, PA 15601 724.834.2151 Fax 724.834.5969

# **Zelenkofske Axelrod LLC**

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Board of Commissioners  
Delaware River Joint Toll Bridge Commission

## ***Adoption of Governmental Accounting Standards Board (GASB) Statements***

As described in Note 1 to the financial statements, in 2015 Delaware River Joint Toll Bridge Commission adopted the provisions of Governmental Accounting Standards Board's Statement No. 68, "Accounting and Financial Reporting for Pensions – an amendment of GASB Statement No. 25," and Statement No. 71, "Pension Transition for Contributions made subsequent to the measurement date –an amendment of GASB Statement No. 68."

## ***Other Matters***

### ***Required Supplementary Information***

Accounting principles generally accepted in the United States of America require that the management's discussion and analysis, schedule of funding progress for the retiree health benefits plan, schedule of Commission's proportionate share of net pension liability and schedule of Commission's contributions as listed in the table of contents, be presented to supplement the basic financial statements. Such information, although not a part of the basic financial statements, is required by the Governmental Accounting Standards Board, who considers it to be an essential part of financial reporting for placing the basic financial statements in an appropriate operational, economic, or historical context. We have applied certain limited procedures to the required supplementary information in accordance with auditing standards generally accepted in the United States of America, which consisted of inquiries of management about the methods of preparing the information and comparing the information for consistency with management's responses to our inquiries, the basic financial statements, and other knowledge we obtained during our audit of the basic financial statements. We do not express an opinion or provide any assurance on the information because of the limited procedures do not provide us with sufficient evidence to express an opinion or provide any assurance.

## ***Other Information***

Our audit was conducted for the purpose of forming opinions on the financial statements that collectively comprise the Delaware River Joint Toll Bridge Commission's basic financial statements. The accompanying other supplementary schedules, as listed in the table of contents are presented for purposes of additional analysis and are not a required part of the basic financial statements.

The other supplementary schedules are the responsibility of management and were derived from and relate directly to the underlying accounting and other records used to prepare the basic financial statements. Such information has been subjected to the auditing procedures applied in the audit of the basic financial statements and certain additional procedures, including comparing and reconciling such information directly to the underlying accounting and other records used to prepare the basic financial statements or to the basic financial statements themselves, and other additional procedures in accordance with auditing standards generally accepted in the United States of America. In our opinion, the information is fairly stated in all material respects in relation to the basic financial statements as a whole.

  
ZELENKOFSCHE AXELROD LLC

Jamison, Pennsylvania  
June 17, 2016

**DELAWARE RIVER JOINT TOLL BRIDGE COMMISSION  
MANAGEMENT'S DISCUSSION AND ANALYSIS  
DECEMBER 31, 2015 AND 2014**

As management of the Delaware River Joint Toll Bridge Commission (the "Commission"), we offer readers of the Commission's financial statements this narrative overview and analysis of the financial activities of the Commission's fiscal years ended December 31, 2015, 2014 and 2013. We encourage readers to consider the information presented here in conjunction with the audited financial statements and supplementary information as a whole.

### **Financial Highlights**

Operating revenues for the Commission totaled \$125,893,506 for the year ended December 31, 2015, which represents an increase of 3.2% over the previous year. The increase in 2015 is primarily the result of a 4.2% increase in toll traffic.

In 2015, net operating income totaled \$35,944,879 and Change in Net Position totaled a negative \$17,429,035 as compared to \$38,976,036 and a positive \$24,977,680 respectively, for 2014. Total Operating Expense increased \$6,912,419 due to primarily to increases in Depreciation Expense and Staff Cost. An \$837,500 or 6.00% reductions in Non-Operating expenses was driven by a (-\$1,115,533 or -7.5%) decrease in Bond Interest expense.

### **Overview of the Financial Statements**

This discussion and analysis is intended to serve as an introduction to the Commission's financial statements, which are comprised of the financial statements, the notes to the financial statements, and certain required supplementary information. The supplementary information includes schedules of operations, expenses, cash and equivalent balances, investments, receivables, capital assets and traffic and revenues.

### **Basic Financial Statements**

The basic financial statements are designed to provide readers with a broad understanding of the Commission's finances, in a manner similar to that provided in the financial statements of private-sector businesses.

The Statements of Net Position present information on the Commission's assets, deferred outflows of resources, and liabilities at December 31, 2015 and 2014, with the difference between the two reported as net position. At December 31, 2015, the Commission's net position equaled \$414,630,990 as compared to \$432,060,025 in 2014, a decrease of 4.0%. This decrease in net assets is the result of the GASB 68 adoption which resulted in an increase in liabilities of \$46,534,536 for Net Pension Liability offset by a \$5,195,098 net increase in Deferred Outflows for Change in Pension Assumptions. This amount is offset somewhat by an \$11.9 million decrease in Revenue Bonds Payable.

The Statements of Revenues, Expenses and Changes in Net Position present information showing how net position changed during the fiscal year. All changes in net position are reported as soon as the underlying event occurs, regardless of the timing of related cash flows. Thus, revenues and expenses are reported in these statements for some items that will not result in cash flows until future periods or for items that have resulted in cash flows in previous periods.

**DELAWARE RIVER JOINT TOLL BRIDGE COMMISSION  
MANAGEMENT'S DISCUSSION AND ANALYSIS  
DECEMBER 31, 2015 AND 2014**

**Notes to Financial Statements**

The notes provide additional information that is essential to a full understanding of the data provided in the basic financial presentation.

**Other Information**

In addition to the basic financial statements and accompanying notes, this report also presents certain supplementary information concerning expenses, investments, and traffic.

**Financial Analysis**

Commission assets, consisting of restricted and unrestricted assets, totaled \$790,526,807 (an increase of \$11,161,947 or 1.43%). Unrestricted current assets, totaling \$69,790,698 (an increase of \$25,924,803 or 59.1%), represents cash in the operating accounts, cash equivalent investments, and E-ZPass toll receivables. These unrestricted current assets will be used to pay current expenses, to pay current debt service, or to be transferred to the General Reserve Fund. Additionally, the Commission has non-current unrestricted assets totaling \$148,750,269 (a decrease of \$14,158,376 or 8.7%) representing investments in the General Reserve Fund.

Restricted assets, which are restricted under the Trust Indenture and are mainly investments designated for the Commission's bond requirements totaling \$23,515,714, are broken into two categories. Restricted current assets of \$16,782,482 increased 25.4% from the previous year end as a result of changes in investment security maturity terms. Total non-current restricted assets, comprised of investments and prepaid bond insurance totaled \$6,733,232, which represents a decrease of \$12,877,986, or 65.7%, from the 2014 year-end balance. These changes in restricted assets are the result of changes in investment maturity dates. Net capital assets totaling \$530,181,660, a .7% increase over 2014, consist of land, infrastructure, and equipment with an original value of \$897,515,687 less accumulated depreciation of \$367,334,027. The land and infrastructure consist of twenty bridge crossings and related access roads spread over a 140-mile-long stretch of the Delaware River extending from Trenton, New Jersey north to Milford, Pennsylvania/Montague, New Jersey.

At December 31, 2015, the Commission had current and non-current liabilities of \$418,434,071, with the majority related to its series 2005A, and 2007A, 2007B and 2012A, 2012B and 2015 bond issues, which represents a decrease of \$11,867,167 from 2014. The increase in liabilities is solely the result of a new \$46,534,536 non-current liability for Net Pension Liability.

The purpose of the 2005A issue, which was partially refunded by the 2012A and B issues, was for the refunding of \$32,165,000 of the 2003 series bonds issued to finance the first portion of the Commission's ten-year capital program, and the financing of the Commission's \$40 million CAI program.

The purpose of the 2007A, bond issue, which was partially defeased in 2013 with residual bond funds, and the 2007B issue were to provide funds to pay for the cost of capital improvements related to the system, to make deposits into the debt service reserve fund and to fund capitalized interest, to pay insurance and cost of issuance associated with the series.

**DELAWARE RIVER JOINT TOLL BRIDGE COMMISSION  
MANAGEMENT'S DISCUSSION AND ANALYSIS  
DECEMBER 31, 2015 AND 2014**

**Financial Analysis (Continued)**

The purpose of the 2012A series was to provide funds to refund \$57,300,000 principal amount of the outstanding 2003 issue and \$30,795,000 principal amount of the 2005A issue, and to pay the cost of issuance associated with the Series 2012A bonds. The purpose of the 2012B bonds was to provide funds to refund \$19,475,000 principal amount of Commission outstanding 2003 bonds and to pay the cost of issue associated with the Series 2012B bonds. The 2012B bonds were issued as taxable bonds in order to capture savings from low market rates by refunding portions of the 2003 bonds that had refunded Series 1992 bonds and therefore could not be refunded again as tax-exempt bonds. The 2005A, 2012A and 2012B bonds collectively completely refunded the Series 2003 bonds.

The purpose of the 2015 series was to provide funds to advance refund \$86,765,000 principal amount of the outstanding 2007A issue, to fund deposits in the Debt Service Reserve Fund, and to pay the cost of issuance associated with the Series 2015 bonds.

The following table contains condensed financial information derived from the December 31, 2015, 2014, and 2013 financial statements of the Commission:

<u>Net Position</u>	<u>2015</u>	<u>2014</u>	<u>2013</u>
<b>Assets:</b>			
Current and Other Assets	\$ 280,345,147	\$ 252,673,143	\$ 250,296,041
Capital Assets	530,181,660	526,691,717	527,566,046
Total Assets	<u>790,526,807</u>	<u>779,364,860</u>	<u>777,862,087</u>
<b>Deferred Outflows of Resources:</b>			
Accumulated Decrease in Fair Value of			
Hedging Derivatives	26,388,000	26,098,050	17,689,194
Deferred Loss on Refunding	10,955,156	5,164,912	5,777,862
Changes in Pension Assumptions	5,898,578	-	-
Total Deferred Outflows	<u>43,241,734</u>	<u>31,262,962</u>	<u>23,467,056</u>
<b>Liabilities</b>			
Bond Indebtedness	327,317,418	339,184,585	354,840,327
Other Liabilities	91,116,653	39,383,212	39,406,471
Total Liabilities	<u>418,434,071</u>	<u>378,567,797</u>	<u>394,246,798</u>
<b>Deferred Inflows of Resources:</b>			
Changes in Pension Proportions	703,480	-	-
Total Deferred Inflows	<u>703,480</u>	<u>-</u>	<u>-</u>
<b>Net Position:</b>			
Net Invested in Capital Assets	236,020,418	230,181,341	233,955,581
Restricted	13,318,120	15,590,283	17,576,072
Unrestricted	165,292,454	186,268,401	155,550,692
Total Net Position	<u>\$ 414,630,990</u>	<u>\$ 432,060,025</u>	<u>\$ 407,082,345</u>
<b><u>Change in Net Position</u></b>			
Operating Revenues	\$ 125,893,506	\$ 122,012,244	\$ 120,128,146
Operating Expenses	(55,830,306)	(50,685,530)	(48,016,419)
Other Post Employment Benefits	(5,692,298)	(5,692,298)	(6,701,565)
Depreciation	(28,426,023)	(26,658,380)	(26,457,076)
Total Operating Expenses	<u>(89,948,627)</u>	<u>(83,036,208)</u>	<u>(81,175,060)</u>
Net Operating Income	35,944,879	38,976,036	38,953,086
Nonoperating Revenue	722,107	580,942	657,907
Nonoperating Expenses	(13,882,963)	(14,579,298)	(22,627,347)
Change in Net Position	22,784,023	24,977,680	16,983,646
Net Position - January 1	432,060,025	407,082,345	390,098,699
Cumulative Change	(40,213,058)	-	-
Net Position as Restated	<u>391,846,967</u>	<u>-</u>	<u>-</u>
Net Position - December 31	<u>\$ 414,630,990</u>	<u>\$ 432,060,025</u>	<u>\$ 407,082,345</u>

**DELAWARE RIVER JOINT TOLL BRIDGE COMMISSION  
MANAGEMENT'S DISCUSSION AND ANALYSIS  
DECEMBER 31, 2015 AND 2014**

**Financial Analysis (Continued)**

The following table contains condensed financial information of cash flows derived from the December 31, 2015, 2014, and 2013 financial statements of the Commission:

<u>Summary of Cash Flows</u>	<u>2015</u>	<u>2014</u>	<u>2013</u>
Cash Flows from Operating Activities	\$ 67,129,102	\$ 61,357,017	\$ 61,363,544
Cash Flows from Noncapital Financing Activities	-	(337,749)	(2,676,076)
Cash Flows from Capital and Related Financing Activities	(63,942,442)	(55,146,461)	(103,999,782)
Cash Flows from Investing Activities	<u>27,101,635</u>	<u>6,509,000</u>	<u>966,349</u>
Net Increase (Decrease) in Cash and Cash Equivalents	30,288,295	12,381,807	(44,345,965)
Cash and Cash Equivalents - January 1	<u>47,805,840</u>	<u>35,424,033</u>	<u>79,769,998</u>
Cash and Cash Equivalents - December 31	<u>\$ 78,094,135</u>	<u>\$ 47,805,840</u>	<u>\$ 35,424,033</u>

**Significant Events**

In December 2001, the Commission approved a long-term Capital Improvement Program that provides major bridge rehabilitation, bridge enhancement, and installation of traffic management systems, as well as state-of-the-art bridge security and surveillance.

A toll rate structure with phased increases and discount adjustments was approved by the Commission to fund its Capital Improvement Program for system protection, preservation, management and enhancement of the Commission's infrastructure including twenty bridges, seven toll plazas, and administration and maintenance facilities that it owns, operates and maintains, as well as operating expenses for the Commission.

On July 1, 2011, the Commission increased toll rates on all vehicle classes. Passenger vehicles rates increased 33% from \$.75 to \$1.00. Large commercial vehicles rates increased 23% from \$3.25 to \$4.00 per axle. Two axle commercial vehicles rates increased 30.0 % from \$2.50 to \$3.25 per axle.

The Capital Improvement Program continues to evolve as the need for additional projects are identified, program costs are re-evaluated and the Commission undertakes new initiatives to fund transportation infrastructure programs in bridge host communities.

During 2010, the Commission had four major capital projects become substantially complete; including Washington Crossing Toll Supported Bridge Phase I Rehabilitation, Reiglesville Toll Supported Bridge Rehabilitation, Calhoun Street Toll Supported Bridge Rehabilitation, and Locust Street Bridge Rehabilitation Program along with a number of other smaller projects.

During 2011, the Commission had three major capital projects become substantially complete; including Milford Upper Black Eddy Toll Supported Bridge Rehabilitation, Interstate 78 Open Road Tolling Installation and Delaware River Water Gap Bearing Remediation Deck Survey along with a number of other smaller projects.

During 2012 the Commission had four major projects become substantially complete including the construction of an Open-Road Toll lane at the Delaware Water Gap Toll Plaza, the rehabilitation and repainting of the Delaware Water Gap Toll Bridge, the rehabilitation and overlay of the Riverton-Belvidere Toll-Supported Bridge Approach roadway carrying Water Street in New Jersey, and the Phase 2 Substructure and Scour Protection improvements at eight bridges along with completion of a number of other smaller projects.

**DELAWARE RIVER JOINT TOLL BRIDGE COMMISSION  
MANAGEMENT'S DISCUSSION AND ANALYSIS  
DECEMBER 31, 2015 AND 2014**

**Significant Events (Continued)**

During 2013 and 2014 the Commission had two major projects reach substantial completion. In 2013 the Commission completed the I-78 Toll Bridge PA Approach Paving Improvements. This project included the refurbishing the 2.25 miles of I-78 that it owns in Pennsylvania, access roadways and improvements to bridge decks, joints and approach slabs, including the main river I-78 Toll Bridge. In 2014 the Commission completed the Easton-Phillipsburg (Route 22) Toll Bridge Rehabilitation. This project consisted of full rehabilitation of the main-river bridge, approach roadways, access roadways and overpasses.

During 2015 the Commission had two major projects reach substantial completion. The Commission completed the Trenton Morrisville / Lower Trenton Bridge Approach Improvement project and the Portland Columbia Approach Roadway improvement project.

On September 20, 2007, the Commission issued three series of bonds: Series 2007A, 2007B1, and 2007B2. The 2007A issue was a fixed rate bonds totaling \$134,170,000. The two Series 2007B issues were auction rate securities totaling \$75,000,000 each and were hedged by an interest rate swap issued by two counterparties. In September 2008, the two Series 2007B issues were converted into variable rate securities and are hedged by an interest rate swap issued by two counterparties, and subsequently in May 2011 were converted to a SIFMA Index-Based Mode under direct bond purchase agreements.

On October 11, 2012, the Commission issued two series of bonds: Series 2012A and 2012B. The 2012A issue was a fixed rate, tax exempt bonds issue totaling \$77,145,000. The Series 2012B issue was a fixed rate, taxable bond totaling \$20,665,000.

The Commission redeemed \$31,905,000 of 2007A bonds on October 28<sup>th</sup>, 2013. The 2007A bonds maturing in 2035 with a 5.0% coupon were redeemed using unspent 2007A bond proceeds, and in addition funds were deposited to make the interest payments due on the bonds from 2014 through 2017, when the bonds will be defeased on their call date.

On March 17, 2015, the Commission issued Bond Series 2015 of bonds to advance refund the majority of Series 2007A. The bonds were fixed rate with a maturity date through 2036.

Currently, the Commission has seven different bond issues outstanding; (2003 fully refunded), 2005A, 2007A, 2007B1, 2007B2, 2012A, 2012B and 2015. At December 31, 2015 and 2014, the total outstanding bond balance including premiums is \$327,317,418 and \$339,184,585 respectively. The series 2005A and 2007A are insured by MBIA. The 2015 Series is insured by Build America Mutual Assurance Company. All issues carry a rating of A1 by Moody's and A by Standard & Poor's. On May 2, 2014 Standard & Poor's raised the rating to A with a Stable outlook. On December 4, 2014, Moody's raised the rating to A1 with a Stable outlook. These favorable changes in the Commission's bond rating during 2014 are anticipated to improve the conditions for future capital borrowing.

**Contacting the Commission's Financial Management**

This financial report is designed to provide the citizens, taxpayers and legislators of New Jersey and Pennsylvania, and the users of the Commission's bridges, with a general overview of the Commission's finances and to demonstrate the Commission's accountability for the revenues that it receives. If you have questions about this report or need additional financial information, contact the Commission at (215) 862-5284, by website at: [www.drjtbc.org](http://www.drjtbc.org), or by mail at:

Delaware River Joint Toll Bridge Commission  
Executive Offices  
2492 River Road  
New Hope, Pennsylvania 18938-8266



## **BASIC FINANCIAL STATEMENTS**

DELAWARE RIVER JOINT TOLL BRIDGE COMMISSION  
STATEMENTS OF NET POSITION  
DECEMBER 31, 2015 AND 2014

	<u>ASSETS</u>	<u>2015</u>	<u>2014</u>
Current Assets			
Unrestricted Assets			
Cash and Cash Equivalents	\$ 61,593,263	\$ 34,672,888	
Accounts Receivable			
E-ZPass and Violations (net of allowance for uncollectible			
of \$11,842,190 for 2015 and \$7,649,900 for 2014)	6,468,576	6,322,768	
Other	224,082	307,748	
Interfund Accounts Receivable			
Fiduciary Fund	622,791	1,859,406	
Prepaid Expenses	881,986	703,085	
Total Unrestricted Assets	<u>69,790,698</u>	<u>43,865,895</u>	
Restricted Assets			
Cash and Cash Equivalents	16,500,872	13,132,952	
Accrued Interest Receivable	281,610	255,937	
Total Restricted Assets	<u>16,782,482</u>	<u>13,388,889</u>	
Total Current Assets	<u>86,573,180</u>	<u>57,254,784</u>	
Noncurrent Assets			
Unrestricted Assets			
Investments	148,750,269	162,908,645	
Total Unrestricted Assets	<u>148,750,269</u>	<u>162,908,645</u>	
Restricted Assets			
Investments	6,140,087	18,432,156	
Prepaid Bond Insurance	593,145	1,179,062	
Total Restricted Assets	<u>6,733,232</u>	<u>19,611,218</u>	
Net Other Postemployment Benefits	<u>18,288,466</u>	<u>12,898,496</u>	
Capital Assets			
Completed (net of accumulated depreciation)	492,005,113	499,856,098	
Improvements in Progress	38,176,547	26,835,619	
Total Capital Assets	<u>530,181,660</u>	<u>526,691,717</u>	
Total Noncurrent Assets	<u>703,953,627</u>	<u>722,110,076</u>	
Total Assets	<u>\$ 790,526,807</u>	<u>\$ 779,364,860</u>	

(Continued)

The notes to the financial statements are an integral part of these statements.

DELAWARE RIVER JOINT TOLL BRIDGE COMMISSION  
STATEMENTS OF NET POSITION (CONTINUED)  
DECEMBER 31, 2015 AND 2014

<u>DEFERRED OUTFLOWS OF RESOURCES</u>	<u>2015</u>	<u>2014</u>
Accumulated Decrease in Fair Value of Hedging Derivatives	\$ 26,388,000	\$ 26,098,050
Deferred Loss on Refunding of Debt	10,955,156	5,164,912
Change in Pension Assumptions	<u>5,898,578</u>	<u>-</u>
Total Deferred Outflows of Resources	<u>43,241,734</u>	<u>31,262,962</u>
<u>LIABILITIES</u>		
Current Liabilities Payable from Unrestricted Assets		
Accounts Payable and Accrued Expenses	11,015,477	5,410,958
E-Zpass Customer Deposits	79,976	80,010
Compensated Absences Payable	120,107	121,508
Retainage Payable	<u>498,030</u>	<u>638,864</u>
Total Current Liabilities Payable from Unrestricted Assets	<u>11,713,590</u>	<u>6,251,340</u>
Current Liabilities Payable from Restricted Assets		
Accrued Interest Payable on Bonds	4,211,434	4,708,662
Bridge System Revenue Bonds Payable	15,155,000	14,975,000
Premium Payment Payable - Derivative Companion Instrument	<u>-</u>	<u>34,346</u>
Total Current Liabilities Payable from Restricted Assets	<u>19,366,434</u>	<u>19,718,008</u>
Noncurrent Liabilities		
Compensated Absences Payable	1,881,672	1,903,621
Bridge System Revenue Bonds Payable	312,162,418	324,209,585
Premium Payment Payable - Derivative Companion Instrument	387,421	387,193
Derivative Instrument - Interest Rate Swaps	26,388,000	26,098,050
Net Pension Liability	<u>46,534,536</u>	<u>-</u>
Total Noncurrent Liabilities	<u>387,354,047</u>	<u>352,598,449</u>
Total Liabilities	<u>418,434,071</u>	<u>378,567,797</u>
<u>DEFERRED INFLOWS OF RESOURCES</u>		
Changes in Pension Proportions	<u>703,480</u>	<u>-</u>
Total Deferred Inflows of Resources	<u>703,480</u>	<u>-</u>
<u>NET POSITION</u>		
Net Investment in Capital Assets	236,020,416	230,181,341
Restricted	13,318,120	15,590,283
Unrestricted	<u>165,292,454</u>	<u>186,288,401</u>
Total Net Position	<u>\$ 414,630,990</u>	<u>\$ 432,060,025</u>

The notes to the financial statements are an integral part of these statements.

DELAWARE RIVER JOINT TOLL BRIDGE COMMISSION  
STATEMENTS OF REVENUES, EXPENSES AND CHANGES IN NET POSITION  
DECEMBER 31, 2015 AND 2014

	<u>2015</u>	<u>2014</u>
<u>OPERATING REVENUES</u>		
Cash Tolls, Net	\$ 26,867,235	\$ 26,814,860
E-Zpass Tolls, Net	97,773,330	93,966,985
Miscellaneous	1,252,941	1,230,399
Total Operating Revenues	<u>125,893,506</u>	<u>122,012,244</u>
<u>OPERATING EXPENSES</u>		
Administration		
Salaries and Wages	4,650,535	4,318,690
Fringe Benefits	3,858,245	2,897,849
Other	3,379,508	3,760,105
Cost of Providing Services		
Toll Bridges		
Salaries and Wages	10,726,121	10,502,817
Fringe Benefits	9,821,108	7,615,123
Other	13,867,991	13,025,382
Toll Supported Bridges		
Salaries and Wages	3,457,165	3,200,360
Fringe Benefits	3,184,733	2,538,893
Other	2,884,900	2,826,311
Other Postemployment Benefits	5,692,298	5,692,298
Depreciation	28,426,023	26,658,380
Total Operating Expenses	<u>89,948,627</u>	<u>83,036,208</u>
Operating Income	<u>35,944,879</u>	<u>38,976,036</u>
<u>NONOPERATING REVENUES (EXPENSES)</u>		
Investment Income	710,981	576,877
Gain on Disposal of Capital Assets	11,126	4,065
Interest Expense		
Interest on Bonds	(13,866,671)	(14,982,204)
Amortization of Deferred Loss on Refunding of Debt	(872,076)	(612,951)
Amortization of Net Premium on Bonds	1,752,920	1,495,741
Amortization of Prepaid Bond Insurance	(897,136)	(142,135)
Compact Authorized Investment Program	-	(337,749)
Total Net Nonoperating Revenue (Expense)	<u>(13,160,856)</u>	<u>(13,998,356)</u>
Change in Net Position	22,784,023	24,977,680
Net Position, January 1	<u>432,060,025</u>	<u>407,082,345</u>
Cumulative change	(40,213,058)	-
Net Position as Restated (See Note 1)	<u>391,846,967</u>	-
Net Position, December 31	<u>\$ 414,630,990</u>	<u>\$ 432,060,025</u>

The notes to the financial statements are an integral part of these statements.

DELAWARE RIVER JOINT TOLL BRIDGE COMMISSION  
STATEMENTS OF CASH FLOWS  
DECEMBER 31, 2015 AND 2014

	<u>2015</u>	<u>2014</u>
<u>CASH FLOWS FROM OPERATING ACTIVITIES</u>		
Receipts from Customers and Users		
Cash Tolls	\$ 26,867,235	\$ 26,814,860
E-Zpass Tolls	97,627,488	93,420,210
Payments for Other Goods or Services	(14,261,704)	(21,983,048)
Payments for Employees Services	(45,677,140)	(37,728,541)
Payments for Interfund Services Provided	1,236,616	(422,298)
Other Receipts	<u>1,336,607</u>	<u>1,255,834</u>
Net Cash Provided by Operating Activities	<u>67,129,102</u>	<u>61,357,017</u>
<u>CASH FLOWS FROM NONCAPITAL FINANCING ACTIVITIES</u>		
Payments for Compact Authorized Investment Program	<u>-</u>	<u>(337,749)</u>
<u>CASH FLOWS FROM CAPITAL AND RELATED FINANCING ACTIVITIES</u>		
Acquisition of Capital Assets	(31,275,484)	(25,157,337)
Proceeds from Sales of Capital Assets	11,126	4,065
Proceeds from Issuance of New Debt	86,505,000	
Payment on Capital Debt Refunding and Extinguishment	(89,187,411)	-
Principal Paid on Capital Debt	(14,975,000)	(14,160,000)
Payment of Capitalized Interest Paid on Debt	(640,481)	(626,714)
Interest Paid on Capital Debt	<u>(14,380,192)</u>	<u>(15,206,475)</u>
Net Cash Used in Capital and Related Financing Activities	<u>(63,942,442)</u>	<u>(55,146,461)</u>
<u>CASH FLOWS FROM INVESTING ACTIVITIES</u>		
Investment Income Received	318,259	1,859,791
Proceeds from Sale of Investments	182,178,456	125,103,470
Payments for Investments	<u>(155,395,080)</u>	<u>(120,454,261)</u>
Net Cash Provided by Investing Activities	<u>27,101,635</u>	<u>6,509,000</u>
Net Increase (Decrease) in Cash and Cash Equivalents	30,288,295	12,381,807
Cash and Cash Equivalents, January 1 (including \$13,132,952 and \$7,933,861 reported as restricted)	<u>47,805,840</u>	<u>35,424,033</u>
Cash and Cash Equivalents, December 31 (including \$16,500,872 and \$13,132,952 reported as restricted)	<u>\$ 78,094,135</u>	<u>\$ 47,805,840</u>

(Continued)

The notes to the financial statements are an integral part of these statements.

DELAWARE RIVER JOINT TOLL BRIDGE COMMISSION  
STATEMENTS OF CASH FLOWS (CONTINUED)  
DECEMBER 31, 2015 AND 2014

	<u>2015</u>	<u>2014</u>
RECONCILIATION OF OPERATING INCOME TO NET CASH PROVIDED BY OPERATING ACTIVITIES		
Operating Income	\$ 35,944,879	\$ 38,976,036
Adjustments to Reconcile Operating Income to Net Cash		
Provided by Operating Activities		
Depreciation	28,426,023	26,658,380
Change in Assets and Liabilities		
(Increase) Decrease in Accounts Receivable		
E-Zpass and Violations	(145,808)	3,644,345
Other	83,666	25,435
(Increase) Decrease in Interfund Accounts Receivable	1,236,615	(422,298)
Increase in Prepaid Expenses	(178,901)	(69,286)
Decrease in Prepaid Bond Insurance	585,917	86,594
(Increase) Decrease Net Other Postemployment Benefits	(5,389,970)	(947,702)
Decrease in Accounts Payable and Accrued Expenses	5,604,519	(2,388,558)
Decrease in Retainage Payable	(140,834)	-
Increase (Decrease) in E-Zpass Customer Deposits	(34)	(4,191,120)
Decrease in Compensated Absences Payable	(23,350)	(14,809)
Increase in Net Pension Liability and Related Pension Deferrals	1,126,380	-
Net Cash Provided by Operating Activities	<u>\$ 67,129,102</u>	<u>\$ 61,357,017</u>
 <u>NONCASH INVESTING, CAPITAL, AND FINANCING ACTIVITIES</u>		
Increase/Decrease in Accumulated Change in Fair Value of Hedging Derivatives		
Resulting from Change in Fair Value	<u>\$ (289,950)</u>	<u>\$ (8,408,856)</u>

The notes to the financial statements are an integral part of these statements.

DELAWARE RIVER JOINT TOLL BRIDGE COMMISSION  
 RETIREE HEALTH BENEFITS PLAN  
 STATEMENTS OF FIDUCIARY NET POSITION  
 DECEMBER 31, 2015 AND 2014

	<u>2015</u>	<u>2014</u>
<u>ASSETS</u>		
Cash and Cash Equivalents	\$ 127,492	\$ 163,221
Investments	<u>75,960,723</u>	<u>69,174,162</u>
Total Assets	<u>76,088,215</u>	<u>69,337,383</u>
<u>LIABILITIES</u>		
Current Liabilities		
Interfund Accounts Payable	<u>622,790</u>	<u>1,859,406</u>
Total Liabilities	<u>622,790</u>	<u>1,859,406</u>
NET POSITION RESTRICTED FOR OTHER POSTEMPLOYMENT BENEFITS	<u>\$ 75,465,425</u>	<u>\$ 67,477,977</u>

The notes to the financial statements are an integral part of these statements.

DELAWARE RIVER JOINT TOLL BRIDGE COMMISSION  
 RETIREE HEALTH BENEFITS PLAN  
 STATEMENTS OF CHANGES IN FIDUCIARY NET POSITION  
 DECEMBER 31, 2015 AND 2014

	<u>2015</u>	<u>2014</u>
<u>ADDITIONS</u>		
Contributions		
Employer	\$ 11,082,269	\$ 6,640,000
Investment Income		
Net Appreciation in Fair Value of Investments	(1,132,959)	1,075,136
Interest	<u>1,441,739</u>	<u>2,487,697</u>
	308,780	3,562,833
Less		
Investment Expense	<u>177,308</u>	<u>157,397</u>
Net Investment Income (Expense)	<u>131,472</u>	<u>3,405,436</u>
Total Additions	11,213,741	10,045,436
<u>DEDUCTIONS</u>		
Benefits	3,205,450	2,667,932
Administrative Expenses	<u>20,843</u>	<u>18,669</u>
Total Deductions	<u>3,226,293</u>	<u>2,686,601</u>
Net Increase	7,987,448	7,358,835
Net Position Restricted for Other Postemployment Benefits		
January 1	<u>67,477,977</u>	<u>60,119,142</u>
December 31	<u>\$ 75,465,425</u>	<u>\$ 67,477,977</u>

The notes to the financial statements are an integral part of these statements.



DELAWARE RIVER JOINT TOLL BRIDGE COMMISSION  
NOTES TO FINANCIAL STATEMENTS  
DECEMBER 31, 2015 AND 2014

NOTE 1      SUMMARY OF SIGNIFICANT ACCOUNTING POLICIES

Reporting Entity

The Delaware River Joint Toll Bridge Commission (the "Commission"), a body corporate and politic, was created in 1934 by a compact, subsequently amended and supplemented, between the Commonwealth of Pennsylvania (the "Commonwealth") and the State of New Jersey (the "State"), with the approval of the Congress of the United States. As a governmental agency, the Commission has no stockholders or equity holders.

The Commission is authorized and empowered, with federal government approval required in certain cases, to acquire, construct, administer, operate and maintain such bridges as the Commission deems necessary to advance the interests of the Commonwealth and the State, to issue bonds and other obligations, and to make payment of interest thereon. The Capital Compact provides that Commission indebtedness shall not be deemed to constitute a debt or liability or a pledge of the faith and credit of the Commonwealth or the State or any subdivision thereof.

In 1985, a proposed compact change was enacted and approved by the State that was similar to the legislation that had been enacted by the Commonwealth in 1984. This proposed compact change received the required consent of the Congress of the United States in early 1987. The compact, as approved, required the Commission to refinance its bonded indebtedness. In addition, the Commission was obligated to assume full financial responsibility for the cost of operating and maintaining the toll supported bridges that were financed by appropriations from the Commonwealth and the State; accordingly, on July 1, 1987, the Commission defeased all of its then outstanding bonded indebtedness. Due to this compact change, the accompanying financial statements include the operations of the toll-supported bridges.

The Commission has jurisdiction for vehicular and pedestrian traffic across the Delaware River between the Commonwealth and the State from the Philadelphia / Bucks County line to the New York state line. The Commission's duties include the maintenance and operation of all the bridges over the Delaware River within its jurisdiction, with the following exceptions: the New Jersey-Pennsylvania Turnpike Bridge and the Burlington-Bristol Toll Bridge, both south of Trenton; and the Dingman's Ferry Toll Bridge, which is north of the Delaware Water Gap.

Measurement Focus, Fund Accounting

The financial statements of the Commission have been prepared in conformity with accounting principles generally accepted in the United States of America, as applied to governmental units. The Governmental Accounting Standards Board ("GASB") is the accepted standard setting body for establishing governmental accounting and financial reporting principles.

As part of the Commission's financial statements, two funds are maintained: a proprietary fund (enterprise fund) and a fiduciary fund (pension and other employee benefit trust fund). The focus of enterprise funds is the measurement of economic resources, that is, the determination of operating income, changes in net position (or cost recovery), financial position, and cash flows. The focus of fiduciary funds is also the measurement of economic resources.

DELAWARE RIVER JOINT TOLL BRIDGE COMMISSION  
NOTES TO FINANCIAL STATEMENTS (CONTINUED)  
DECEMBER 31, 2015 AND 2014

NOTE 1      SUMMARY OF SIGNIFICANT ACCOUNTING POLICIES (CONTINUED)

Basis of Accounting

The enterprise fund is maintained on the accrual basis of accounting. Enterprise funds account for activities (i) that are financed with debt that is secured solely by a pledge of the net revenues from fees and charges of the activity; or (ii) that are required by law or regulations that the activity's cost of providing services, including capital cost (such as depreciation or debt service), be recovered with fees and charges, rather than with taxes or similar revenues; or (iii) that the pricing policies of the activity establish fees and charges designed to recover its costs, including capital costs (such as depreciation or debt service). Under this method, revenues are recorded when earned and expenses are recorded when the related liability is incurred.

The fiduciary fund is maintained on the accrual basis of accounting, except for recognition of certain liabilities of postemployment healthcare plans. The fiduciary fund accounts for the recording and accumulation of other postemployment benefit resources, which are held in trust for the exclusive benefit of the Commission's retirees.

*Revenues - Exchange and Non-Exchange Transactions* - Revenue resulting from exchange transactions, in which each party gives and receives essentially equal value, is recorded on the accrual basis when the exchange takes place. Bridge tolls are recognized as revenue when services are provided.

Non-exchange transactions, which are when the Commission receives value without directly giving equal value in return, include grants, contributed capital, and donations. Revenue from grants, contributed capital, and donations is recognized in the year in which all eligibility requirements have been satisfied. Eligibility requirements include timing requirements, which specify the year when the resources are required to be used or the year when use is first permitted, matching requirements in which the Commission must provide local resources to be used for a specified purpose, and expenditure requirements in which the resources are provided to the Commission on a reimbursement basis.

*Expenses / Expenditures* - On the accrual basis of accounting, expenses are recognized at the time they are incurred.

Budgets and Budgetary Accounting

The Commission must adopt an annual budget in accordance with Section 702 of the Trust Agreement between the Commission and the TD Bank / Pennsylvania, National Association, as Trustee. Section 702 requires the Commission to adopt the final operating budget no later than December 31<sup>st</sup> for the ensuing calendar year. The budget is adopted on the modified accrual basis of accounting with provisions for cash payments for bond principal. The Commission may not incur in a year any amount in excess of the amounts provided for current expenses in the annual budget.

If for any reason the Commission shall not have adopted the annual operating budget before the first day of any year, the budget for the preceding year, shall, until the adoption of the annual operating budget, be deemed to be in force and shall be treated as the annual operating budget under the Section 702.

DELAWARE RIVER JOINT TOLL BRIDGE COMMISSION  
NOTES TO FINANCIAL STATEMENTS (CONTINUED)  
DECEMBER 31, 2015 AND 2014

NOTE 1      SUMMARY OF SIGNIFICANT ACCOUNTING POLICIES (CONTINUED)

Budgets and Budgetary Accounting (Continued)

The Commission records encumbrances. An encumbrance represents a commitment related to unperformed contracts for goods or services. The issuance of a purchase order or the signing of a contract would create an encumbrance. The encumbrance does not represent an expenditure for the period, only a commitment to expend resources. At year-end, the accounting records are adjusted to record only expenses in accordance with accounting principles generally accepted in the United States of America.

Cash, Cash Equivalents, and Investments

Cash and cash equivalents include petty cash, change funds, cash in banks, certificates of deposit, and all highly liquid investments with a maturity of three months or less at the time of purchase, and are stated at cost plus accrued interest. Such is the definition of cash and cash equivalents used in the statement of cash flows. All other investments are stated at fair value.

The Commission's depository and investment options are subject to the provisions and restrictions of the Trust Indenture dated January 1, 2003 between the Commission and the TD Bank / Pennsylvania, National Association, as Trustee. Section 601 of the Trust Agreement establishes the requirements for the security of deposits of the Commission.

**General Objectives** - The primary objectives, in priority of order of investment activities shall be safety, liquidity, and yield:

*Safety* - Safety of principal is the foremost objective of the investment program. Investments shall be undertaken in a manner that seeks to ensure the preservation of capital in the overall portfolio. The objective will be to mitigate credit risk and interest rate risk.

*Liquidity* - The investment portfolio shall remain sufficiently liquid to meet all requirements that may be reasonably anticipated. This is accomplished by structuring the portfolio so that securities mature concurrent with cash needs to meet anticipated demands (static liquidity). Furthermore, since all possible cash demands cannot be anticipated, the portfolio should consist largely of securities with active secondary or resale markets (dynamic liquidity).

*Yield* - The investment portfolio shall be designed with the objective of attaining a market rate of return throughout budgetary and economic cycles, taking into account the investment risk constraints and liquidity needs. Return on investment is of secondary importance compared to the safety and liquidity objectives described above. The core of investments is limited to relatively low risk securities in anticipation of earning a fair return relative to the risk being assumed. Securities shall not be sold prior to maturity with the following exceptions:

1. A security with declining credit may be sold early to minimize loss of principal.
2. A security swap would improve the quality, yield, or target duration in the portfolio.
3. Liquidity needs of the portfolio require that the securities be sold.

DELAWARE RIVER JOINT TOLL BRIDGE COMMISSION  
NOTES TO FINANCIAL STATEMENTS (CONTINUED)  
DECEMBER 31, 2015 AND 2014

NOTE 1      SUMMARY OF SIGNIFICANT ACCOUNTING POLICIES (CONTINUED)

Cash, Cash Equivalents, and Investments (Continued)

Suitable and Authorized Investments - The following investments are allowed under the Trust Indenture:

1. Direct obligations of the United States of America and securities fully and unconditionally guaranteed as to the timely payment of principal and interest by the United States of America, provided, that the full faith and credit of the United States of America must be pledged to any such direct obligation or guarantee ("Direct Obligations").
2. Direct obligations and fully guaranteed certificates of beneficial interest of the Export-Import Bank of the United States; consolidated debt obligations and letter of credit-backed issues of the Federal Home Loan Banks; participation certificates and senior debt obligations of the Home Loan Mortgage Corporation (for purposes of this definition, "FHLMCs"); debentures of the Federal Housing Administration, senior debt obligations of the Federal National Mortgage Association (for purposes of this definition, "FNMAs"); participation certificates of the General Services Administration; guaranteed participation certificates and guaranteed pool certificates of the Small Business Administration; debt obligations and letter of credit-backed issues of the Student Loan Marketing Association; local authority bonds of the U.S. Department of Housing & Urban Development; guaranteed Title XI financing of the U.S. Maritime Administration; guaranteed transit bonds of the Washington Metropolitan Area Transit Authority; and Resolution Funding Corporation securities.
3. Direct obligations of any state of the United States of America or any subdivision or agency thereof whose unsecured, uninsured and under guaranteed general obligation debt is rated, at the time of purchase, "A" or better by Moody's Investors Services and "A" or better by Standard & Poor's Corporation, or any obligation fully and unconditionally guaranteed by any state, subdivision or agency whose uninsured and unguaranteed general obligation debt is rated, at the time of purchase, "A" or better by Moody's Investors Service and "A" or better by Standard & Poor's Corporation.
4. Commercial paper (having original maturities of not more than 270 days) rated, at the time of purchase, "P-1" by Moody's Investor's Services and "A" or better by Standard & Poor's Corporation.
5. Federal Funds, unsecured certificates of deposit, time deposit or bankers acceptance (in each case having maturities of not more than 365 days) of any domestic bank including a branch office of a foreign bank which branch office is located in the United States, provided legal options are received to the effect that full and timely payment of such deposit or similar obligation is enforceable against the principal office or any branch of such bank, which, at the time of purchase, has a short-term "Bank Deposit" rating of "P-1" by Moody's Investors Services and a "Short-Term CD" rating "A-1" or better by Standard & Poor's Corporation.
6. Deposits of any bank or savings and loan association which has combined capital, surplus and undivided profits of not less than \$3 million, provided such deposits are continuously and fully insured by the Bank Insurance Fund or the Savings Association Insurance Fund of the Federal Deposit Insurance Corporation.

DELAWARE RIVER JOINT TOLL BRIDGE COMMISSION  
NOTES TO FINANCIAL STATEMENTS (CONTINUED)  
DECEMBER 31, 2015 AND 2014

NOTE 1      SUMMARY OF SIGNIFICANT ACCOUNTING POLICIES (CONTINUED)

Cash, Cash Equivalents, and Investments (Continued)

Suitable and Authorized Investments - The following investments are allowed under the Trust Indenture (Continued):

7. Investments in money-market funds rated "AAAm" or "AAAm-G" by Standard & Poor's Corporation.
8. Repurchase agreements collateralized by Direct Obligations, GNMA's, FNMA's or FHLMCs with any registered broker/dealer or bank has an uninsured, unsecured and unguaranteed obligation rated "P-1" or "A3" or better by Moody's Investors Service, and "A-1" or "A-" or better by Standard & Poor's Corporation.

Inventory

Inventory consists of operating supplies and roadway de-icer for the Commission. The Commission has determined that the inventories are immaterial and, thus, are not recorded on the financial statements.

Prepaid Expenses

Payments made to vendors for services that will benefit future periods beyond the statement of net position date are recorded as prepaid expenses.

Capital Assets

Capital assets primarily consist of expenditures to acquire, construct, place in operation, and improve the facilities of the Commission. Purchased or constructed capital assets are recorded at cost or estimated historical cost. Infrastructure assets acquired prior to January 1, 2003 are reported primarily at estimated historical cost using deflated replacement cost. Assets acquired through gifts or donations are recorded at their estimated fair market value at time of acquisition.

Costs incurred for projects under construction are recorded as improvements in progress. In the year that the project is completed, these costs are transferred to completed (net of accumulated depreciation). The Commission capitalizes interest related to projects under construction. Capitalized interest for the years ended 2015 and 2014 amounted to \$640,481 and \$626,714, respectively.

Expenditures are capitalized when they meet the following requirements:

- Cost of \$5,000 or more.
- Useful life of five years or more.
- Increases value of an asset.

The related costs and accumulated depreciation of assets disposed are removed from capital assets, and any gain or loss on disposition is credited or charged to non-operating revenues or expenses.

DELAWARE RIVER JOINT TOLL BRIDGE COMMISSION  
NOTES TO FINANCIAL STATEMENTS (CONTINUED)  
DECEMBER 31, 2015 AND 2014

NOTE 1      SUMMARY OF SIGNIFICANT ACCOUNTING POLICIES (CONTINUED)

Depreciation

Depreciation is provided using the straight-line method over the estimated useful lives of the assets. Asset lives used in the calculation of depreciation are generally as follows:

Buildings	10-40 years
Infrastructure	15-50 years
Equipment	5-15 years

Depreciation begins when the asset is placed in service.

Bond Discounts / Premiums

Bond discount and bond premium arising from the issuance of the general obligation bonds are recorded as liabilities. They are amortized in a systematic and rational manner over the duration of the related debt as a component of interest expense. Bond discount and bond premium are presented as an adjustment of the face amount on the bonds.

Deferred Loss on Refunding of Debt

Deferred loss on refunding arising from the issuance of the refunding general obligation bonds is recorded as a deferred outflow of resources. It is amortized in a systematic and rational manner over the duration of the related debt as a component of interest expense.

Compensated Absences

Compensated absences are those absences for which employees will be paid, such as vacation, sick leave, and sabbatical leave. A liability for compensated absences that are attributable to services already rendered, and that are not contingent on a specific event that is outside the control of the Commission and its employees, is accrued as the employees earn the rights to the benefits. Compensated absences that relate to future services, or that are contingent on a specific event that is outside the control of the Commission and its employees, are accounted for in the period in which such services are rendered or in which such events take place.

Derivative Instruments and Related Companion Instruments

The Commission has entered into interest rate swap agreements for the purpose of hedging interest rates on its outstanding long-term debt. Such activity is further detailed in note 4.

Income Taxes

The Commission operates as defined by the Internal Revenue Code Section 115 and appropriately is exempt from income taxes under Section 115.

DELAWARE RIVER JOINT TOLL BRIDGE COMMISSION  
NOTES TO FINANCIAL STATEMENTS (CONTINUED)  
DECEMBER 31, 2015 AND 2014

NOTE 1      SUMMARY OF SIGNIFICANT ACCOUNTING POLICIES (CONTINUED)

Operating and Non-Operating Revenues and Expenses

Operating revenues consist primarily of cash tolls and E-ZPass revenues. Cash toll revenues are recognized as received. E-ZPass revenues are recognized when vehicles with E-ZPass utilize the Commission's toll bridges. Prepayments received from the Commission's E-ZPass customers are initially recorded as a liability and recognized as revenue as utilized at the Commission's toll bridges. Nonoperating revenues principally consist of interest income earned on various interest-bearing accounts and on investments in debt securities. Investment income is recognized when earned.

Operating expenses include expenses associated with the operation, maintenance, and repair of the bridges, and general administrative expenses. Non-operating expenses principally include expenses attributable to the Commission's interest on bonded debt and the compact authorized investment program.

Net Position

Net position comprises the various earnings from operating income, non-operating revenues, expenses, and capital contributions. The Commission applies restricted resources when an expense is incurred for purposes for which both restricted and unrestricted net position are available. Net position is classified in the following three components:

Net investment in capital assets - This component represents capital assets, net of accumulated depreciation, net of outstanding balances of borrowings used for the acquisition, construction, or improvement of those assets.

Restricted - Net position is reported as restricted when there are limitations imposed on their use either through the enabling legislation adopted by the Commission or through external restrictions imposed by creditors, grantors or laws or regulations of other governments.

Unrestricted - Net position is reported as unrestricted when it does not meet the criteria of the other two components of net position.

Use of Estimates

Management of the Commission has made certain estimates and assumptions relating to the reporting of assets, liabilities, revenues, and expenses to prepare these financial statements in conformity with accounting principles generally accepted in the United States of America. Actual results may differ from those estimates.

Adoption of Governmental Accounting Standards Board (GASB) Statements

The Commission adopted the provisions of GASB's Statement No. 67, "Financial Reporting for Pension Plans – an amendment of GASB Statement No. 25." The adoption of this statement had no effect on previously reported amounts.

DELAWARE RIVER JOINT TOLL BRIDGE COMMISSION  
NOTES TO FINANCIAL STATEMENTS (CONTINUED)  
DECEMBER 31, 2015 AND 2014

NOTE 1      SUMMARY OF SIGNIFICANT ACCOUNTING POLICIES (CONTINUED)

Adoption of Governmental Accounting Standards Board (GASB) Statements (Continued)

The Commission adopted the provisions of GASB's Statement No. 68, "Accounting and Financial Reporting for Pensions – an amendment of GASB Statement No. 27." The adoption of this statement resulted in a restatement of net position.

The Commission adopted the provisions of GASB's Statement No. 71, "Pension Transition for Contributions Made Subsequent to the Measurement Date – an amendment of GASB Statement No. 68." The adoption of this statement resulted in a restatement of net position.

The adoption of GASB Statement No. 68 and 71 resulted in a restatement of Net Position of \$(40,213,058).

Pending Governmental Accounting Standards Board (GASB) Statements

The Government Accounting Standards Board has issued GASB's Statement No. 72, "Fair Value Measurement and Application." This statement is required to be adopted by the Commission for the year ending December 31, 2016. The Commission has not determined the effect of GASB's Statement No. 72 on the financial statements

The Government Accounting Standards Board has issued GASB's Statement No. 73, "Accounting and Financial Reporting for Pensions and Related Assets That Are Not within the Scope of GASB Statement 68, and Amendments to Certain Provisions of GASB Statements 67 and 68." This statement is required to be adopted by the Commission for the year ending December 31, 2016. The Commission has not determined the effect of GASB's Statement No. 73 on the financial statements.

The Government Accounting Standards Board has issued GASB's Statement No. 74, "Financial Reporting for Postemployment Benefit Plans Other Than Pension Plans." This statement is required to be adopted by the Commission for the year ending December 31, 2017. The Commission has not determined the effect of GASB's Statement No. 74 on the financial statements.

The Government Accounting Standards Board has issued GASB's Statement No. 75, "Accounting and Financial Reporting for Postemployment Benefits Other Than Pensions." This statement is required to be adopted by the Commission for the year ending December 31, 2018. The Commission has not determined the effect of GASB's Statement No. 75 on the financial statements.

The Government Accounting Standards Board has issued GASB's Statement No. 76, "The Hierarchy of Generally Accepted Accounting Principles for State and Local Governments." This statement is required to be adopted by the Commission for the year ending December 31, 2016. The Commission has not determined the effect of GASB's Statement No. 76 on the financial statements.

The Government Accounting Standards Board has issued GASB's Statement No. 77, "Tax Abatement Disclosures." This statement is required to be adopted by the Commission for the year ending December 31, 2016. The Commission has not determined the effect of GASB's Statement No. 76 on the financial statements.



DELAWARE RIVER JOINT TOLL BRIDGE COMMISSION  
NOTES TO FINANCIAL STATEMENTS (CONTINUED)  
DECEMBER 31, 2015 AND 2014

NOTE 1      SUMMARY OF SIGNIFICANT ACCOUNTING POLICIES (CONTINUED)

The Government Accounting Standards Board has issued GASB's Statement No. 78, "Pensions Provided through Certain Multiple-Employer Defined Benefit Pension Plans." This statement is required to be adopted by the Commission for the year ending December 31, 2016. The Commission has not determined the effect of GASB's Statement No. 76 on the financial statements.

The Government Accounting Standards Board has issued GASB's Statement No. 79, "Certain External Investment Pools and Pool Participants." This statement is required to be adopted by the Commission for the year ending December 31, 2016. The Commission has not determined the effect of GASB's Statement No. 79 on the financial statements.

The Government Accounting Standards Board has issued GASB's Statement No. 80, "Blending Requirements for Certain Component Units – an amendment of GASB Statement No. 14." This statement is required to be adopted by the Commission for the year ending December 31, 2017. The Commission has not determined the effect of GASB's Statement No. 80 on the financial statements.

The Government Accounting Standards Board has issued GASB's Statement No. 81, "Irrevocable Split-Interest Agreements." This statement is required to be adopted by the Commission for the year ending December 31, 2017. The Commission has not determined the effect of GASB's Statement No. 81 on the financial statements.

The Government Accounting Standards Board has issued GASB's Statement No. 82, "Pension Issues – an amendment of GASB Statements No. 67, No. 68, and No. 73." This statement is required to be adopted by the Commission for the year ending December 31, 2017. The Commission has not determined the effect of GASB's Statement No. 82 on the financial statements.

NOTE 2      STEWARDSHIP, COMPLIANCE, AND ACCOUNTABILITY

Compliance with Finance Related Legal and Contractual Provisions

The Commission has no material violations of finance related legal and contractual provisions.

Trust Indenture

The Commission is subject to the provisions and restrictions of the Trust Indenture relating to the Bridge System Revenue Bonds, Series 2005A, Series 2007A, Series 2007B, Series 2012A, Series 2012B, and Series 2015. The following is a summary of the activities of each account created by the Indenture:

Construction Fund - All bond proceeds for project costs are deposited into this fund.

Revenue Fund - All revenues received by the Commission are deposited in the Revenue Fund. No later than the last business day of each month, the Commission shall withdraw from the Revenue Fund and deposit to the Operating Fund the amount equal to (i) the amount shown by the annual operating budget to be necessary to pay current expenses

DELAWARE RIVER JOINT TOLL BRIDGE COMMISSION  
NOTES TO FINANCIAL STATEMENTS (CONTINUED)  
DECEMBER 31, 2015 AND 2014

NOTE 2      STEWARDSHIP, COMPLIANCE, AND ACCOUNTABILITY (CONTINUED)

Trust Indenture (Continued)

for the ensuing month, and (ii) an amount determined by a Commission official as being reasonably necessary to pay current expenses which are expected for each month, after taking into account the amount on deposit in the Operating Account (including the amount described in clause (i) above), it being recognized that the annual operating budget may have to be amended accordingly.

Operating Account - Amounts on deposit in the Operating Account are used by the Commission to pay the Commission's operating expenses. Transfers are made from the Revenue Account on or before the last business day of the month.

Debt Service Fund - Transfers are made from the Revenue Fund on or before the last business day preceding each interest, principal or sinking fund redemption payment date to the Debt Service Fund to provide for the debt service on all series of bonds. Payments are made from the Debt Service Fund for interest on the bonds, for principal installments on the bonds, and for the redemption price for any bonds to be redeemed. At December 31, 2015 and 2014, the balance in the Debt Service Fund meets the requirements of the Trust Indenture.

Debt Service Reserve Fund - Transfers are made to this fund from the Revenue Fund in an amount necessary to meet the Debt Service Reserve Requirement. The Debt Service Reserve Requirement is an amount equal to the Maximum Annual Debt Service on account of all of such Bonds, provided however, that the amount to be deposited in connection with the issuance of any Series of Bonds (or issue of Bonds, if multiple Series are considered one issue for tax purposes) shall not exceed an amount equal to the lesser of (A) 10% of the original principal amount of each Series of Bonds (or the issue price of such Series, or issue as aforesaid, if the original issue discount and plus any original issue premium of such issue exceeds 2% of the original aggregate principal amount of the Series of Bonds), or (B) 125% of the average annual debt service requirement on said Series of Bonds of the same issue for tax purposes.

Amounts held in the Debt Service Reserve Fund shall be used for the purpose of paying interest on maturing principal and mandatory sinking fund redemption price of Debt Service Reserve Fund Bonds whenever and to the extent that the monies held for the credit of the Debt Service Fund shall be insufficient for such purpose. At December 31, 2015 and 2014, the balance in the Debt Service Reserve Fund meets the requirements of the Trust Indenture.

Reserve Maintenance Fund - On or before the last business day of each month, the Commission shall transfer the amount shown in the annual capital budget for the ensuing month from the Revenue Fund to the credit of the Reserve Maintenance Fund.

General Reserve Fund - On or before the last business day of each month (or more frequently, if desired) the Commission may transfer from the Revenue Fund to the credit of the General Reserve Fund any funds which a Commission official determines to be in excess of the amount required to be reserved therein for future transfers to the Operating Fund, Debt Service Fund, Debt Service Reserve Fund, and the Reserve Maintenance Fund.

DELAWARE RIVER JOINT TOLL BRIDGE COMMISSION  
NOTES TO FINANCIAL STATEMENTS (CONTINUED)  
DECEMBER 31, 2015 AND 2014

NOTE 2      STEWARDSHIP, COMPLIANCE, AND ACCOUNTABILITY (CONTINUED)

Trust Indenture (Continued)

Monies in the General Reserve Fund may be used by the Commission to restore deficiencies in any funds or accounts created under the Trust Indenture and, absent any such deficiency, for any of the following purposes, with no one item having priority over any of the others:

- (a) to purchase or redeem bonds
- (b) to secure and pay the principal or redemption price of and any interest on any subordinated indebtedness
- (c) to make payments into the Construction Fund
- (d) to fund improvements, extensions and replacements of the Bridge System
- (e) as a self-insurance reserve
- (f) to further any corporate purpose

The Commission is authorized to apply monies on deposit in the General Reserve Fund for any of these purposes.

Rebate Fund - Amounts on deposit in the Rebate Fund may be used solely to make payments to the United States of America under Section 148 of the Internal Revenue Code, and to pay costs related to the calculation of the amounts due. Upon satisfaction of the Commission's covenants to calculate and pay Section 148 requirements, any amounts remaining in the Rebate Fund shall be deposited in the General Reserve Fund.

Covenants as to Tolls

The Commission is required to fix, revise, charge, and collect tolls and other charges for traffic using the crossing facilities in order to provide an amount of "net revenues" in each year equal to not less than 130% of the principal and interest requirements for such year. The Commission satisfied this requirement for the years ended December 31, 2015 and 2014.

DELAWARE RIVER JOINT TOLL BRIDGE COMMISSION  
NOTES TO FINANCIAL STATEMENTS (CONTINUED)  
DECEMBER 31, 2015 AND 2014

NOTE 2 STEWARDSHIP, COMPLIANCE, AND ACCOUNTABILITY (CONTINUED)

Covenants as to Tolls (continued)

To arrive at "Net Revenues" as defined in the Trust Indenture, the following adjustments to operating income need to be made:

	<u>December 31, 2015</u>	<u>December 31, 2014</u>
Operating Income	\$ 35,944,879	\$ 38,976,036
Adjustments		
Net Investment Income *	\$ 1,497,183	\$ 1,819,264
Gain on Disposal of Capital Assets	11,126	4,065
Depreciation Expense	28,426,023	26,658,380
Other Postemployment Benefits Expense	<u>5,692,298</u>	<u>5,692,298</u>
	<u>35,626,640</u>	<u>34,174,007</u>
Net Revenues Available for Debt Service Coverage	<u>\$ 71,571,519</u>	<u>\$ 73,150,043</u>
Total Debt Service (Principal and Interest) **	<u>\$ 30,088,745</u>	<u>\$ 30,027,114</u>
Debt Service Coverage	237%	244%

\* excludes all unrealized market value adjustments and construction fund interest income.

\*\* excludes all remarketing fees and Includes capitalized interest.

Annual Budget – 2015 and 2014

<u>Description</u>	<u>2015 Budget</u>	<u>2015 Actual</u>	<u>Variance</u>
Budgetary Expenses			
Salaries and Wages	\$ 19,125,129	\$ 18,833,821	\$ 291,308
Employee Benefits	14,867,513	16,864,086	(1,996,573)
Utilities	918,041	674,067	243,974
Office	274,626	181,667	92,959
Telecommunications and Information Technology	1,134,525	1,033,754	100,771
Professional Development, Meetings & Memberships	228,980	122,672	106,308
E-Zpass Operating and Maintenance	5,714,272	6,495,764	(781,492)
State Police Bridge Security	5,213,396	5,053,772	159,624
Operating and Maintenance	3,063,292	2,829,253	234,039
Business Insurance	2,950,846	2,738,559	212,287
Professional Services	1,119,700	976,298	143,402
Advertising, Design and Marketing	60,500	15,583	44,917
General Contingency	<u>300,000</u>	<u>11,010</u>	<u>288,990</u>
Total Budgetary Expenses	<u>\$ 54,970,820</u>	<u>\$ 55,830,306</u>	<u>\$ (859,486)</u>

DELAWARE RIVER JOINT TOLL BRIDGE COMMISSION  
NOTES TO FINANCIAL STATEMENTS (CONTINUED)  
DECEMBER 31, 2015 AND 2014

NOTE 2 STEWARDSHIP, COMPLIANCE, AND ACCOUNTABILITY (CONTINUED)

Annual Budget – 2015 and 2014 (Continued)

<u>Description</u>	<u>2014</u> <u>Budget</u>	<u>2014</u> <u>Actual</u>	<u>Variance</u>
Budgetary Expenses			
Salaries and Wages	\$ 17,849,495	\$ 18,021,867	\$ (172,372)
Employee Benefits	14,993,789	13,051,865	1,941,924
Utilities	884,041	774,546	109,495
Office	255,820	198,286	57,534
Telecommunications and Information Technology	1,099,903	887,697	212,206
Professional Development, Meetings & Memberships	194,530	117,990	76,540
E-Zpass Operating and Maintenance	5,518,360	5,814,397	(296,037)
State Police Bridge Security	4,685,759	4,693,830	(8,071)
Operating and Maintenance	3,153,236	2,824,886	328,350
Business Insurance	2,753,987	2,889,489	(135,502)
Professional Services	1,146,616	1,348,895	(202,279)
Advertising, Design and Marketing	60,500	29,183	31,317
General Contingency	300,000	32,599	267,401
Total Budgetary Expenses	<u>\$ 52,896,036</u>	<u>\$ 50,685,530</u>	<u>\$ 2,210,506</u>

NOTE 3 DETAIL NOTES – ASSETS

Cash and Cash Equivalents

Custodial Credit Risk - Custodial credit risk is the risk that, in the event of the failure of a depository financial institution, the Commission will not be able to recover its deposits or will not be able to recover collateral securities that are in the possession of an outside party. As of December 31, 2015 and 2014, the Commission held \$79,907,540 and \$48,539,515, respectively, in cash and cash equivalents in financial institutions, which include cash and cash equivalents, held in the Retiree Health Benefits Plan (fiduciary fund).

DELAWARE RIVER JOINT TOLL BRIDGE COMMISSION  
NOTES TO FINANCIAL STATEMENTS (CONTINUED)  
DECEMBER 31, 2015 AND 2014

NOTE 3      DETAIL NOTES – ASSETS (CONTINUED)

Cash and Cash Equivalents (Continued)

Custodial Credit Risk (Continued)

As of December 31, 2015 and 2014, the Commission's bank balance of \$79,907,540 and \$48,539,515, respectively, was exposed to custodial credit risk as follows:

	December 31, 2015		
	Enterprise Fund	Fiduciary Fund	Total
Insured	\$ 250,000	\$ -	\$ 250,000
Uninsured and Collateralized with Securities			
Held by Pledging Financial Institutions	8,590,227	-	8,590,227
Uninsured and Uncollateralized	<u>70,939,821</u>	<u>127,492</u>	<u>71,067,313</u>
	<u>\$ 79,780,048</u>	<u>\$ 127,492</u>	<u>\$ 79,907,540</u>
	December 31, 2014		
	Enterprise Fund	Fiduciary Fund	Total
Insured	\$ 250,000	\$ -	\$ 250,000
Uninsured and Collateralized with Securities			
Held by Pledging Financial Institutions	11,973,285	-	11,973,285
Uninsured and Uncollateralized	<u>36,153,009</u>	<u>163,221</u>	<u>36,316,230</u>
	<u>\$ 48,376,294</u>	<u>\$ 163,221</u>	<u>\$ 48,539,515</u>

Investments

Custodial Credit Risk - For an investment, custodial credit risk is the risk that, in the event of the failure of the counterparty, the Commission will not be able to recover the value of its investment or collateral securities that are in the possession of an outside party. Investment securities are exposed to custodial credit risk if the securities are uninsured, are not registered in the name of the Commission, and are held by either the counterparty or the counterparty's trust department or agent, but not in the Commission's name. At December 31, 2015 and 2014, of the Commission's \$154,890,356 and \$181,340,801 investments in U.S. federal agency notes and bonds, U.S. government treasuries, commercial paper, and municipal and state obligations and funds, all \$154,890,355 and \$181,340,801 of investments are registered in the name of the Commission and held by the counterparty. Of the Retiree Health Benefits Plan's (fiduciary fund) \$75,960,723 and \$69,174,162 investments in mutual funds - equity and mutual funds - fixed income as of December 31, 2015 and 2014, all \$75,960,723 and \$69,174,162 of investments are registered in the name of the Commission and held by the counterparty.

DELAWARE RIVER JOINT TOLL BRIDGE COMMISSION  
NOTES TO FINANCIAL STATEMENTS (CONTINUED)  
DECEMBER 31, 2015 AND 2014

NOTE 3      DETAIL NOTES – ASSETS (CONTINUED)

Investments (Continued)

Interest Rate Risk - Interest rate risk is the risk that changes in interest rates will adversely affect the fair value of an investment. As a means of limiting its exposure to fair value losses arising from rising interest rates, the Commission's Trust Indenture limits the investment maturities by fund, depending on the fund's purpose, as disclosed in note 1.

As of December 31, 2015 and 2014, the Commission's enterprise fund had the following investments and maturities:

<u>Investment Type</u>	December 31, 2015		
	Total	<u>Investment Maturities (in Years)</u>	
	<u>Fair Value</u>	<u>Less Than 1</u>	<u>1-5</u>
Municipal and State Obligations and Funds	\$ 5,080,590	\$ 5,080,590	\$ -
Commercial Paper	25,962,525	25,962,525	-
U.S. Federal Agency Notes and Bonds	105,992,624	34,748,510	71,244,114
U.S. Government Treasuries	17,854,617	17,854,617	-
Total	<u>\$ 154,890,356</u>	<u>\$ 83,646,242</u>	<u>\$ 71,244,114</u>

<u>Investment Type</u>	December 31, 2014		
	Total	<u>Investment Maturities (in Years)</u>	
	<u>Fair Value</u>	<u>Less Than 1</u>	<u>1-5</u>
Municipal and State Obligations and Funds	\$ 5,078,011	\$ 5,078,011	\$ -
Commercial Paper	39,946,798	39,946,798	-
U.S. Federal Agency Notes and Bonds	89,060,124	44,217,416	44,842,708
U.S. Government Treasuries	47,255,868	29,140,359	18,115,509
Total	<u>\$ 181,340,801</u>	<u>\$ 118,382,584</u>	<u>\$ 62,958,217</u>

As of December 31, 2015 and 2014, the Commission's fiduciary fund had the following investments and maturities:

<u>Investment Type</u>	December 31, 2015		
	Total	<u>Investment Maturities (in Years)</u>	
	<u>Fair Value</u>	<u>Less Than 1</u>	<u>1-5</u>
Mutual Funds - Equity	\$ 31,343,861	\$ 31,343,861	\$ -
Mutual Funds - Fixed Income	44,616,862	44,616,862	-
Total	<u>\$ 75,960,723</u>	<u>\$ 75,960,723</u>	<u>\$ -</u>

<u>Investment Type</u>	December 31, 2014		
	Total	<u>Investment Maturities (in Years)</u>	
	<u>Fair Value</u>	<u>Less Than 1</u>	<u>1-5</u>
Mutual Funds - Equity	\$ 31,391,147	\$ 31,391,147	\$ -
Mutual Funds - Fixed Income	37,783,015	37,783,015	-
Total	<u>\$ 69,174,162</u>	<u>\$ 69,174,162</u>	<u>\$ -</u>

DELAWARE RIVER JOINT TOLL BRIDGE COMMISSION  
NOTES TO FINANCIAL STATEMENTS (CONTINUED)  
DECEMBER 31, 2015 AND 2014

NOTE 3      DETAIL NOTES – ASSETS (CONTINUED)

Investments (Continued)

Credit Risk - Credit risk is the risk that an issuer or counterparty to an investor will not fulfill its obligations. The Commission limits its exposure to credit risk through the Trust Indenture which restricts the investment obligations that may be purchased, by type and credit rating, as disclosed in Note 1.

Presented are summaries of the Commission's investments by type and credit rating as of December 31, 2015 and 2014:

Enterprise Fund Investments -

<u>December 31, 2015</u>		
		% of Total
<u>Investment Type</u>	<u>Rating *</u>	<u>Investments</u>
Municipal and State Obligations and Funds	AAAm	3.28%
Commercial Paper	A-1 to AA+	16.76%
U.S. Federal Agency Notes and Bonds	AA+	68.43%
U.S. Government Treasuries	AA+	11.53%
 <u>December 31, 2014</u>		
		% of Total
<u>Investment Type</u>	<u>Rating *</u>	<u>Investments</u>
Municipal and State Obligations and Funds	AAAm	2.80%
Commercial Paper	A-1 to AA+	22.03%
U.S. Federal Agency Notes and Bonds	AA+	49.11%
U.S. Government Treasuries	AA+	26.06%

\*AAA represents the highest quality rating by Standard & Poor's

Fiduciary Fund Investments -

<u>December 31, 2015</u>		
		% of Total
<u>Investment Type</u>	<u>Rating *</u>	<u>Investments</u>
Mutual Funds - Equity	3 Stars	10.19%
Mutual Funds - Equity	4 Stars	23.14%
Mutual Funds - Equity	5 Stars	7.94%
Mutual Funds - Fixed Income	4 Stars	21.70%
Mutual Funds - Fixed Income	5 Stars	37.04%
 <u>December 31, 2014</u>		
		% of Total
<u>Investment Type</u>	<u>Rating *</u>	<u>Investments</u>
Mutual Funds - Equity	3 Stars	15.80%
Mutual Funds - Equity	4 Stars	29.58%
Mutual Funds - Fixed Income	3 Stars	21.84%
Mutual Funds - Fixed Income	4 Stars	4.07%
Mutual Funds - Fixed Income	5 Stars	28.70%

\*5 Stars represents the highest quality rating by Morningstar

Concentration of Credit Risk - The Commission does not place a limit on the amount that may be invested in any one issuer. All permitted investments by the Commission must be rated in the three highest categories by the rating agencies.



DELAWARE RIVER JOINT TOLL BRIDGE COMMISSION  
NOTES TO FINANCIAL STATEMENTS (CONTINUED)  
DECEMBER 31, 2015 AND 2014

NOTE 3      DETAIL NOTES – ASSETS (CONTINUED)

Capital Assets

The following schedules details changes in capital assets, by major class, that occurred during the years ended December 31, 2015 and 2014:

	Balance Jan. 1, 2015	Additions	Deletions	Transfers	Balance Dec. 31, 2015
Capital Assets Not Being Depreciated					
Land	\$ 129,886,166	\$ 62,500	\$ (12,208)	\$ -	\$ 129,938,458
Improvements in Progress	26,835,619	28,876,440	-	(17,535,512)	38,176,547
Total Capital Assets Not Being Depreciated	156,723,785	28,938,940	(12,208)	(17,535,512)	168,115,005
Capital Assets Being Depreciated					
Buildings	29,418,032	328,847	-	83,803	29,830,682
Infrastructure	645,415,950	-	-	17,436,787	662,851,737
Equipment	34,062,368	2,660,387	(20,414)	15,922	36,718,263
Total Capital Assets Being Depreciated	708,896,350	2,989,234	(20,414)	17,535,512	729,400,682
Less Accumulated Depreciation for					
Buildings	(14,438,896)	(1,057,479)	-	-	(15,496,375)
Infrastructure	(293,849,865)	(26,366,286)	-	-	(320,216,151)
Equipment	(30,639,657)	(1,002,258)	20,414	-	(31,621,501)
Total Accumulated Depreciation	(338,928,418)	(28,426,023)	20,414	-	(367,334,027)
Total Capital Assets Being Depreciated, Net	369,967,932	(25,436,789)	-	17,535,512	362,066,655
Total Capital Assets, Net	\$ 526,691,717	\$ 3,502,151	\$ (12,208)	\$ -	\$ 530,181,660
	Balance Jan. 1, 2014	Additions	Deletions	Transfers	Balance Dec. 31, 2014
Capital Assets Not Being Depreciated					
Land	\$ 129,886,166	\$ -	\$ -	\$ -	\$ 129,886,166
Improvements in Progress	38,279,465	24,777,330	-	(36,221,176)	26,835,619
Total Capital Assets Not Being Depreciated	168,165,631	24,777,330	-	(36,221,176)	156,723,785
Capital Assets Being Depreciated					
Buildings	25,528,628	346,352	-	3,543,052	29,418,032
Infrastructure	612,737,826	-	-	32,678,124	645,415,950
Equipment	33,424,711	660,389	(22,712)	-	34,062,368
Total Capital Assets Being Depreciated	671,691,165	1,006,721	(22,712)	36,221,176	708,896,350
Less Accumulated Depreciation for					
Buildings	(13,378,748)	(1,062,148)	-	-	(14,438,896)
Infrastructure	(269,328,609)	(24,521,256)	-	-	(293,849,865)
Equipment	(29,587,393)	(1,074,976)	22,712	-	(30,639,657)
Total Accumulated Depreciation	(312,292,750)	(26,658,380)	22,712	-	(338,928,418)
Total Capital Assets Being Depreciated, Net	359,398,415	(25,651,659)	-	36,221,176	369,967,932
Total Capital Assets, Net	\$ 527,566,046	\$ (874,329)	\$ -	\$ -	\$ 526,691,717

DELAWARE RIVER JOINT TOLL BRIDGE COMMISSION  
NOTES TO FINANCIAL STATEMENTS (CONTINUED)  
DECEMBER 31, 2015 AND 2014

NOTE 3      DETAIL NOTES – ASSETS (CONTINUED)

Toll Revenue

		For the Years Ended			
		December 31, 2015		December 31, 2014	
<u>Toll Class</u>		<u>Vehicles</u>	<u>Revenue</u>	<u>Vehicles</u>	<u>Revenue</u>
1		33,570,317	\$ 33,572,834	31,560,913	\$ 31,754,731
2		888,230	5,728,221	843,055	5,438,550
3		393,052	4,852,614	368,622	4,363,046
4		444,552	8,071,076	377,309	5,895,475
5		3,587,596	70,310,256	3,412,005	88,888,594
6		101,894	2,364,080	97,768	2,271,894
7		9,804	267,265	10,008	272,849
8		12	493	18	1,096
11		84,433	168,866	79,391	158,782
12		107,132	214,284	100,933	201,866
13		3,863	7,726	3,380	6,720
15		111	111	64	64
Extra axles *		1,544	4,677	1,926	5,883
Violations		452,490	3,144,287	863,933	5,375,866
		<u>39,643,486</u>	<u>\$ 127,404,750</u>	<u>37,717,379</u>	<u>\$ 122,613,196</u>
Discounts, Violations, Allowances and Other Adjustments			<u>(2,764,185)</u>		<u>(1,831,351)</u>
			<u>\$ 124,640,565</u>		<u>\$ 120,781,845</u>

\* extra axles are not included in total volume.

In December 2002, the Commission initiated electronic toll collection and E-ZPass at the bridges. The Commission records toll revenue net of uncollectible tolls, discounts, and service fees. Gross toll revenue for December 31, 2015 and 2014 was \$127,404,750 and \$122,613,196, respectively, while the adjustments for uncollectible tolls, violations, and discounts were \$2,764,185 and \$1,831,351, respectively.

NOTE 4      DETAIL NOTES – LIABILITIES

Compensated Absences

Commission employees may accumulate unused sick days with no restrictions. Employees are compensated for accumulated sick leave upon retirement or resignation at one-half of their then current hourly rate of pay times the number of days accumulated, up to a maximum of \$18,000. The accrued liability for accumulated sick leave at December 31, 2015 and 2014 is estimated at \$1,737,588 and \$1,775,076, respectively.

Commission employees may carry forward up to five (5) vacation days not used during the year. Additional carryover days may be granted with permission from the executive director. Upon separation from the Commission, the employee will be paid for all accrued vacation time at their then current hourly rate. The accrued liability for accumulated vacation time at December 31, 2015 and 2014 is estimated at \$264,191 and \$250,053, respectively.

DELAWARE RIVER JOINT TOLL BRIDGE COMMISSION  
NOTES TO FINANCIAL STATEMENTS (CONTINUED)  
DECEMBER 31, 2015 AND 2014

NOTE 4      DETAIL NOTES – LIABILITIES

Pension Plans

Pennsylvania State Employees' Retirement System

*Plan Description*

The Commission participates in the Pennsylvania State Employees' Retirement System (SERS), a cost-sharing multiple-employer defined benefit pension plan established by the Commonwealth to provide pension benefits for employees of state government and certain independent agencies. Membership in SERS is mandatory for most Commission (and other state) employees. Article II of the Commonwealth's constitution assigns the authority to establish and amend the benefit provision of the plan to the General Assembly. SERS issues a publicly available financial report that can be obtained at [www.sers.pa.gov](http://www.sers.pa.gov).

*Benefits Provided*

SERS provides retirement, death, and disability benefits. Member retirement benefits are determined by taking years of credited service, multiplied by final average salary, multiplied by 2%, multiplied by class of service multiplier. According to the State Employees' Retirement Code (SERC), all obligations of SERS will be assumed by the Commonwealth should SERS terminate.

*Contributions*

Section 5507 of the SERC (71 Pa. C.S. §5507) requires the Commonwealth and other employers whose employees are SERS members to make contributions to the fund on behalf of all active members and annuitants necessary to fund the liabilities and provide the annuity reserves required to pay benefits. SERS funding policy, as set by the board, provides for periodic active member contributions at statutory rates. The SERS funding policy also provides for periodic employer contributions at actuarially determined rates based on SERS funding valuation, expressed as a percentage of annual retirement covered payroll, such that they, along with employee contributions and an actuarially determined rate of investment return, are adequate to accumulate assets to pay benefits when due. However, Act 2010-120 imposes rate increase collars (limits on annual rate increases) on employer contributions. The collar for Commonwealth fiscal year 13/14 was 4.5% and will remain at that rate until no longer needed. The Commission's retirement contribution, as a percentage of covered payroll, was 15.77% for the year ended December 31, 2014.

Contributions to the pension plan from the Commission were \$2,680,930 for the year ended December 31, 2015.

DELAWARE RIVER JOINT TOLL BRIDGE COMMISSION  
NOTES TO FINANCIAL STATEMENTS (CONTINUED)  
DECEMBER 31, 2015 AND 2014

NOTE 4      DETAIL NOTES – LIABILITIES

Pension Plans (Continued)

Pennsylvania State Employees' Retirement System (Continued)

*Pension Liabilities, Pension Expense, and Deferred Outflows of Resources and Deferred Inflows of Resources Related to Pensions*

At December 31, 2015, the Commission reported a liability of \$44,858,192 for its proportionate share of the net pension liability. The net pension liability was measured as of December 31, 2014, and the total pension liability used to calculate the net pension liability was determined by an actuarial valuation as of that date. The Commission's proportion of the net pension liability was based on a projection of the Commission's long-term share of contributions to the pension plan relative to the projected contributions of all participating agencies, actuarially determined. At December 31, 2014, the Commission's proportion was 0.30192475%, which was an increase of .00407397% from its proportion measured as of December 31, 2013.

For the year ended December 31, 2015, the Commission recognized pension expense of \$5,097,265. At December 31, 2015, the Commission reported deferred outflows of resources and deferred inflows of resources related to pensions from the following sources:

	Deferred Outflows of Resources	Deferred Inflows of Resources
Difference between expected and actual experience	243,521	-
Net Difference between projected and actual investment earnings on pension plan investments	1,296,099	-
Changes in assumptions	-	-
Differences between employer contributions and proportionate share of contributions	-	219,286
Changes in proportion	-	457,242
Commission's contributions subsequent to measurement date	3,970,884	-
	5,510,504	676,528

DELAWARE RIVER JOINT TOLL BRIDGE COMMISSION  
NOTES TO FINANCIAL STATEMENTS (CONTINUED)  
DECEMBER 31, 2015 AND 2014

NOTE 4      DETAIL NOTES – LIABILITIES

Pension Plans (Continued)

Pennsylvania State Employees' Retirement System (Continued)

*Pension Liabilities, Pension Expense, and Deferred Outflows of Resources and Deferred Inflows of Resources Related to Pensions*

The \$3,970,884 reported as deferred outflows of resources related to pensions resulting from Commission contributions subsequent to the measurement date will be recognized as a reduction of the net pension liability in the year ended December 31, 2016. Other amounts reported as deferred outflows of resources and deferred inflows of resources related to pensions will be recognized in pension expense as follows:

Year Ended December 31:

2016	\$	154,124
2017		154,124
2018		154,124
2019		154,124
2020		154,124
Thereafter	\$	92,472

*Actuarial assumptions*

The following methods and assumptions were used in the December 31, 2014 actuarial valuations. These methods and assumptions were applied to all periods included in the measurement:

Investment rate of return	7.50% net of expenses including inflation
Projected salary increases	average of 6.10% with range of 4.3% - 11.05% including inflation
Inflation	2.75%
Mortality rate	projected RP-2000 Mortality Tables adjusted for actual plan experience and future improvement
Cost of living adjustments (COLA)	ad hoc and are not considered to be substantively automatic

Some of the methods and assumptions mentioned above are based on the 17<sup>th</sup> *Investigation of Actuarial Experience*, which was published in January 2011, and analyzed experience from 2006 through 2010. The Commonwealth's actuary made recommendations with respect to the actuarial assumptions and methods based on their analysis.

DELAWARE RIVER JOINT TOLL BRIDGE COMMISSION  
NOTES TO FINANCIAL STATEMENTS (CONTINUED)  
DECEMBER 31, 2015 AND 2014

NOTE 4      DETAIL NOTES – LIABILITIES

Pension Plans (Continued)

Pennsylvania State Employees' Retirement System (Continued)

*Actuarial assumptions (Continued)*

The long-term expected real rate of return on pension plan investments is determined using a building-block method in which best-estimate ranges of expected future real rates of return (expected returns, net of pension plan investment expense and inflation) are developed for each major asset class. These ranges are combined to produce the long-term expected rate of return by weighting the expected future real rates of return by the target asset allocation percentage and by adding expected inflation. The target allocation and best estimates of arithmetic real rates of return for each major asset class included in the pension plan's target asset allocation as of December 31, 2014 are summarized in the following table:

Asset Class	Target Allocation	Long-term Expected Rate of Return
Alternative Investments	15.00%	8.50%
Global Public Equity	40.00%	5.40%
Real Assets	17.00%	4.95%
Diversifying Assets	10.00%	5.00%
Fixed Income	15.00%	1.50%
Liquidity Reserve	3.00%	0.00%
Total	100.00%	

*Discount Rate*

The discount rate used to measure the total pension liability was 7.50%. The projection of cash flows used to determine the discount rate assumed that employee contributions will be made at the rates applicable for each member and that employer contributions will be made based on rates determined by the actuary. Based on the assumptions, SERS fiduciary net position was projected to be available to make all projected future benefit payments of current active and non-active SERS members. Therefore, the long-term expected rate of return on SERS investments was applied to all periods of projected benefit payments to determine the total pension liability.

DELAWARE RIVER JOINT TOLL BRIDGE COMMISSION  
NOTES TO FINANCIAL STATEMENTS (CONTINUED)  
DECEMBER 31, 2015 AND 2014

NOTE 4      DETAIL NOTES – LIABILITIES

Pension Plans (Continued)

Pennsylvania State Employees' Retirement System (Continued)

*Sensitivity of the Commission's proportionate share of the net pension liability to change in the discount rate*

The following schedule presents the Commission's proportionate share of the 2014 and 2013 net pension liability calculated using the discount rate of 7.50%. It also shows what the Commission's proportionate share of the net pension liability would be if it were calculated using a discount rate that is one percentage point lower or one percentage point higher than the current rate:

	1% Decrease 6.50%	Current discount rate 7.50%	1% Increase 8.50%
Commission's share of the net pension liability as of 12/31/14 measurement date	57,417,406	44,858,192	34,059,301
Commission's share of the net pension liability as of 12/31/13 measurement date	54,265,626	41,809,783	31,102,721

*Pension plan fiduciary net position*

Detailed information about the pension plan's fiduciary net position is available in the separately issued SERS financial report.

*Payables to the Pension Plan*

As of December 31, 2015, the Commission reported a \$2,277,828 liability within the Accounts payable and accrued liabilities on the Statement of Net Position for the Commission's share of contributions that had not yet been paid to SERS. As of December 31, 2014, the Commission reported a \$987,874 liability within the Accounts payable and accrued liabilities on the Statement of Net Position for the Commission's share of contributions for employee service that had not yet been paid to SERS.

State of New Jersey Public Employees' Retirement System

*Plan Description*

The Commission participates in the State of New Jersey Public Employees' Retirement System (PERS), a cost-sharing, multi-employer, contributory, defined-benefit plan administered by the State of New Jersey, Division of Pensions and Benefits (the Division). For additional information about PERS, please refer to the Division's Comprehensive Annual Financial Report (CAFR) which can be found at [www.state.nj.us/treasury/pensions/annrpts.shtml](http://www.state.nj.us/treasury/pensions/annrpts.shtml).

DELAWARE RIVER JOINT TOLL BRIDGE COMMISSION  
NOTES TO FINANCIAL STATEMENTS (CONTINUED)  
DECEMBER 31, 2015 AND 2014

NOTE 4      DETAIL NOTES – LIABILITIES

Pension Plans (Continued)

State of New Jersey Public Employees' Retirement System (Continued)

Pension vesting and benefit provisions are set by N.J.S.A. 43:15A. PERS provides retirement, death and disability benefits. All benefits vest after ten years of service.

The following represents the membership tiers for PERS:

<u>Tier</u>	<u>Definition</u>
1	Members who were enrolled prior to July 1, 2007.
2	Members who were eligible to enroll on or after July 1, 2007 and prior to November 2, 2008.
3	Members who were eligible to enroll on or after November 2, 2008 and prior to May 22, 2010.
4	Members who were eligible to enroll on or after May 22, 2010 and prior to June 28, 2011.
5	Members who were eligible to enroll on or after June 28, 2011.

*Benefits Provided*

Service retirement benefits of 1/55th of final average salary for each year of service credit is available to tiers 1 and 2 members upon reaching the age of 60 and to tier 3 members upon reaching age 62. Service retirement benefits of 1/60th of final average salary for each year of service credit is available to tier 4 members upon reaching age 62 and tier 5 members upon reaching age 65. Early retirement benefits are available to tiers 1 and 2 members before reaching age 60, tiers 3 and 4 before age 62 with 25 or more years of service credit and tier 5 with 30 or more years of service credit before age 65. Benefits are reduced by a fraction of a percent for each month that a member retires prior to the age at which a member can receive full early retirement benefits in accordance with their respective tier. Tier 1 members can receive an unreduced benefit from age 55 to age 60 if they have at least 25 years of service. Deferred retirement is available to members who have at least 10 years of service credit and have not reached the service retirement age of their respective tier.

*Contributions*

The contribution policy is set by N.J.S.A.43:15A, Chapter 62, P.L. 1994, and Chapter 115, P.L. 1997, and requires contributions by active members and contributing employers. Plan members and employer contributions may be amended by State of New Jersey legislation.

During the year ending December 31, 2015, members contributed at an average rate of 6.99% of base salary; Member contributions will continue to increase each year on July 1 until the final increase on July 1, 2018 when a contribution rate of 7.5% is reached.

Employer contributions are actuarially determined by PERS. The Commission's contribution requirements for the years ended June 30, 2015, 2014, and 2013 were \$64,202, \$61,068 and \$58,196.



DELAWARE RIVER JOINT TOLL BRIDGE COMMISSION  
NOTES TO FINANCIAL STATEMENTS (CONTINUED)  
DECEMBER 31, 2015 AND 2014

NOTE 4      DETAIL NOTES – LIABILITIES

Pension Plans (Continued)

State of New Jersey Public Employees' Retirement System (Continued)

*Pension Liabilities, Pension Expense, and Deferred Outflows of Resources and Deferred Inflows of Resources Related to Pensions*

At December 31, 2015, the Commission reported a liability of \$1,676,344 for its proportionate share of the net pension liability. The net liability was measured as of June 30, 2015 and the total pension liability used to calculate the net pension liability was determined by an actuarial valuation as of that date. The Commission's proportion of the net pension liability was based on the ratio of the Commission's contributions as an individual employer to total contributions to the PERS during the years ended June 30, 2015 and 2014. At June 30, 2015 the Commission's proportion was .0074676777%.

For the year ended December 31, 2015, the Commission recognized pension expense of \$65,852. At December 31, 2015, the Commission reported deferred outflows of resources and deferred inflows of resources related to pensions from the following sources:

	Deferred Outflows of Resources	Deferred Inflows of Resources
Difference between expected and actual experience	39,992	-
Net Difference between projected and actual investment earnings on pension plan investments	-	26,952
Changes in assumptions	180,026	-
Differences between employer contributions and proportionate share of contributions	-	-
Changes in proportion	102,203	-
Commission's contributions subsequent to measurement date	65,852	-
	388,073	26,952

The \$65,852 reported as deferred outflows of resources related to pensions resulting from Commission contributions subsequent to the measurement date will be recognized as a reduction of the net pension liability in the year ended December 31, 2016. Other amounts reported as deferred outflows of resources and deferred inflows of resources related to pensions will be recognized in pension expense as follows:

Year Ended December 31:

2016	\$ 45,849
2017	45,849
2018	45,849
2019	45,849
2020	45,849
thereafter	66,024

DELAWARE RIVER JOINT TOLL BRIDGE COMMISSION  
NOTES TO FINANCIAL STATEMENTS (CONTINUED)  
DECEMBER 31, 2015 AND 2014

NOTE 4      DETAIL NOTES – LIABILITIES

Pension Plans (Continued)

State of New Jersey Public Employees' Retirement System (Continued)

*Actuarial Assumptions*

The total pension liability for the June 30, 2015 measurement was determined by an actuarial valuation as of July 1, 2014, which was rolled forward to June 30, 2015. This actuarial valuation used the following actuarial assumptions, applied to all periods in the measurement:

Inflation Rate	3.04%
Salary increases:	
2012-2021	2.15-4.40% based on age
Thereafter	3.15-5.40% based on age
Investment rate of return	7.90%

Mortality rates were based on the RP-2000 Combined Health Male and Female Mortality Tables (setback 1 year for females) with adjustments for mortality improvements from the base year of 2012 based on Projection Scale AA.

The actuarial assumptions used in the July 1, 2014 valuation were based on the results of an actuarial experience study for the period July 1, 2008 to June 30, 2011. It is likely that future experience will not exactly conform to these assumptions. To the extent that actual experience deviates from these assumptions, the emerging liabilities may be higher or lower than anticipated. The more the experience deviates, the larger the impact on future financial statements.

In accordance with the New Jersey State statute, the long-term expected rate of return on plan investments is determined by the State Treasurer, after consultation with the NJ Directors of the Division of Investments and NJ Division of Pensions and Benefits, the board of trustees and the actuaries. Best estimates of arithmetic real rates of return for each major asset class included in PERS's target asset allocation as of June 30, 2015 are summarized in the following table:

Asset Class	Target Allocation	Long-Term Expected Real Rate of Return
Cash	5.00%	1.04%
U.S Treasuries	1.75%	1.64%
Investment Grade Credit	10.00%	1.79%
Mortgages	2.10%	1.62%
High Yield Bonds	2.00%	4.03%
Inflation-Indexed Bonds	1.50%	3.25%
Broad U.S Equities	27.25%	8.52%
Developed Foreign Equities	12.00%	6.88%
Emerging Market Equities	6.40%	10.00%
Private Equity	9.25%	12.41%
Hedge Funds / Absolute Return	12.00%	4.72%
Real Estate (Property)	2.00%	6.83%
Commodities	1.00%	5.32%
Global Debt ex US	3.50%	-0.40%
REIT	4.25%	5.12%

DELAWARE RIVER JOINT TOLL BRIDGE COMMISSION  
NOTES TO FINANCIAL STATEMENTS (CONTINUED)  
DECEMBER 31, 2015 AND 2014

NOTE 4      **DETAIL NOTES – LIABILITIES**

Pension Plans (Continued)

State of New Jersey Public Employees' Retirement System (Continued)

*Discount Rate*

The discount rate used to measure the total pension liability was 4.90% and 5.39% as of June 30, 2015 and 2014 respectively. This single blended discount rate was based on the long-term expected rate of return on pension plan investments of 7.90%, and a municipal bond rate of 3.80% and 4.29% as of June 30, 2015 and 2014 respectively, based on the Bond Buyer Go 20-Bond Municipal Bond Index which includes tax-exempt general obligation municipal bonds with an average rating of AA/Aa or higher. The projection of cash flows used to determine the discount rate assumed that contributions from plan members will be made at the current member contribution rates and that contributions from employers will be made based on the average of the last five years of contributions made in relation to the last five years of recommended contributions. Based on these assumptions, the plan's fiduciary net position was projected to be available to make future benefit payments through 2033. Therefore the long-term expected rate of return on plan investments was applied to projected benefit payments through 2033, and the municipal bond rate was applied to projected benefit payments after that date in determining the total pension liability.

*Sensitivity of the Collective Net Pension Liability to Changes in the Discount Rate*

The following represents the Commission's pro-rata share of the net pension liability as of June 30, 2015 and 2014 respectively, calculated using the discount rate described above as well as what the pro-rata share of the net pension liability would be if it was calculated using a discount rate that is 1 percentage point lower, or 1 percentage point higher than the current rate:

	1% Decrease 3.90%	Current discount rate 4.90%	1% Increase 5.90%
Commission's share of the net pension liability as of 6/30/2015 measurement date	2,083,490	1,676,344	1,334,995
Commission's share of the net pension liability as of 6/30/2014 measurement date	1,677,512	1,349,700	1,074,865

*Pension plan fiduciary net position*

Detailed information about the pension plan's fiduciary net position is available in the separately issued PERS financial report.

*Payables to the Pension Plan*

As of December 31, 2015, the Commission reported a \$65,852 liability within the Accounts payable and accrued liabilities on the Statement of Net Position for the Commission's share of contributions that had not yet been paid to PERS. As of December 31, 2014, the Commission reported a \$61,068 liability within the Accounts payable and accrued liabilities on the Statement of Net Position for the Commission's share of contributions for employee service that had not yet been paid to PERS.

DELAWARE RIVER JOINT TOLL BRIDGE COMMISSION  
NOTES TO FINANCIAL STATEMENTS (CONTINUED)  
DECEMBER 31, 2015 AND 2014

NOTE 4      DETAIL NOTES – LIABILITIES (CONTINUED)

Other Postemployment Benefits (OPEB)

Plan Description - The Commission provides healthcare and life insurance benefits to its retirees and their spouses and dependents under the Delaware River Joint Toll Bridge Commission's Retiree Health Benefits Plan ("Retiree Health Benefits Plan"), which was established as an irrevocable trust in December 2009. The amount the Commission pays for the medical and life insurance premiums for retirees and spouses varies. Most regular active employees who retire directly from the Commission and meet the eligibility criteria may participate.

Eligibility - Employees hired prior to January 1, 1995 are eligible for participation as follows:

- hire date prior to January 1, 1979, the required years of service at retirement equals 65 minus age times 2;
- hire date January 1, 1979 - December 31, 1994, the required years of service at retirement equals 70 minus age times 2.

Employees hired after December 31, 1994, attainment of 55 with 25 years of service or 60 with 20 years of service. Service includes all service in state, county, or municipal pension systems within the State of New Jersey or the Commonwealth of Pennsylvania, with the last 5 years with the Commission. Also, if an employee retires prior to 55 with 25 or more years of service, he may elect COBRA until age 55 at which time he would be eligible for the retiree health benefit plan in effect at that time.

Funding Policy - The contribution requirement of the Commission is established by the Commission's Board of Commissioners and may be amended by the same. Prior to 2009, the Commission was on a pay-as-you-go basis.

Retirees - The Commission's contributions to the plan for the years ended December 31, 2015 and 2014 were \$11,082,269 and \$6,640,000, respectively. Retirees, if hired before April 1, 1995, pay the current active co-pay of \$260 per year, and if hired on or after April 1, 1995, the retiree pays half of the dental premium and a percentage of their final year earnings toward medical, as follows: single 1.00%, husband / wife or parent / child 1.25%, or family or parent / children 1.50%.

Future Retirees - In accordance with Statement No. 45 of the Governmental Accounting Standards Board, the Commission is required to expense the *annual required contribution of the employer (ARC)*, an amount actuarially determined in accordance with the parameters of Statement No. 45. The ARC represents a level of funding that, if paid on an ongoing basis, is projected to cover normal cost each year and amortize any unfunded actuarial liabilities (or funding excess) over a period not to exceed thirty (30) years. The ARC includes the costs of both current and future retirees. The current ARC was determined to be \$5,541,134 at an unfunded discount rate of 6%.

Since the establishment of an irrevocable trust fund in 2009 for postemployment benefits, the Commission has provided funding in the amount of \$75,382,269 as of December 31, 2015.

DELAWARE RIVER JOINT TOLL BRIDGE COMMISSION  
NOTES TO FINANCIAL STATEMENTS (CONTINUED)  
DECEMBER 31, 2015 AND 2014

NOTE 4      DETAIL NOTES – LIABILITIES (CONTINUED)

Other Postemployment Benefits (OPEB) (Continued)

Annual OPEB Cost and Net OPEB Obligation (Asset) - For 2015, the Commission's annual OPEB cost (expense) of \$5,692,298 for the plan was equal to the ARC minus the interest on the beginning net OPEB asset plus the adjustment to the ARC.

The Commission's annual required contribution (ARC), the interest on the net OPEB obligation (asset), the adjustment to the ARC, the increase or decrease in the net OPEB obligation, the net OPEB obligation (asset), and the percentage of annual OPEB cost contributed to the plan for 2015, 2014, and 2013 are as follows:

	<u>2015</u>	<u>2014</u>	<u>2013</u>
Annual Required Contribution (ARC)	\$ 5,541,134	\$ 5,541,134	\$ 6,550,462
Interest on the Net OPEB Obligation	(717,048)	(717,048)	(719,542)
Adjustment to the ARC	<u>868,212</u>	<u>868,212</u>	<u>870,645</u>
Annual OPEB Cost	5,692,298	5,692,298	6,701,565
Contributions	<u>(11,082,268)</u>	<u>(6,640,000)</u>	<u>(6,660,000)</u>
Increase (Decrease) in the NET OPEB Obligation	(5,389,970)	(947,702)	41,565
Net OPEB Obligation (Asset), January 1	<u>(12,898,496)</u>	<u>(11,950,794)</u>	<u>(11,992,359)</u>
Net OPEB Obligation (Asset), December 31	<u>\$ (18,288,466)</u>	<u>\$ (12,898,496)</u>	<u>\$ (11,950,794)</u>
Percentage of Annual OPEB Cost Contributed	195%	117%	99%

Funded Status and Funding Progress - As of January 1, 2014, the most recent actuarial valuation date, the Retiree Health Benefit Plan was 67% funded. The actuarial accrued liability for benefits was \$89,762,598 and the actuarial value of assets was \$60,119,142, resulting in an unfunded actuarial accrued liability (UAAL) of \$29,643,456. The covered payroll (annual payroll of active employees covered by the plan) was \$17,894,602, and the ratio of the UAAL to the covered payroll was 166%. Actuarial valuations of an ongoing plan involve estimates of the value of reported amounts and assumptions about the probability of occurrence of events far into the future. Examples include assumptions about future employment, mortality, and the healthcare cost trend. Amounts determined regarding the funded status of the plan and the annual required contributions of the employer are subject to continual revision as actual results are compared with past expectations and new estimates are made about the future. The schedule of funding progress, presented as required supplementary information following the notes to the financial statements, presents multiyear trend information that shows whether the actuarial value of the plan assets is increasing or decreasing over time relative to the actuarial accrued liabilities for benefits.

Actuarial Methods and Assumptions - Projections of benefits for financial reporting purposes are based on the substantive plan (the plan as understood by the employer and plan members) and include the types of benefits provided at the time of each valuation and the historical pattern of sharing of benefit costs between the employer and plan members to that point. The actuarial methods and assumptions used include techniques that are designed to reduce short-term volatility in actuarial accrued liabilities and the actuarial value of assets, consistent with the long-term perspective of the calculations.

DELAWARE RIVER JOINT TOLL BRIDGE COMMISSION  
NOTES TO FINANCIAL STATEMENTS (CONTINUED)  
DECEMBER 31, 2015 AND 2014

NOTE 4      DETAIL NOTES – LIABILITIES (CONTINUED)

Other Postemployment Benefits (OPEB) (Continued)

In the January 1, 2014 actuarial valuation, the entry age normal actuarial cost method was used. Under this method, the actuarial present value of the projected benefits of each individual included in the actuarial valuation is allocated on a level basis over the earnings or service of the individual between entry age and assumed exit ages. The portion of this actuarial present value allocated to a valuation year is called the normal cost. The portion of this actuarial present value not provided for at the valuation date by the actuarial present value of future normal costs is called the actuarial accrued liability. Under this method, the actuarial gains (losses), as they occur, reduce (increase) the unfunded actuarial accrued liability. The unfunded accrued actuarial liability (UAAL) is being amortized using a closed, level percentage amount over thirty (30) years on an open basis. The remaining amortization period at December 31, 2014 was twenty-three (23) years.

The actuarial assumptions included the following:

- *Mortality.* The mortality table employed in the valuation was the RP 2014 Combined Generational Mortality Table using Scale MP 2014 for Males and Females projected.
- *Demographics.* Demographic assumptions used to project the data are the same as those used in the Pennsylvania State Employees' Retirement System. There is no assumption for future new hires.
- *Discount rate.* Future costs have been discounted at the rate of 6.0% compounded annually for GASB 45 purposes.
- *Withdrawal rates.* The following table shows sample annual rates of withdrawal:

Annual Rate of Withdrawal Prior to Retirement

Age	Male				Female			
	Years of Service				Years of Service			
	<u>0</u>	<u>5</u>	<u>9</u>	<u>14</u>	<u>0</u>	<u>5</u>	<u>9</u>	<u>14</u>
20	20.7%	N/A	N/A	N/A	22.4%	N/A	N/A	N/A
25	16.2%	0.8%	0.8%	N/A	20.5%	2.7%	1.9%	N/A
30	13.9%	0.8%	0.6%	0.6%	17.9%	2.4%	1.7%	1.8%
35	13.6%	0.7%	0.4%	0.4%	12.8%	1.9%	1.2%	1.3%
40	13.0%	0.5%	0.4%	0.4%	10.0%	1.9%	0.7%	0.5%
45	12.1%	0.5%	0.2%	0.2%	9.8%	1.8%	0.7%	0.5%
50	11.3%	0.5%	0.2%	0.2%	9.8%	1.8%	0.4%	0.5%
55	11.3%	0.6%	0.6%	0.6%	9.8%	1.5%	1.2%	1.2%

DELAWARE RIVER JOINT TOLL BRIDGE COMMISSION  
NOTES TO FINANCIAL STATEMENTS (CONTINUED)  
DECEMBER 31, 2015 AND 2014

NOTE 4      DETAIL NOTES – LIABILITIES (CONTINUED)

Other Postemployment Benefits (OPEB) (Continued)

- *Retirement rates.* The following table shows sample annual rates of retirement at selected ages. Retirement rates vary by age, service, and Pennsylvania State Employees' Retirement Plan:

Rates of Retirement

<u>Age</u>	<u>Male</u>	<u>Female</u>
55	27.0%	23.0%
56	28.0%	23.0%
57-59	30.0%	23.0%
60	25.0%	25.0%
61	20.0%	20.0%
62	25.0%	25.0%
63-64	20.0%	20.0%
65	25.0%	25.0%
66-79	20.0%	20.0%
80	100.0%	100.0%

- *Salary scale.* The following table represents the assumed salary scale utilized in the projection.

Assumed Salary Scale

<u>Completed Years of Service</u>	<u>Annual Increase</u>	<u>Completed Years of Service</u>	<u>Annual Increase</u>
1	8.00%	16	2.50%
2	6.00%	17	2.40%
3	4.50%	18	2.30%
4	4.00%	19	2.20%
5	3.75%	20	2.10%
6	3.50%	21	2.00%
7	3.25%	22	1.90%
8	3.20%	23	1.80%
9	3.15%	24	1.70%
10	3.10%	25	1.60%
11	3.00%	26	1.50%
12	2.90%	27	1.40%
13	2.80%	28	1.30%
14	2.70%	29	1.25%
15	2.60%	30+	1.25%

- *Healthcare claims.* A blended premium is computed for all employees and retirees not yet eligible for Medicare benefits. Under GASB Statement 45, the non-blended (or age adjusted) premium is used for computing plan costs.

DELAWARE RIVER JOINT TOLL BRIDGE COMMISSION  
NOTES TO FINANCIAL STATEMENTS (CONTINUED)  
DECEMBER 31, 2015 AND 2014

NOTE 4      DETAIL NOTES – LIABILITIES (CONTINUED)

Other Postemployment Benefits (OPEB) (Continued)

- *Healthcare claims (continued).* The following represents the premium costs:

Claim Cost at Selected Ages							
Age	Medical	Admin	Rx	Medicare Part B	Dental	Vision	
55	\$ 6,773	\$ 1,513	\$ 3,712	\$ -	\$ 240	\$ 58	
60	\$ 8,400	\$ 1,513	\$ 4,603	\$ -	\$ 240	\$ 58	
65	\$ 2,380	\$ -	\$ 2,484	\$ 1,259	\$ 240	\$ 58	
70	\$ 2,772	\$ -	\$ 2,893	\$ 1,259	\$ 240	\$ 58	
75	\$ 3,075	\$ -	\$ 3,210	\$ 1,259	\$ 240	\$ 58	
80	\$ 3,297	\$ -	\$ 3,442	\$ 1,259	\$ 240	\$ 58	

- *Healthcare cost trend.* The trend assumption is used to project the growth of the expected claims over the lifetime of the health care recipients. The GASB statement does not require a particular source for information to determine health care trends, but it does recommend selecting a source that is "publicly available, objective and unbiased."

Aon Hewitt developed the trend assumption utilizing the short-term rates expected on the Commission plan along with information in published papers from other industry experts (actuaries, health economists, etc.). The trend assumption is split to reflect separate trends for pre and post-65 claims given that current standards suggest post-65 claims grow at a smaller rate than do pre-65 claims. The pre-65 assumption begins at 8.0% and decreases to a 5.0% long-term trend rate for all health care benefits after eight years. The post-65 assumption begins at 7.0% and decreases to a 5.0% long-term trend rate for all health care benefits after eight years. Additionally, a constant trend of 5.0% per year has been assumed for the Medicare Part B premiums, dental and vision benefits.

The impact of the 40% excise tax on high cost employer plans (effective in 2018) brought on by the Patient Protection and Affordable Care Act (PPACA) is estimated to be 4.56%. This impact has been reflected in the plan liabilities. All other requirements from Health Care Reform result in no additional employer liability.

- *Spouse age difference / percent married.* Males are assumed to be two (2) years older than females. Active employees are assumed to 85% married and choose family coverage at retirement.
- *Coverage assumptions.* It is assumed that 100% of current and future contingent eligible participants will elect healthcare benefits at their full eligibility age, or current age if later.

Bonded Indebtedness

At December 31, 2015 and 2014, the Commission had \$327,317,418 and \$339,184,585, respectively, in revenue and refunding revenue bonds outstanding. The bonds were issued in 2005, 2007, 2012, and 2015. These bonds were issued pursuant to the Trust Indenture dated January 1, 2003, as supplemented, between the Commission and the TD Bank / Pennsylvania, National Association as Trustee.



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NOTES TO FINANCIAL STATEMENTS (CONTINUED)  
DECEMBER 31, 2015 AND 2014

NOTE 4      DETAIL NOTES – LIABILITIES (CONTINUED)

Bonded Indebtedness (Continued)

Series 2005A Bonds - In March 2005, the Commission issued \$72,645,000 Bridge System Revenue Bonds. The bonds were issued at a premium of \$6,544,528 and yielded total cash of \$79,544,528. Of the proceeds, \$34,770,228 of the bonds were used to advance refund \$32,165,000 of the Commission's Bridge System Revenue Bonds, Series 2003, \$2,918,863 was deposited into a debt service reserve fund, \$1,500,436 was used to pay cost of issuance, and the remaining \$40,000,000 was deposited into the 2005 construction fund.

In 2013, the \$40,000,000 of monies was used to establish the Compact Investment Program. This program was created to provide funding for transportation infrastructure related projects in New Jersey and Pennsylvania communities that host its bridges. As of December 31, 2014, the Commission had committed all \$40,000,000 and all of the subsequent interest earned on the \$40,000,000 for grants to municipalities participating in the Compact Authorized Investment (CAI) program, of which \$0 and \$340,774 was undistributed at December 31, 2014 and 2013, respectively. Funded projects include installation of upgrades to traffic signalization around Commission facilities, road widening in areas affected by Commission crossings, bicycle or pedestrian paths leading up to Commission facilities, park and ride facilities, safety lighting, and right of way renovation, protection, or beautification.

During October 2012, the Commission partially refunded \$30,795,000 of the Series 2005A outstanding bonds.

Series 2007A Bonds - In July 2007, the Commission issued \$134,170,000 in Bridge System Revenue Bonds. These Bonds were issued to provide funds to pay for the cost of capital improvements related to the system, to make deposits into the debt service reserve fund, fund capitalized interest and pay insurance and cost of issuance associated with the series.

In October 2013, the Commission partially refunded \$31,905,000 of the Series 2007A outstanding bonds (see note 6). In April 2015, the Commission partially refunded an additional \$86,765,000 of the Series 2007A outstanding bonds. (see note 6)

Series 2007B (SWAP) Bonds - In July 2007, the Commission issued two series of Bridge System Revenue Bonds (2007B-1 and 2007B-2) for \$75,000,000 each and are hedged by an interest rate swap issued by two counterparties. These bonds were issued to provide funds to pay for the cost of capital improvements related to the system, to fund capitalized interest, and to pay insurance and cost of issuance associated with the series.

In September 2008, the bonds were converted into variable rate securities and were secured by a letter of credit issued by Dexia Credit Local for a three-year term with an expiration date of August 2011. The letter of credit required the Commission to maintain a debt service reserve account for the 2007B Bonds. As part of the letter of credit, the Commission was required to make an initial \$5,200,000 deposit into a collateral account (not containing any tax-exempt debt proceeds).

In May 2011, the entire amount of outstanding bonds of \$69,825,000 for 2007B-1 and \$69,825,000 for 2007B-2 bonds were refunded and are no longer required to be secured by a letter of credit. The refunding was done in order to peg the variable interest rates of

DELAWARE RIVER JOINT TOLL BRIDGE COMMISSION  
NOTES TO FINANCIAL STATEMENTS (CONTINUED)  
DECEMBER 31, 2015 AND 2014

NOTE 4      DETAIL NOTES – LIABILITIES (CONTINUED)

Bonded Indebtedness (Continued)

Series 2007B (SWAP) Bonds (Continued)

the bonds to the Securities Industry and Financial Markets Association (SIMFA) Municipal Swap Index. The 2007B-1 Bond interest rate is SIMFA Municipal Swap Index Rate +85 basis points and the 2007B-2 Bond interest rate is SIMFA Municipal Swap Index Rate +95 basis points.

Series 2012A Bonds - In October 2012, the Commission issued \$77,145,000 in Bridge System Revenue Bonds. The bonds were issued at a premium of \$9,476,967, included transferred proceeds of \$12,205,970, and yielded total cash of \$98,827,937. Of the proceeds, \$95,174,922 of the bonds were used to advance refund \$30,795,000 of the Series 2005A outstanding bonds (see note 6) and \$57,300,000 of the Series 2003 outstanding bonds, \$2,875,978 was deposited into a debt service reserve fund, \$773,543 was used to pay cost of issuance, and the remaining \$3,494 were additional proceeds.

In July 2013, the Commission extinguished \$1,210,000 of the Series 2012A outstanding bonds (see note 6).

Series 2012B Bonds - In October 2012, the Commission issued \$20,665,000 in Bridge System Revenue Bonds (Taxable). Of the proceeds, \$20,476,829 of the bonds were used to advance refund \$19,475,000 of the Series 2003 outstanding bonds, \$185,895 was used to pay cost of issuance, and the remaining \$2,276 were additional proceeds.

Series 2015 - In April 2015, the Commission issued \$86,505,000 in Bridge System Revenue Bonds. The bonds were issued at a premium of \$6,529,446 and yielded total cash of \$104,257,335 after transfers of \$9,826,227 from debt service fund Series 2007A and \$1,400,000 from construction fund Series 2007A. Of the proceeds, \$95,571,081 were used to advance refund the Series 2007A outstanding bonds, \$7,676,769 was deposited into a debt service reserve fund, and \$1,009,485 was used to pay cost of issuance.

The following schedules represent the debt service requirements for the outstanding bonds:

	<u>Year</u>	<u>Principal Amount</u>	<u>Interest</u>	<u>Total Debt Service</u>
Series 2005A	2016	\$ 4,125,000	\$ 1,151,838	\$ 5,276,838
	2017	4,350,000	918,775	5,268,775
	2018	4,590,000	672,925	5,262,925
	2019	4,835,000	413,738	5,248,738
	2020	5,105,000	140,388	5,245,388
Total Series 2005A		<u>\$ 23,005,000</u>	<u>\$ 3,297,664</u>	<u>\$ 26,302,664</u>

DELAWARE RIVER JOINT TOLL BRIDGE COMMISSION  
NOTES TO FINANCIAL STATEMENTS (CONTINUED)  
DECEMBER 31, 2015 AND 2014

NOTE 4      DETAIL NOTES – LIABILITIES (CONTINUED)

Bonded Indebtedness (Continued)

	<u>Year</u>	<u>Principal Amount</u>	<u>Interest</u>	<u>Total Debt Service</u>
Series 2007A	2016	\$ 1,760,000	\$ 144,000	\$ 1,904,000
	2017	<u>2,000,000</u>	<u>50,000</u>	<u>2,050,000</u>
Total Series 2007A		<u>\$ 3,760,000</u>	<u>\$ 194,000</u>	<u>\$ 3,954,000</u>

	<u>Year</u>	<u>Principal Amount</u>	<u>Interest (1)</u>	<u>Total Debt Service</u>
Series 2007B	2016	\$ 4,800,000	\$ 5,028,544	\$ 9,828,544
	2017	4,950,000	4,825,456	9,775,456
	2018	5,250,000	4,616,021	9,866,021
	2019	5,450,000	4,393,894	9,843,894
	2020	5,650,000	4,163,304	9,813,304
	2021	5,950,000	3,924,253	9,874,253
	2022	6,250,000	3,672,508	9,922,508
	2023	6,550,000	3,408,071	9,958,071
	2024	6,800,000	3,130,940	9,930,940
	2025	7,150,000	2,843,232	9,993,232
	2026	7,450,000	2,540,716	9,990,716
	2027	7,800,000	2,225,506	10,025,506
	2028	8,200,000	1,895,488	10,095,488
	2029	8,550,000	1,548,546	10,098,546
	2030	8,900,000	1,186,796	10,086,796
	2031	9,350,000	810,237	10,160,237
	2032	<u>9,800,000</u>	<u>414,638</u>	<u>10,214,638</u>
Total Series 2007B		<u>\$ 118,850,000</u>	<u>\$ 50,628,150</u>	<u>\$ 169,478,150</u>

(1) Series 2007B are variable rate revenue bonds. The interest rate is adjusted daily as determined by the remarketing agent. The assumed interest rate at December 31, 2015 is 4.231%.

DELAWARE RIVER JOINT TOLL BRIDGE COMMISSION  
NOTES TO FINANCIAL STATEMENTS (CONTINUED)  
DECEMBER 31, 2015 AND 2014

NOTE 4      DETAIL NOTES – LIABILITIES (CONTINUED)

Bonded Indebtedness (Continued)

	<u>Year</u>	<u>Principal Amount</u>	<u>Interest</u>	<u>Total Debt Service</u>
Series 2012A	2016	1,030,000	3,012,838	4,042,838
	2017	1,065,000	2,978,263	4,041,263
	2018	1,100,000	2,938,288	4,038,288
	2019	1,145,000	2,893,388	4,038,388
	2020	1,195,000	2,858,538	4,053,538
	2021	6,825,000	2,675,963	9,500,963
	2022	7,165,000	2,365,775	9,530,775
	2023	7,445,000	2,040,088	9,485,088
	2024	7,615,000	1,658,588	9,473,588
	2025	8,205,000	1,258,088	9,463,088
	2026	8,620,000	855,563	9,475,563
	2027	7,605,000	512,063	8,317,063
	2028	9,355,000	225,638	9,580,638
	2029	1,345,000	64,297	1,409,297
	2030	1,385,000	21,641	1,406,641
Total Series 2012A		<u>\$ 71,500,000</u>	<u>\$ 26,357,019</u>	<u>\$ 97,857,019</u>

	<u>Year</u>	<u>Principal Amount</u>	<u>Interest</u>	<u>Total Debt Service</u>
Series 2012B	2016	\$ 3,440,000	\$ 169,763	\$ 3,609,763
	2017	3,490,000	109,893	3,599,893
	2018	<u>3,560,000</u>	<u>38,875</u>	<u>3,598,875</u>
Total Series 2012B		<u>\$ 10,490,000</u>	<u>\$ 318,531</u>	<u>\$ 10,808,531</u>

	<u>Year</u>	<u>Principal Amount</u>	<u>Interest</u>	<u>Total Debt Service</u>
Series 2015	2016	-	3,615,519	3,615,519
	2017	-	3,615,519	3,615,519
	2018	-	3,615,519	3,615,519
	2019	2,410,000	3,567,319	5,977,319
	2020	2,540,000	3,455,619	5,995,619
	2021	2,540,000	3,328,619	5,868,619
	2022	2,695,000	3,197,744	5,892,744
	2023	2,795,000	3,074,469	5,869,469
	2024	2,935,000	2,945,194	5,880,194
	2025	3,015,000	2,796,444	5,811,444
	2026	3,180,000	2,641,569	5,821,569
	2027	4,540,000	2,493,969	7,033,969
	2028	3,380,000	2,373,056	5,753,056
	2029	3,480,000	2,233,244	5,713,244
	2030	3,670,000	2,054,494	5,724,494
	2031	3,785,000	1,868,119	5,653,119
	2032	545,000	1,764,297	2,309,297
	2033	10,595,000	1,543,200	12,138,200
	2034	11,020,000	1,110,900	12,130,900
	2035	11,460,000	661,300	12,121,300
	2036	<u>11,920,000</u>	<u>216,050</u>	<u>12,136,050</u>
Total Series 2015		<u>\$ 86,505,000</u>	<u>\$ 52,172,163</u>	<u>\$ 138,677,163</u>

DELAWARE RIVER JOINT TOLL BRIDGE COMMISSION  
NOTES TO FINANCIAL STATEMENTS (CONTINUED)  
DECEMBER 31, 2015 AND 2014

NOTE 4      DETAIL NOTES – LIABILITIES (CONTINUED)

Derivative Instruments

In October 2005, the Commission entered into two forward starting swaps with two counterparties.

The fair value balances and notional amounts of derivative instruments outstanding at December 31, 2015 and 2014, classified by type, and the changes in fair value of such derivative instruments for the years then ended are as follows (debit (credit)):

Changes in Fair Value			Fair Value at December 31, 2015		
	Classification	Amount	Classification	Amount	Notional
Cash Flow Hedges					
Pay-Fixed Interest Rate Swap	Deferred Outflow of Resources	\$ 144,975	Debt	\$ (13,194,000)	\$ 59,420,000
Pay-Fixed Interest Rate Swap	Deferred Outflow of Resources	\$ 144,975	Debt	\$ (13,194,000)	\$ 59,420,000

Changes in Fair Value			Fair Value at December 31, 2014		
	Classification	Amount	Classification	Amount	Notional
Cash Flow Hedges					
Pay-Fixed Interest Rate Swap	Deferred Outflow of Resources	\$ 4,204,428	Debt	\$ (13,049,025)	\$ 61,650,000
Pay-Fixed Interest Rate Swap	Deferred Outflow of Resources	\$ 4,204,428	Debt	\$ (13,049,025)	\$ 61,650,000

The fair values of the interest rate swaps are estimated using the zero-coupon method. This method calculates the future net settlement payments required by the swap, assuming that the current forward rates implied by the yield curve correctly anticipate future spot interest rates. These payments are then discounted using the spot rates implied by the current yield curve for hypothetical zero-coupon bonds due on the date of each future net settlement on the swaps.

**Objective and Terms of Hedging Derivative Instruments** - The objective of the swaps was to hedge against future interest rates by taking advantage of the current historically low interest rate environment in advance of the issuance of bonds by the Commission's 2007B bonds. The following table displays the objective and terms of the Commission's hedging derivative instruments outstanding at December 31, 2015 and 2014, along with the credit rating of the associated counterparty.

Year Ended December 31, 2015						
Type	Objective	Notional Amount	Effective Date	Maturity Date	Terms	Counterparty Credit Rating
Pay Fixed Interest Rate Swap	Hedges of Changes in Cash Flows on the 2007 B-1 Series Bonds	\$ 59,925,000	10/01/07	07/01/32	Pay Fixed 4.231%; Receive SIFMA Swap Index	Baa2/A-
Pay Fixed Interest Rate Swap	Hedges of Changes in Cash Flows on the 2007 B-2 Series Bonds	\$ 59,925,000	10/01/07	07/01/32	Pay Fixed 4.231%; Receive SIFMA Swap Index	Baa2/A-

DELAWARE RIVER JOINT TOLL BRIDGE COMMISSION  
NOTES TO FINANCIAL STATEMENTS (CONTINUED)  
DECEMBER 31, 2015 AND 2014

NOTE 4      **DETAIL NOTES – LIABILITIES (CONTINUED)**

Derivative Instruments (Continued)

**Objective and Terms of Hedging Derivative Instruments (Continued)**

Year Ended December 31, 2014						
<u>Type</u>	<u>Objective</u>	<u>Notional Amount</u>	<u>Effective Date</u>	<u>Maturity Date</u>	<u>Terms</u>	<u>Counterparty Credit Rating</u>
Pay Fixed Interest Rate Swap	Hedges of Changes in Cash Flows on the 2007 B-1 Series Bonds	\$ 61,650,000	10/01/07	07/01/32	Pay Fixed 4.231%; Receive SIFMA Swap Index	Baa2/A-
Pay Fixed Interest Rate Swap	Hedges of Changes in Cash Flows on the 2007 B-2 Series Bonds	\$ 61,650,000	10/01/07	07/01/32	Pay Fixed 4.231%; Receive SIFMA Swap Index	Baa2/A-

**Risks Related to Derivative Instruments**

*Credit risk* - As of December 31, 2015 and 2014, the Commission was not exposed to credit risk on its hedging derivative instruments as all such derivative instruments are in a liability position based on their fair values. Should interest rates change and the fair value of the swaps become positive, the Commission would be exposed to credit risk in the amount of the swaps' fair value. Agreed upon collateral threshold levels per the Credit Support Annex (CSA) require collateral to be posted based on counterparty ratings as set forth in the CSA.

The Commission has executed hedging derivative instruments with two counterparties, each comprising fifty percent (50%) of the net exposure to credit risk. Merrill Lynch & Co is rated Baa2 by Moody's and A- S&P. Morgan Stanley is rated Baa2 by Moody's and A- by S&P.

*Interest rate risk* - The Commission is exposed to interest rate risk on its interest rate swaps. On both its pay-fixed, receive-variable interest rate swap, as the SIFMA swap index increases, the Commission's net payment on the swap increases.

*Basis risk* - The Commission is exposed to basis risk on its pay-fixed interest rate swap hedging derivative instruments because the variable-rate payments received by the Commission on these hedging derivative instruments are based on a rate or index other than interest rates the Commission pays on its hedged variable-rate debt, which is remarketed weekly. At December 31, 2014, the average interest rate on the Commission's hedged variable rate debt is .96% percent, while the SIFMA basis swap index rate is .06%.

*Termination risk* - The swaps are governed by the International Swap Dealers Association Master Agreement, which includes standard termination events. In addition, the swaps can only be terminated by the counterparties if the long-term, unenhanced rating on the bonds issued by the Commission is withdrawn, suspended or falls below Baa3 as determined by Moody's, or BBB- as determined by S&P. Furthermore, the swaps may be terminated if the counterparties' credit support provider fails to have any rated long-term, unsecured, unenhanced senior debt or if the rating of the senior debt is

DELAWARE RIVER JOINT TOLL BRIDGE COMMISSION  
NOTES TO FINANCIAL STATEMENTS (CONTINUED)  
DECEMBER 31, 2015 AND 2014

NOTE 4      DETAIL NOTES – LIABILITIES (CONTINUED)

Derivative Instruments (Continued)

Risks Related to Derivative Instruments (Continued)

*Termination risk (Continued)*

withdrawn, suspended or falls below Baa2 as determined by Moody's, or BBB as determined by S&P.

*Rollover risk* - The Commission is exposed to rollover risk on hedging derivative instruments that are hedges of debt that may be terminated prior to the maturity of the hedged debt. If the counterparty exercises its termination option, as discussed above, the Commission will be re-exposed to the risks being hedged by the hedging derivative instrument.

*Commitments* - The Commission purchased two interest rate swap insurance policies dated October 6, 2005, issued by MBIA Insurance Corporation for the account of the Commission, as principal, and the counterparties, as beneficiary. As a result of purchasing the insurance policies, the Commission is not required to post collateral as part of the swap agreements.

Summary of Long-Term Liabilities

	Outstanding Jan. 1, 2015	Additions	Reductions	Outstanding Dec. 31, 2015	Due Within One Year
Revenue Bonds:					
Principal	\$ 329,345,000	\$ 88,505,000	\$ 101,740,000	\$ 314,110,000	\$ 15,155,000
Unamortized Premiums	9,839,586	6,076,193	2,706,361	13,207,418	-
Total Revenue Bonds	339,184,586	92,581,193	104,446,361	327,317,418	15,155,000
Other Liabilities:					
Premium Payment Payable -					
Derivative Companion Instrument	421,539	-	34,118	387,421	-
Derivative Instrument - Interest Rate					
Swaps	26,098,050	289,950	-	26,388,000	-
Compensated Absences	2,025,129	-	23,350	2,001,779	120,107
Net Pension Liability	-	46,534,536	-	46,534,536	-
Total Other Liabilities	28,544,718	46,824,486	57,468	75,311,736	120,107
Total Long-Term Liabilities	\$ 367,729,304	\$ 139,405,679	\$ 104,505,829	\$ 402,629,154	\$ 15,275,107
	Principal Outstanding Jan. 1, 2014	Additions	Reductions	Principal Outstanding Dec. 31, 2014	Due Within One Year
Revenue Bonds:					
Principal	\$ 343,505,000	\$ -	\$ 14,160,000	\$ 329,345,000	\$ 14,975,000
Unamortized Premiums	11,335,327	-	1,495,741	9,839,586	-
Total Revenue Bonds	354,840,327	-	15,655,741	339,184,586	14,975,000
Other Liabilities:					
Premium Payment Payable -					
Derivative Companion Instrument	455,885	-	34,346	421,539	34,346
Derivative Instrument - Interest Rate					
Swaps	17,680,194	8,408,856	-	26,098,050	-
Compensated Absences	2,039,938	-	14,809	2,025,129	121,508
Total Other Liabilities	20,185,017	-	49,155	28,544,718	155,854
Total Long-Term Liabilities	\$ 375,025,344	\$ -	\$ 15,704,896	\$ 367,729,304	\$ 15,130,854

DELAWARE RIVER JOINT TOLL BRIDGE COMMISSION  
NOTES TO FINANCIAL STATEMENTS (CONTINUED)  
DECEMBER 31, 2015 AND 2014

NOTE 5      PRIOR YEARS' DEBT DEFEASANCE

Series 2005A Bonds

On October 24, 2012, the Commission defeased \$30,795,000 of the Series 2005A Bonds, with a call date of July 1, 2015, by creating a separate irrevocable trust fund. New debt (Series 2012A Bonds) was issued and the proceeds have been used to purchase U.S. government securities that were placed in the trust fund. The investment and fixed earnings from the investments are sufficient to fully service the defeased debt until the debt is called or matures. For financial reporting purposes, this debt has been considered defeased and therefore removed as a liability from the Commission's financial statements. As of December 31, 2015 and 2014, the amount of defeased Series 2005A Bonds outstanding amounted to \$30,795,000 and \$30,795,000.

NOTE 6      DEFEASED AND EXTINGUISHED DEBT

Series 2007A Bonds

On October 28, 2013, the Commission advance refunded a portion of its Series 2007A Bonds with a par value of \$31,905,000 and an interest rate of 5.0% per annum. In order to finance the refunding, the Commission deposited, in an irrevocable trust, \$37,174,104 of monies remaining in the 2007 Account of the Construction Fund not otherwise allocated to or required for other capital projects. In addition, in April 2015 the commission advanced refunded an additional \$86,765,000. These monies were used to purchase U.S. government securities and those securities were deposited in an irrevocable trust with an escrow agent to provide debt service payments until the Series 2007A Bonds are called on July 1, 2017. The advance refunding met the requirements of an in-substance debt defeasance and the aforementioned portion of the Series 2007A Bonds liability was removed from the Commission's financial statements. As of December 31, 2015 and December 31, 2014, the amount of defeased series 2007A Bonds outstanding amounted to \$118,670,000 and \$31,905,000.

Series 2012A Bonds

On July 16, 2013, the Commission extinguished a portion of its Series 2012A Bonds with a par value of \$1,210,000 and an interest rate of 4.0% per annum. In order to fund the extinguishment, the Commission utilized \$1,210,000 of monies remaining in the 2005A Account of the Construction Fund not otherwise allocated to or required for other capital projects. Being that the Commission reacquired the aforementioned \$1,210,000 of its outstanding Series 2012A Bonds, and is relieved of all of its obligations with respect to the aforementioned debt, a portion of the Series 2012A Bonds liability was removed from the Commission's financial statements.

NOTE 7      INTERFUND BALANCES

At December 31, 2015 and 2014, interfund balances in the amounts of \$622,791 and \$1,859,406, respectively, existed between the enterprise fund and the fiduciary fund. The interfund was created by payments made by the enterprise fund on-behalf of the fiduciary fund (postemployment benefits). The interfund balance is expected to be liquidated during the year ending December 31, 2016.



DELAWARE RIVER JOINT TOLL BRIDGE COMMISSION  
NOTES TO FINANCIAL STATEMENTS (CONTINUED)  
DECEMBER 31, 2015 AND 2014

NOTE 8 RISK MANAGEMENT

The Commission is exposed to various risks of loss related to torts; theft of, damage to, and destruction of assets; errors and omissions; injuries to employees; and natural disasters. These risks are covered by commercial insurance purchased from independent third parties. Settled claims from these risks have not exceeded coverage for the past several years.

NOTE 9 DEFERRED COMPENSATION SALARY ACCOUNT

The Commission offers its employees a deferred compensation plan in accordance with Internal Revenue Code Section 457. The Plan, available to all full time employees at their option, permits employees to defer a portion of their salary to future years. The deferred compensation is not available to participants until termination, retirement, death, or unforeseeable emergency.

Amounts deferred under Section 457 plans must be held in trust for the exclusive benefit of participating employees and not be accessible by the Commission or its creditors. Since the Commission does not have a fiduciary relationship with the Plan, the balances and activities of the Plan are not reported in the Commission's financial statements.

NOTE 10 COMMITMENTS AND CONTINGENCIES

Commitments - The Commission had several outstanding or planned construction projects as of December 31, 2015. These projects are evidenced by contractual commitments with contractors and include:

<u>Project</u>	<u>Awarded</u>	<u>Commitment Remaining</u>
Electronic Toll Collection System - Replacement, Design, Build and Maintain	\$ 11,709,125	\$ 11,026,153
Electronic Surveillance/Detection System	967,940	557,990
Scudder Falls Bridge Replacement, Final Design	<u>22,940,000</u>	<u>13,727,115</u>
Total	<u>\$ 35,617,065</u>	<u>\$ 25,311,258</u>

Litigation - The Commission is a defendant in several legal proceedings that are in various stages of litigation. It is believed that the outcome, or exposure to the Commission, from such litigation is either unknown or potential losses, if any, would not be material to the financial statements.

NOTE 11 SUBSEQUENT EVENTS

- A) The Commission has evaluated all subsequent events through the report issue date of June 17, 2016.

## REQUIRED SUPPLEMENTARY INFORMATION

DELAWARE RIVER JOINT TOLL BRIDGE COMMISSION  
Required Supplementary Information  
Schedule of Funding Progress for the Retiree Health Benefits Plan

Actuarial Valuation Date	Actuarial Value of Assets (a)	Actuarial Liability (AAL) - Entry Age (b)	Unfunded AAL (UAAL) (b-a)	Funded Ratio (a/b)	Covered Payroll (c)	UAAL as a Percentage of Covered Payroll [(b-a)/c]
1/1/2014	\$ 60,119,142	\$ 89,762,598	\$ 29,643,456	67%	\$ 17,894,602	166%
1/1/2012	37,771,605	86,706,576	48,934,971	44%	19,046,487	257%
1/1/2010	20,000,000	71,199,363	61,199,363	25%	17,328,360	353%
1/1/2008	-	110,300,000	110,300,000	0%	18,000,000	613%

#### OTHER POSTEMPLOYMENT BENEFITS

The information presented in the required supplementary schedules was determined as part of the actuarial valuation at the date indicated. Additional information as of the latest actuarial valuation follows:

Valuation Date	January 1, 2014
Actuarial Cost Method	Entry Age Normal Cost Method
Amortization Method	Open, Level Percentage Method
Remaining Amortization Period	22 years
Asset Valuation Method	Fair Market Value Method
Actuarial Assumptions:	
Investment Rate of Return	6.0%
Rate of Medical Inflation for Retirees under Age 65	8.0% grading to 5.0% over 9 years
Rate of Medical Inflation for Retirees over Age 65	7.0% grading to 5.0% over 9 years

For determining the annual required contribution (ARC), the rate of employer contributions to plan is composed of the normal cost plus amortization of the unfunded actuarial liability. The normal cost is a portion of the actuarial present value of plan benefits and expenses which is allocated to a valuation year by the actuarial cost method. The actuarial liability is that portion of the present value of projected benefits that will not be paid by future employer normal costs or active employee contributions. The difference between this liability and the funds accumulated as of the same date is the unfunded actuarial liability.

DELAWARE RIVER JOINT TOLL BRIDGE COMMISSION  
 Required Supplementary Information  
 Schedule of Commission's Proportionate Share of the Net Pension Liability

Last 10 Fiscal Years\*

	Commonwealth of Pennsylvania State Employee Retirement System - 2015	State of New Jersey Public Employees Retirement System - 2015
Measurement Date	12/31/2014	6/30/2015
Commission's Proportion of the net pension liability	0.30192475%	0.74676777%
Commission's proportionate share of the net pension liability	\$ 44,858,192	\$ 1,676,344
Commission's covered- employee payroll	\$ 18,495,592	\$ 546,677
Commission's proportionate share of the net pension liability as a percentage of its covered-employee payroll	242.53%	306.64%
Plan fiduciary net position as a percentage of the total pension liability	64.80%	47.90%

\*The Commission adopted GASB 68 on the prospective basis for the year 2015; therefore only one year is presented in the above schedule.

DELAWARE RIVER JOINT TOLL BRIDGE COMMISSION  
Required Supplementary Information  
Schedule of Commission's Contributions

	<u>2015</u>	<u>2014</u>	<u>2013</u>	<u>2012</u>	<u>2011</u>	<u>2010</u>	<u>2009</u>	<u>2008</u>	<u>2007</u>	<u>2006</u>
Actuarially Determined Contribution ("ADC")	\$ 2,981,231	\$ 2,946,425	\$ 2,256,596	\$ 1,646,547	\$ 1,096,224	\$ 744,292	\$ 579,830	\$ 620,367	\$ 602,219	\$ 471,413
Contributions in Relation to the ADC	<u>2,981,231</u>	<u>2,946,425</u>	<u>2,256,596</u>	<u>1,646,547</u>	<u>1,096,224</u>	<u>744,292</u>	<u>579,830</u>	<u>620,367</u>	<u>602,219</u>	<u>471,413</u>
Contribution Deficiency (Excess)	<u>\$ -</u>	<u>\$ -</u>	<u>\$ -</u>	<u>\$ -</u>	<u>\$ -</u>	<u>\$ -</u>	<u>\$ -</u>	<u>\$ -</u>	<u>\$ -</u>	<u>\$ -</u>
Covered Employee Payroll	\$ 19,042,269	\$ 17,392,145	\$ 14,539,682	\$ 15,126,619	\$ 18,870,378	\$ 17,190,072	\$ 16,937,177	\$ 16,676,532	\$ 16,903,732	\$ 16,545,882
Contributions as a Percentage of Covered Employee Payroll	15.7%	16.9%	15.5%	10.9%	5.8%	4.3%	3.4%	3.7%	3.6%	2.8%

## OTHER SUPPLEMENTARY SCHEDULES

DELAWARE RIVER JOINT TOLL BRIDGE COMMISSION  
Schedule of Toll Revenue – Cash  
For the Year Ended December 31, 2015

Class	Description	Rate	<u>Trenton-Morrisville</u>		<u>New Hope-Lambertville</u>		<u>Interstate 78</u>		<u>Easton-Phillipsburg</u>	
			Cash Volume	Cash Revenue	Cash Volume	Cash Revenue	Cash Volume	Cash Revenue	Cash Volume	Cash Revenue
01	Automobile Subtotal	\$ 1.00	3,071,577	\$ 3,071,577	410,647	\$ 410,647	2,967,115	\$ 2,967,115	1,664,925	\$ 1,664,925
11	Auto with 1-Axle Trailer	2.00	3,409	6,818	1,016	2,032	13,445	26,890	4,496	8,992
12	Auto with 2-Axle Trailer	2.00	5,810	11,620	2,896	5,792	26,593	53,186	6,172	12,344
13	Auto with 3-Axle Trailer	2.00	454	908	74	148	1,556	3,112	118	236
	Automobile Subtotal		<u>3,081,250</u>	<u>3,090,923</u>	<u>414,633</u>	<u>418,619</u>	<u>3,008,709</u>	<u>3,050,303</u>	<u>1,675,711</u>	<u>1,686,497</u>
02	Comm'l 2-Axle Peak	6.50	33,755	219,408	11,017	71,611	52,385	340,503	24,245	157,593
02	Comm'l 2-Axle Off-Peak	5.85	-	-	-	-	-	-	-	-
03	Comm'l 3-Axle Peak	12.00	5,111	61,332	3,666	43,992	13,410	160,920	3,876	46,512
03	Comm'l 3-Axle Off-Peak	10.80	-	-	-	-	-	-	-	-
04	Comm'l 4-Axle Peak	16.00	2,398	38,368	828	13,248	10,937	174,992	2,811	44,976
04	Comm'l 4-Axle Off-Peak	14.40	-	-	-	-	-	-	-	-
05	Comm'l 5-Axle Peak	20.00	17,696	353,920	5,947	118,960	380,812	7,616,240	25,094	501,880
05	Comm'l 5-Axle Off-Peak	18.00	-	-	-	-	-	-	-	-
06	Comm'l 6-Axle Peak	24.00	282	6,768	69	1,656	2,398	57,552	249	5,976
06	Comm'l 6-Axle Off-Peak	21.60	-	-	-	-	-	-	-	-
07	Comm'l 7-Axle Peak	28.00	29	812	5	140	304	8,512	7	196
07	Comm'l 7-Axle Off-Peak	25.20	-	-	-	-	-	-	-	-
08	Comm'l Permit		-	-	1	-	3	147	1	-
	Commercial Subtotal		<u>59,271</u>	<u>680,608</u>	<u>21,533</u>	<u>249,607</u>	<u>460,249</u>	<u>8,358,866</u>	<u>56,283</u>	<u>757,133</u>
	Extra Axles Subtotal *		<u>1</u>	<u>4</u>	<u>1</u>	<u>4</u>	<u>294</u>	<u>1,164</u>	<u>10</u>	<u>32</u>
	Non-Revenue *		623		1,912		885		618	
	Gross Cash Tolls		<u>3,140,521</u>	<u>3,771,535</u>	<u>436,166</u>	<u>668,230</u>	<u>3,468,958</u>	<u>11,410,333</u>	<u>1,731,994</u>	<u>2,443,662</u>
	Discounts, Allowances and Other Adjustments			<u>6,074</u>		<u>1,141</u>		<u>6,210</u>		<u>1,401</u>
	Net Cash Revenue			<u>\$ 3,777,609</u>		<u>\$ 669,371</u>		<u>\$ 11,416,543</u>		<u>\$ 2,445,063</u>

\* Note: Extra Axles and Non-Revenue not Included in Total Volume Amount.

DELAWARE RIVER JOINT TOLL BRIDGE COMMISSION  
Schedule of Toll Revenue – Cash (Continued)  
For the Year Ended December 31, 2015

Class	Description	Rate	Portland-Columbia		Delaware Water Gap		Milford-Montage		Totals	
			Cash Volume	Cash Revenue	Cash Volume	Cash Revenue	Cash Volume	Cash Revenue	Cash Volume	Cash Revenue
01	Automobile Subtotal	\$ 1.00	467,665	\$ 467,665	3,012,757	\$ 3,012,757	523,893	\$ 523,893	12,118,579	\$ 12,118,579
11	Auto with 1-Axle Trailer	2.00	2,134	4,268	10,480	20,960	2,889	5,778	37,869	75,738
12	Auto with 2-Axle Trailer	2.00	2,840	5,680	13,993	27,986	2,572	5,144	60,876	121,752
13	Auto with 3-Axle Trailer	2.00	36	72	802	1,604	113	226	3,153	6,306
	Automobile Subtotal		472,675	477,685	3,038,032	3,063,307	529,467	535,041	12,220,477	12,322,375
02	Comm'l 2-Axle Peak	6.50	5,345	34,743	36,015	234,098	5,627	36,576	168,389	1,094,532
02	Comm'l 2-Axle Off-Peak	5.85	-	-	-	-	-	-	-	-
03	Comm'l 3-Axle Peak	12.00	1,687	20,244	7,989	95,868	593	7,116	36,332	435,984
03	Comm'l 3-Axle Off-Peak	10.80	-	-	-	-	-	-	-	-
04	Comm'l 4-Axle Peak	16.00	1,678	26,848	6,261	100,176	500	8,000	25,413	406,608
04	Comm'l 4-Axle Off-Peak	14.40	-	-	-	-	-	-	-	-
05	Comm'l 5-Axle Peak	20.00	3,439	68,780	188,603	3,772,060	1,058	21,160	622,649	12,453,000
05	Comm'l 5-Axle Off-Peak	18.00	-	-	-	-	-	-	-	-
06	Comm'l 6-Axle Peak	24.00	81	1,944	1,593	38,232	33	792	4,705	112,920
06	Comm'l 6-Axle Off-Peak	21.60	-	-	-	-	-	-	-	-
07	Comm'l 7-Axle Peak	28.00	-	-	280	7,840	-	-	625	17,500
07	Comm'l 7-Axle Off-Peak	25.20	-	-	-	-	-	-	-	-
08	Comm'l Permit		-	-	7	346	-	-	12	493
	Commercial Subtotal		12,230	152,559	240,748	4,248,620	7,811	73,644	858,125	14,521,037
	Extra Axles Subtotal *		-	-	332	1,324	-	-	638	2,528
	Non-Revenue *		756		2,225		2,794		9,813	
	Gross Cash Tolls		484,905	630,244	3,278,780	7,313,251	537,278	608,685	13,078,602	26,845,940
	Discounts, Allowances and Other Adjustments			545		5,871		53		21,295
	Net Cash Revenue			\$ 630,789		\$ 7,319,122		\$ 608,738		\$ 26,867,235

\* Note: Extra Axles and Non-Revenue not Included in Total Volume Amount.



DELAWARE RIVER JOINT TOLL BRIDGE COMMISSION  
Schedule of Toll Revenue – Electronic Toll Collection  
For the Year Ended December 31, 2015

Class	Description	Rate	<u>Trenton-Morrisville</u>		<u>New Hope-Lambertville</u>		<u>Interstate 78</u>		<u>Easton-Phillipsburg</u>	
			ETC Volume	ETC Revenue	ETC Volume	ETC Revenue	ETC Volume	ETC Revenue	ETC Volume	ETC Revenue
01	Automobile Subtotal	\$ 1.00	4,875,925	\$ 4,876,511	1,409,330	\$ 1,409,511	5,626,867	\$ 5,627,433	3,195,169	\$ 3,195,431
11	Auto with 1-Axle Trailer	2.00	5,074	10,148	2,364	4,728	13,691	27,382	7,077	14,154
12	Auto with 2-Axle Trailer	2.00	5,613	11,226	4,161	8,322	15,017	30,034	5,937	11,874
13	Auto with 3-Axle Trailer	2.00	355	710	66	132	69	138	73	146
15	Default		14	14	2	2	20	20	24	24
	Automobile Subtotal		<u>4,886,981</u>	<u>4,898,609</u>	<u>1,415,923</u>	<u>1,422,695</u>	<u>5,655,664</u>	<u>5,685,007</u>	<u>3,208,280</u>	<u>3,221,629</u>
02	Comm'l 2-Axle Peak	6.50	177,618	1,154,518	43,147	280,456	189,222	1,229,943	95,847	623,006
02	Comm'l 2-Axle Off-Peak	5.85	15,816	92,524	4,024	23,540	26,256	153,598	8,554	50,041
03	Comm'l 3-Axle Peak	12.00	74,964	899,568	14,016	168,192	109,082	1,308,984	27,654	331,848
03	Comm'l 3-Axle Off-Peak	10.80	4,769	51,505	1,169	12,625	26,377	284,872	4,374	47,239
04	Comm'l 4-Axle Peak	16.00	76,347	1,221,552	5,259	84,144	134,033	2,144,528	28,094	449,504
04	Comm'l 4-Axle Off-Peak	14.40	11,199	161,266	2,820	40,608	49,971	719,582	2,716	39,110
05	Comm'l 5-Axle Peak	20.00	131,755	2,635,100	21,115	422,300	1,350,543	27,010,860	68,364	1,367,280
05	Comm'l 5-Axle Off-Peak	18.00	35,789	644,202	5,306	95,508	446,271	8,032,878	21,097	379,746
06	Comm'l 6-Axle Peak	24.00	808	19,392	432	10,368	43,149	1,035,576	689	16,536
06	Comm'l 6-Axle Off-Peak	21.60	273	5,897	357	7,711	23,441	506,326	164	3,542
07	Comm'l 7-Axle Peak	28.00	76	2,148	51	1,440	5,295	148,292	23	644
07	Comm'l 7-Axle Off-Peak	25.20	11	277	6	151	2,124	53,525	4	101
08	Comm'l Permit		-	-	-	-	-	-	-	-
	Commercial Subtotal		<u>529,425</u>	<u>6,887,949</u>	<u>97,702</u>	<u>1,147,043</u>	<u>2,405,764</u>	<u>42,628,964</u>	<u>257,580</u>	<u>3,308,597</u>
	Exit Violations		70,612	397,480	13,784	50,069	206,728	1,722,600	34,934	131,964
	Extra Axles Subtotal *		<u>55</u>	<u>168</u>	<u>6</u>	<u>24</u>	<u>235</u>	<u>835</u>	<u>29</u>	<u>72</u>
	Gross ETC Tolls		<u>5,487,018</u>	<u>12,184,206</u>	<u>1,527,409</u>	<u>2,619,831</u>	<u>8,268,156</u>	<u>50,037,406</u>	<u>3,500,794</u>	<u>6,662,262</u>
	Commuter Discounts			(283,039)		(88,907)		(358,283)		(192,915)
	Violations, Allowances and Other Adjustments			(854,298)		(174,401)		(2,620,848)		(695,225)
	Penalties on Violations			686,541		171,011		2,039,229		456,161
	Commission Vehicles			<u>(17,073)</u>		<u>(17,815)</u>		<u>(14,617)</u>		<u>(17,073)</u>
	Net ETC Revenue			<u>\$ 11,716,337</u>		<u>\$ 2,509,719</u>		<u>\$ 49,082,887</u>		<u>\$ 6,213,210</u>

\* Note: Extra Axles and Non-Revenue not Included in Total Volume Amount.

DELAWARE RIVER JOINT TOLL BRIDGE COMMISSION  
Schedule of Toll Revenue – Electronic Toll Collection (Continued)  
For the Year Ended December 31, 2015

Class	Description	Rate	<u>Portland-Columbia</u>		<u>Delaware Water Gap</u>		<u>Milford-Montage</u>		<u>Totals</u>	
			ETC Volume	ETC Revenue	ETC Volume	ETC Revenue	ETC Volume	ETC Revenue	ETC Volume	ETC Revenue
01	Automobile Subtotal	\$ 1.00	658,620	\$ 658,802	4,951,999	\$ 4,952,621	733,828	\$ 733,946	21,451,738	\$ 21,454,255
11	Auto with 1-Axle Trailer	2.00	2,333	4,666	13,013	26,026	3,012	6,024	46,564	93,128
12	Auto with 2-Axle Trailer	2.00	2,694	5,388	10,399	20,798	2,435	4,870	46,256	92,512
13	Auto with 3-Axle Trailer	2.00	25	50	93	186	29	58	710	1,420
15	Default		4	4	14	14	33	33	111	111
	Automobile Subtotal		663,676	668,910	4,975,518	4,999,645	739,337	744,931	21,545,379	21,641,426
02	Comm'l 2-Axle Peak	6.50	23,430	152,295	99,437	646,341	18,399	119,594	647,100	4,206,153
02	Comm'l 2-Axle Off-Peak	5.85	1,532	8,962	14,476	84,685	2,083	12,186	72,741	425,536
03	Comm'l 3-Axle Peak	12.00	11,511	138,132	63,271	759,252	2,880	34,560	303,378	3,640,536
03	Comm'l 3-Axle Off-Peak	10.80	907	9,796	15,585	168,318	161	1,739	53,342	576,094
04	Comm'l 4-Axle Peak	16.00	20,122	321,952	65,538	1,048,608	1,149	18,384	330,542	5,288,672
04	Comm'l 4-Axle Off-Peak	14.40	381	5,486	21,407	308,261	103	1,483	88,597	1,275,796
05	Comm'l 5-Axle Peak	20.00	25,631	512,620	640,917	12,818,340	5,780	115,600	2,244,105	44,882,100
05	Comm'l 5-Axle Off-Peak	18.00	3,241	58,338	208,327	3,749,886	811	14,598	720,842	12,975,156
06	Comm'l 6-Axle Peak	24.00	319	7,656	17,780	426,720	97	2,328	63,274	1,518,576
06	Comm'l 6-Axle Off-Peak	21.60	41	886	9,622	207,835	17	367	33,915	732,564
07	Comm'l 7-Axle Peak	28.00	46	1,288	1,047	29,348	17	480	6,555	183,640
07	Comm'l 7-Axle Off-Peak	25.20	19	479	460	11,592	-	-	2,624	66,125
08	Comm'l Permit		-	-	-	-	-	-	-	-
	Commercial Subtotal		87,180	1,217,890	1,157,867	20,259,186	31,497	321,319	4,567,015	75,770,948
	Exit Violations		9,421	50,456	106,245	767,985	10,766	23,733	452,490	3,144,287
	Extra Axles Subtotal *		14	35	287	1,011	280	4	906	2,149
	Gross ETC Tolls		760,277	1,937,291	6,239,630	26,027,827	781,600	1,089,987	26,564,884	100,558,810
	Commuter Discounts			(38,717)		(300,573)		(38,940)		(1,301,374)
	Violations, Allowances and Other Adjustments			(242,758)		(1,429,104)		(100,907)		(6,117,542)
	Penalties on Violations			110,381		1,186,704		105,822		4,755,849
	Commission Vehicles			(19,046)		(20,180)		(16,609)		(122,413)
	Net ETC Revenue			\$ 1,747,151		\$ 25,464,674		\$ 1,039,353		\$ 97,773,330

\* Note: Extra Axles and Non-Revenue not Included in Total Volume Amount.

DELAWARE RIVER JOINT TOLL BRIDGE COMMISSION  
Schedule of Operating Expenses  
For the Year Ended December 31, 2015 with Comparative Totals for 2014

<u>Description</u>	<u>Total</u> <u>Year Ended December 31,</u>		<u>Trenton -</u> <u>Morrisville</u>	<u>New Hope -</u> <u>Lambertville</u>	<u>I-78</u>	<u>Easton -</u> <u>Phillipsburg</u>
	<u>2014</u>	<u>2015</u>				
Salaries and Wages	\$ 18,021,867	\$ 18,833,821	\$ 1,665,974	\$ 991,275	\$ 2,319,312	\$ 1,794,779
Employee Benefits	13,051,865	16,864,086	1,554,036	981,514	2,102,259	1,542,449
Other Postemployment Benefits	<u>5,692,298</u>	<u>5,692,298</u>	<u>1,195,861</u>	<u>526,178</u>	<u>318,896</u>	<u>749,406</u>
	<u>36,766,030</u>	<u>41,390,205</u>	<u>4,415,871</u>	<u>2,498,967</u>	<u>4,740,467</u>	<u>4,086,634</u>
Heat, Light, and Power	774,546	674,067	132,743	97,866	98,367	97,933
Office Expense	198,286	181,667	2,998	752	2,435	2,478
Information Technology and Communications	887,697	1,033,754	63,605	54,013	45,769	62,277
Travel, Meetings, and Education Expense	117,990	122,672	757	1,372	3,744	4,661
E-Zpass Operating and Maintenance	5,814,397	6,495,764	1,259,780	458,350	1,897,068	870,894
State Police Bridge Security	4,693,830	5,053,772	737,065	159,319	857,600	410,855
Operating and Maintenance Expenses	2,857,485	2,840,263	244,951	181,641	427,138	204,979
Insurance	2,889,489	2,738,559	361,561	250,353	452,616	182,398
Professional Service Fees	1,348,895	976,298	-	-	-	-
Advertising and Marketing	29,183	15,583	-	-	-	-
Depreciation	<u>26,658,380</u>	<u>28,426,023</u>	<u>4,563,819</u>	<u>2,340,289</u>	<u>7,248,302</u>	<u>1,548,720</u>
	<u>46,270,178</u>	<u>48,558,422</u>	<u>7,367,279</u>	<u>3,543,955</u>	<u>11,033,039</u>	<u>3,385,195</u>
Total Operation Expenses	<u>\$ 83,036,208</u>	<u>\$ 89,948,627</u>	<u>\$ 11,783,150</u>	<u>\$ 6,042,922</u>	<u>\$ 15,773,506</u>	<u>\$ 7,471,829</u>

(Continued)

DELAWARE RIVER JOINT TOLL BRIDGE COMMISSION  
Schedule of Operating Expenses (Continued)  
For the Year Ended December 31, 2015 with Comparative Totals for 2014

<u>Description</u>	<u>Portland - Columbia</u>	<u>Delaware Water Gap</u>	<u>Milford - Montague</u>	<u>Toll Supported Bridges</u>	<u>Administrative Expenses</u>
Salaries and Wages	\$ 785,672	\$ 2,401,997	\$ 767,112	\$ 3,457,165	\$ 4,650,535
Employee Benefits	690,610	2,250,795	699,445	3,184,733	3,858,245
Other Postemployment Benefits	510,234	239,172	765,351	239,173	1,148,027
	<u>1,986,516</u>	<u>4,891,964</u>	<u>2,231,908</u>	<u>6,881,071</u>	<u>9,656,807</u>
Heat, Light, and Power	45,507	58,965	59,868	82,818	-
Office Expense	2,162	2,968	1,849	793	165,232
Information Technology and Communications	38,042	44,242	31,197	15,399	679,210
Travel, Meetings, and Education Expense	792	2,234	950	650	107,512
E-Zpass Operating and Maintenance	256,324	1,485,840	267,508	-	-
State Police Bridge Security	94,280	677,123	83,189	2,034,341	-
Operating and Maintenance Expenses	136,949	203,008	124,901	106,244	1,210,452
Insurance	135,728	377,324	108,703	644,655	225,221
Professional Service Fees	-	-	-	-	976,298
Advertising and Marketing	-	-	-	-	15,583
Depreciation	339,655	2,415,556	1,528,348	5,950,866	2,490,468
	<u>1,049,439</u>	<u>5,267,260</u>	<u>2,206,513</u>	<u>8,835,766</u>	<u>5,869,976</u>
Total Operation Expenses	<u>\$ 3,035,955</u>	<u>\$ 10,159,224</u>	<u>\$ 4,438,421</u>	<u>\$ 15,716,837</u>	<u>\$ 15,526,783</u>

DELAWARE RIVER JOINT TOLL BRIDGE COMMISSION  
 Analysis of E-ZPass and Violations Receivable  
 For the Year Ended December 31, 2015

Analysis of E-Zpass and Violations Receivable	
Balance January 1, 2015	\$ 6,322,768
Increased by:	
Gross E-Zpass Tolls	100,558,805
Delaware River Joint Toll Bridge Commission Vehicles	(122,409)
Commuter Discounts	(1,301,374)
Toll Violations, Allowanced and Charge-Offs	<u>(1,361,692)</u>
	<u>97,773,330</u>
	104,096,098
Decreased by:	
Cash Received from Other Agencies	94,664,962
Cash Received from Violations	2,962,560
Transfers from Customer Deposits	<u>-</u>
	<u>97,627,522</u>
Balance December 31, 2015	<u>\$ 6,468,576</u>
Analysis of Balance:	
E-Zpass - Due from Other Agencies	4,179,216
Toll Violations Receivable	14,131,550
Allowance for Uncollectibles	<u>(11,842,190)</u>
	<u>\$ 6,468,576</u>

## DELAWARE RIVER JOINT TOLL BRIDGE COMMISSION

Analysis of Improvements in Progress  
For the Year Ended December 31, 2015

Analysis of Improvements in Progress	
Balance January 1, 2015	\$ 26,835,619
Increased by:	
Disbursements	28,235,959
Capitalized Interest on Bonds	<u>640,481</u>
	<u>28,876,440</u>
	55,712,059
Decreased by:	
Transferred to Capital Assets - Completed	<u>17,535,512</u>
Balance December 31, 2015	<u>\$ 38,176,547</u>

Analysis of Capital Assets – Completed  
For the Year Ended December 31, 2015

## Transferred to Capital Assets - Completed

	<u>January 1, 2015</u>	<u>Additions</u>	<u>Deletions</u>	<u>December 31, 2015</u>
Land	\$ 129,888,166	\$ 62,500	\$ 12,208	\$ 129,938,458
Buildings	29,418,032	412,650	-	29,830,682
Infrastructure	645,415,950	17,435,787	-	662,851,737
Equipment	<u>34,062,368</u>	<u>2,676,308</u>	<u>20,414</u>	<u>36,718,262</u>
	838,784,516	20,587,245	32,622	859,339,139
Less: Accumulated Depreciation	<u>338,928,418</u>	<u>28,426,022</u>	<u>20,414</u>	<u>367,334,026</u>
	<u>\$ 499,856,098</u>	<u>\$ (7,838,777)</u>	<u>\$ 12,208</u>	<u>\$ 492,005,113</u>
Transferred from Improvements In Progress		\$ 17,535,511		
Disbursements		<u>3,051,734</u>		
		<u>\$ 20,587,245</u>		

DELAWARE RIVER JOINT TOLL BRIDGE COMMISSION  
Proprietary Fund  
Schedule of Investments  
As of December 31, 2015

<u>Face</u>	<u>Description</u>	<u>Coupon Rate</u>	<u>Date of Maturity</u>	<u>Amortized Cost</u>	<u>Fair Value Value</u>	<u>Rating S&amp;P</u>
\$ 4,000,000	Federal Home Loan Bank	0.375%	2/19/2016	\$ 4,001,480	\$ 4,000,160	AA+
1,445,000	Federal Home Loan Bank	0.375%	2/19/2016	1,445,535	1,445,058	AA+
10,000,000	Federal Home Loan Bank	0.375%	6/10/2016	9,998,500	9,994,600	AA+
8,000,000	Federal National Mortgage Association	0.625%	8/26/2016	8,009,176	8,001,200	AA+
3,250,000	Federal Home Loan Bank	0.520%	10/14/2016	3,242,980	3,247,173	AA+
8,000,000	Federal Home Loan Bank	1.625%	12/9/2016	8,145,912	8,060,320	AA+
10,000,000	Federal Home Loan Bank	0.875%	1/27/2017	10,008,500	9,986,800	AA+
2,100,000	Federal National Mortgage Association	1.250%	1/30/2017	2,125,641	2,108,210	AA+
4,500,000	Federal National Mortgage Association	1.250%	1/30/2017	4,554,945	4,517,595	AA+
8,500,000	Freddie Mac	1.000%	3/8/2017	8,541,480	8,507,055	AA+
8,500,000	Federal National Mortgage Association	0.750%	4/20/2017	8,506,715	8,477,560	AA+
11,000,000	Federal Farm Credit Bank	0.810%	7/13/2017	10,989,000	10,951,490	AA+
10,000,000	Federal Farm Credit Bank	1.020%	9/15/2017	9,990,000	9,985,700	AA+
4,140,000	Federal National Mortgage Association	1.030%	11/29/2017	4,131,306	4,124,185	AA+
10,000,000	Federal Home Loan Bank	1.150%	12/29/2017	9,999,500	9,998,700	AA+
2,600,000	Federal Farm Credit Bank	1.090%	4/13/2018	2,596,100	2,586,818	AA+
Total U.S. Federal Agency Notes and Bonds				\$ 106,286,770	\$ 105,992,624	
U.S. Government Treasuries:						
\$ 5,015,000	U.S. Treasury Notes	2.250%	3/31/2016	5,204,630	5,038,019	AAA
4,000,000	U.S. Treasury Notes	2.000%	4/30/2016	4,142,031	4,020,720	AAA
4,850,000	U.S. Treasury Notes	1.750%	5/31/2016	4,991,332	4,875,754	AAA
3,900,000	U.S. Treasury Notes	1.500%	7/31/2016	3,990,645	3,920,124	AAA
Total U.S. Government Treasuries				\$ 18,328,638	\$ 17,854,617	
Municipal & State Obligations and Funds:						
\$ 5,080,590	Pennsylvania Treasurer's INVEST Program	0.05%	1/1/2016	\$ 5,080,590	\$ 5,080,590	AAAm
Total Municipal & State Obligations and Funds				\$ 5,080,590	\$ 5,080,590	
Commercial Paper						
\$ 6,000,000	Toyota Motor Credit	0.000%	1/15/2016	\$ 5,986,467	\$ 5,986,467	
10,000,000	Old Line Fund	0.520%	3/4/2016	9,987,433	9,987,433	
10,000,000	JPM Chase	0.450%	3/9/2016	9,988,625	9,988,625	
Total Commercial Paper				\$ 25,962,525	\$ 25,962,525	
Total Investments				\$ 155,658,523	\$ 154,890,356	
Recapitulation of Balance						
Unrestricted Investments					\$ 148,750,269	
Restricted Investments					6,140,087	
Balance December 31, 2015					\$ 154,890,356	

DELAWARE RIVER JOINT TOLL BRIDGE COMMISSION  
Schedule of Revenue Bonds  
For the Year Ended December 31, 2015

<u>Series</u>	<u>Date of Issue</u>	<u>Original Issue</u>	<u>Maturities</u>		<u>Rate</u>	<u>Balance</u>		<u>Issued</u>	<u>Defeased</u>	<u>Decreased</u>	<u>Balance</u>	
			<u>Date</u>	<u>Amount</u>		<u>Jan. 1, 2015</u>					<u>Dec. 31, 2015</u>	
Series 2005A	3/23/2005	\$ 72,645,000	7/1/2016	4,125,000	5.50%							
			7/1/2017	4,350,000	5.50%							
			7/1/2018	4,590,000	5.50%							
			7/1/2019	4,835,000	5.50%							
			7/1/2020	5,105,000	5.50%	\$ 28,225,000	\$	-	\$	-	\$ 5,220,000	\$ 23,005,000
Series 2007A	7/19/2007	\$ 134,170,000	7/1/2016	1,760,000	5.00%							
			7/1/2017	2,000,000	5.00%	\$ 92,445,000	\$	-	\$ 86,765,000	\$	1,920,000	\$ 3,760,000
Series 2007B (Reissuance)	5/18/2011	\$ 139,650,000	7/1/2016	4,800,000	Variable							
			7/1/2017	4,950,000	Variable							
			7/1/2018	5,250,000	Variable							
			7/1/2019	5,450,000	Variable							
			7/1/2020	5,650,000	Variable							
			7/1/2021	5,950,000	Variable							
			7/1/2022	6,250,000	Variable							
			7/1/2023	6,550,000	Variable							
			7/1/2024	6,800,000	Variable							
			7/1/2025	7,150,000	Variable							
			7/1/2026	7,450,000	Variable							
			7/1/2027	7,800,000	Variable							
			7/1/2028	8,200,000	Variable							
			7/1/2029	8,550,000	Variable							
			7/1/2030	8,900,000	Variable							
			7/1/2031	9,350,000	Variable							
			7/1/2032	9,800,000	Variable	\$ 123,300,000	\$	-	\$	4,450,000	\$ 118,850,000	



DELAWARE RIVER JOINT TOLL BRIDGE COMMISSION  
Schedule of Revenue Bonds (Continued)  
For the Year Ended December 31, 2015

<u>Series</u>	<u>Date of Issue</u>	<u>Original Issue</u>	<u>Date</u>	<u>Maturities</u> <u>Amount</u>	<u>Rate</u>	<u>Balance</u> <u>Jan. 1, 2015</u>	<u>Issued</u>	<u>Defeased</u>	<u>Decreased</u>	<u>Balance</u> <u>Dec. 31, 2015</u>
Series 2012A	10/24/2012	\$ 77,145,000	7/1/2016	\$ 1,030,000	4.00%					
			7/1/2017	1,065,000	3.00%					
			7/1/2018	1,100,000	4.00%					
			7/1/2019	1,145,000	4.00%					
			7/1/2020	1,195,000	2.00%					
			7/1/2021	6,825,000	5.00%					
			7/1/2022	4,000,000	5.00%					
			7/1/2022	3,165,000	2.50%					
			7/1/2023	7,445,000	5.00%					
			7/1/2024	7,815,000	5.00%					
			7/1/2025	8,205,000	5.00%					
			7/1/2026	5,000,000	5.00%					
			7/1/2026	3,620,000	4.00%					
			7/1/2027	5,805,000	4.00%					
			7/1/2027	2,000,000	3.00%					
			7/1/2028	9,355,000	3.00%					
			7/1/2029	1,345,000	3.125%					
			7/1/2030	1,385,000	3.125%	\$ 71,500,000	\$ -	\$ -	\$ -	\$ 71,500,000
<u>Series</u>	<u>Date of Issue</u>	<u>Original Issue</u>	<u>Date</u>	<u>Maturities</u> <u>Amount</u>	<u>Rate</u>	<u>Balance</u> <u>Jan. 1, 2015</u>	<u>Issued</u>	<u>Defeased</u>	<u>Decreased</u>	<u>Balance</u> <u>Dec. 31, 2015</u>
Series 2012B	10/24/2012	\$ 20,865,000	7/1/2016	3,440,000	1.612%					
			7/1/2017	3,490,000	1.842%					
			7/1/2018	3,560,000	2.184%	\$ 13,875,000	\$ -	\$ -	\$ 3,385,000	\$ 10,490,000
<u>Series</u>	<u>Date of Issue</u>	<u>Original Issue</u>	<u>Date</u>	<u>Maturities</u> <u>Amount</u>	<u>Rate</u>	<u>Balance</u> <u>Jan. 1, 2015</u>	<u>Issued</u>	<u>Defeased</u>	<u>Decreased</u>	<u>Balance</u> <u>Dec. 31, 2015</u>
2015	4/29/2015	86,505,000	2019	2,410,000	4.00%					
			2020	2,540,000	5.00%					
			2021	2,540,000	5.00%					
			2022	2,695,000	5.00%					
			2023	2,795,000	4.00%					
			2024	2,935,000	5.00%					
			2025	3,015,000	5.00%					
			2026	3,180,000	5.00%					
			2027	4,540,000	3.00%					
			2028	3,380,000	3.125%					
			2029	3,480,000	5.00%					
			2030	3,670,000	5.00%					
			2031	3,785,000	5.00%					
			2032	545,000	3.375%					
			2033	10,595,000	4.00%					
			2034	11,020,000	4.00%					
			2035	11,460,000	4.00%					
			2036	11,920,000	3.625%					
						\$ -	\$ 86,505,000	\$ -	\$ -	\$ 86,505,000
						\$ 329,345,000	\$ 86,505,000	\$ 86,765,000	\$ 14,975,000	\$ 314,110,000
Principal Payments						\$ 9,839,586	\$ 6,076,193	\$ -	\$ 2,708,361	\$ 13,207,418
Net Premium on Bonds						\$ 339,184,586	\$ 92,581,193	\$ 86,765,000	\$ 17,683,361	\$ 327,317,418

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## **APPENDIX C**

### **DEFINITIONS OF CERTAIN TERMS AND SUMMARY OF CERTAIN PROVISIONS OF THE INDENTURE**

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## **APPENDIX C**

### **DEFINITIONS OF CERTAIN TERMS AND SUMMARY OF CERTAIN PROVISIONS OF THE INDENTURE**

The following sets forth definitions of certain terms used in the Trust Indenture, dated as of January 1, 2003 ("Original Indenture"), between the Delaware River Joint Toll Bridge Commission ("Commission") and TD Bank, National Association, as successor to Commerce Bank/Pennsylvania, National Association, as trustee ("Trustee"), as supplemented and amended by the First Supplemental Indenture, dated as of January 1, 2003 ("First Supplemental Indenture"), between the Commission and the Trustee, the Second Supplemental Indenture, dated as of March 1, 2005 ("Second Supplemental Indenture"), between the Commission and the Trustee, the Third Supplemental Indenture, dated as of October 6, 2005 ("Third Supplemental Indenture"), between the Commission and the Trustee, the Fourth Supplemental Indenture, dated as of September 1, 2007 ("Fourth Supplemental Indenture"), between the Commission and the Trustee, the Fifth Supplemental Indenture, dated as of August 1, 2008 ("Fifth Supplemental Indenture"), between the Commission and the Trustee, the Sixth Supplemental Indenture, dated as of May 1, 2011 ("Sixth Supplemental Indenture"), between the Commission and the Trustee, the Seventh Supplemental Indenture, dated as of October 1, 2012 ("Seventh Supplemental Indenture"), between the Commission and the Trustee, the Eighth Supplemental Indenture, dated as of May 1, 2014 ("Eighth Supplemental Indenture"), the Ninth Supplemental Indenture, dated as of April 1, 2015 ("Ninth Supplemental Indenture"), and the Tenth Supplemental Indenture, dated as of February 1, 2017 ("Tenth Supplemental Indenture", and together with the First Supplemental Indenture, the Second Supplemental Indenture, the Third Supplemental Indenture, the Fourth Supplemental Indenture, the Fifth Supplemental Indenture, the Sixth Supplemental Indenture, the Seventh Supplemental Indenture, the Eighth Supplemental Indenture and the Ninth Supplemental Indenture, the "Supplemental Indentures") (the Original Indenture, as supplemented and amended by the Supplemental Indentures is referred to herein as the "Indenture"), and a summary of certain provisions of the Indenture and the Fourth Supplemental Indenture, as such Fourth Supplemental Indenture has heretofore been supplemented and amended by the Fifth Supplemental Indenture, the Sixth Supplemental Indenture, and the Eighth Supplemental Indenture. Certain other provisions of the Indenture relating to the Series 2017 Bonds are summarized in the Official Statement under the sections captioned "DESCRIPTION OF THE SERIES 2017 BONDS" and "SECURITY FOR THE SERIES 2017 BONDS". Reference should be made to the Indenture for a more complete statement of such provisions and certain other provisions which are not summarized in the Official Statement. Copies of the Indenture, including the text of the Series 2017 Bonds, may be obtained from the Trustee.

### **DEFINITIONS OF CERTAIN TERMS**

"Additional Bonds" -- Bonds of any Series authorized to be issued under the Indenture, other than Initial Bonds.

"Affiliate" -- means any person or entity directly or indirectly controlling, controlled by or under common control with the Commission.

"Alternate Credit Enhancement" or "Alternate Liquidity Facility" -- shall mean a letter of credit, insurance policy, line of credit, surety bond, standby purchase agreement or other security or liquidity instrument, as the case may be, issued in accordance with the terms hereof as a replacement or substitute for any Credit Enhancement or Liquidity Facility, as applicable, then in effect.

"Alternate Index" -- means for the sub-Series 2007B-1 Bonds as of any Computation Date (i) if the LIBOR Index is less than 1.00% the Alternate Index shall be 100% of the LIBOR Index, and (ii) if the LIBOR Index is equal to or greater than 1.00%, the Alternate Index shall be 75% of the LIBOR Index.

"Alternate Rate" -- shall mean, on any Rate Determination Date, for any Mode, a rate per annum equal to (a) the SIFMA Municipal Swap Index maintained by Municipal Market Data (as such term is defined in the 2000 ISDA U.S. Municipal Counterparty Definitions) (the "SIFMA Rate") most recently available as of the date of determination, or (b) if such index is no longer available, or if the SIFMA Rate is no longer published, the Kenny Index (as such term is defined in the 2000 ISDA U.S. Municipal Counterparty Definitions), or if neither the SIFMA Rate nor the Kenny Index is published, the index determined by the Remarketing Agent to equal the prevailing rate

for tax-exempt state and local government bonds meeting criteria determined in good faith by the Remarketing Agent to be comparable under the circumstances to the criteria used by the Bond Market Association to determine the SIFMA Rate just prior to when the Bond Market Association stopped publishing the SIFMA Rate. The Tender Agent shall make the determinations required by this definition, upon notification from the Commission, if there is no Remarketing Agent, if the Remarketing Agent fails to make any such determination or if the Remarketing Agent has suspended its remarketing efforts in accordance with the Remarketing Agreement.

"Annual Capital Budget" -- the budget adopted by the Commission pursuant to Section 702(b) of the Indenture.

"Annual Operating Budget" -- the budget adopted by the Commission pursuant to Section 702(a) of the Indenture.

"Annual Debt Service" -- (a) the amount of principal and interest paid or payable with respect to Bonds in a Fiscal Year plus (b) Reimbursement Obligations paid or payable by the Commission in such Fiscal Year (but only to the extent they are not duplicative of such principal and interest), plus (c) the amounts, if any, paid or payable by the Commission in such Fiscal Year with respect to Approved Swap Agreements, minus (d) the amounts, if any, paid or payable to the Commission in such Fiscal Year with respect to Approved Swap Agreements, provided that the difference between the amounts described in clauses (c) and (d) shall be included only to the extent that such difference would not be recognized as a result of the application of the assumptions set forth below. The following assumptions shall be used to determine the Annual Debt Service becoming due in any Fiscal Year:

(1) in determining the principal amount paid or payable with respect to Bonds or Reimbursement Obligations in each Fiscal Year, payment shall be assumed to be made in accordance with any amortization schedule established for such Indebtedness, including amounts paid or payable pursuant to any mandatory redemption schedule for such Indebtedness;

(2) if any of the Indebtedness or proposed Indebtedness constitutes Balloon Indebtedness, then such amounts thereof as constitute Balloon Indebtedness shall be treated as if such Indebtedness is to be amortized in substantially equal annual installments of principal and interest over a term of 25 years from the date of issuance of such Indebtedness. Anything to the contrary in the Indenture notwithstanding, during the year preceding the final maturity date of such Indebtedness, all of the principal thereof shall be considered to be due on such maturity date unless the Commission provides to the Trustee a certificate of a Financial Consultant certifying that, in its judgment, the Commission will be able to refinance such Balloon Indebtedness, in which event the Balloon Indebtedness shall be amortized over the term of the Indebtedness expected to refinance such Balloon Indebtedness and shall bear the interest rate specified in the certificate of the Financial Consultant;

(3) if any of the Indebtedness or proposed Indebtedness constitutes Variable Rate Indebtedness, then interest in future periods shall be based on the Assumed Variable Rate; and

(4) Termination or similar payments under an Approved Swap Agreement shall not be taken into account in any calculation of Annual Debt Service.

"Applicable Margin" or "Applicable Spread" -- shall have the meanings set forth for such terms in the applicable Index Rate Agreement.

"Applicable Long-Term Indebtedness" -- includes Bonds, Reimbursement Obligations and obligations of the Commission under Approved Swap Agreements, to the extent the same constitute Long-Term Indebtedness, and excludes Subordinated Indebtedness.

"Approved Swap Agreement" -- shall have the meaning set forth in Section 211 of the Indenture.

"ARS Mode" -- means the Mode during which the 2007B Bonds bear interest at the Auction Period Rate; provided however, that upon (i) the initial issuance of the 2007B Bonds and (ii) a conversion to the ARS Mode, the 2007B Bonds may bear interest for an Initial Period at a rate determined by the Broker-Dealer, as set forth in Exhibit "C" to the Fourth Supplemental Indenture.

"Assumed Variable Rate" -- in the case of (a) Outstanding Variable Rate Indebtedness, the average interest rate on such Indebtedness for the most recently completed 12-month period; and (b) proposed Variable Rate Indebtedness, (1) which will, in the opinion of Bond Counsel delivered at the time of the issuance thereof, be excluded from gross income for federal income tax purposes, the average of the Bond Market Association Swap Index ("BMA Index") for the 12 months ending 7 days preceding the date of calculation plus 100 basis points, or (2) in the case of Bonds not described in clause (1), the London Interbank Offered Rate ("LIBOR") most closely resembling the reset period for the Variable Rate Indebtedness plus 100 basis points; provided that if the BMA Index or LIBOR shall cease to be published, the index to be used in its place shall be that index which the Commission in consultation with the Financial Consultant determines most closely replicates such index, as set forth in a certificate of a Commission Official filed with the Trustee.

"Auction Agent" -- shall have the meaning set forth in Exhibit "C" to the Fourth Supplemental Indenture.

"Auction Period" -- shall have the meaning set forth in Exhibit "C" to the Fourth Supplemental Indenture.

"Auction Period Rate" -- means the Auction Rate or any other rate of interest to be borne by the 2007B Bonds during each Auction Period determined in accordance with Section 2.04 of Exhibit "C" to the Fourth Supplemental Indenture; provided, however, in no event may the Auction Period Rate exceed the Maximum Rate.

"Auction Procedures" -- shall mean the procedures set forth in Exhibit "C" to the Fourth Supplemental Indenture.

"Auction Rate" -- shall have the meaning set forth in Exhibit "C" to the Fourth Supplemental Indenture.

"Authenticating Agent" -- that Person designated and authorized to authenticate any series of Bonds or such Person designated by the Authenticating Agent to serve such function, and shall initially be the Trustee.

"Authorized Denominations" -- with respect to any Bonds issued under a Supplemental Indenture, those denominations specified in such Supplemental Indenture.

"Automatic Termination Event" -- shall mean an event of default set forth in the Reimbursement Agreement between the Commission and the Liquidity Provider, if any, which would result in the immediate termination of the Liquidity Facility prior to its stated expiration date without prior notice from the Liquidity Provider to the Tender Agent, other than a termination upon the substitution of an Alternate Liquidity Facility.

"Available Amount" -- shall mean the amount available under the Credit Enhancement or Liquidity Facility, as applicable, to pay the principal of and interest on the 2007B Bonds or the Purchase Price of the 2007B Bonds, as applicable.

"Available Moneys" -- shall mean (i) moneys held by the Trustee (other than in the Rebate Fund or the Purchase Fund) and under the Indenture for a period of at least 123 days and not commingled with any moneys so held for less than said period and during which period no petition in bankruptcy was filed by or against, and no receivership, insolvency, assignment for the benefit of creditors or other similar proceeding has been commenced by or against, the Commission, unless such petition or proceeding was dismissed and all applicable appeal periods have expired without an appeal having been filed, (ii) investment income derived from the investment of moneys described in clause (i) or (iii) any moneys with respect to which an opinion of nationally recognized bankruptcy counsel has been received by the Trustee to the effect that payments by the Trustee in respect of the 2007B Bonds, as provided in the Indenture, derived from such moneys should not constitute transfers avoidable under 11 U.S.C. §547(b) and recoverable from the Owners under 11 U.S.C. §550(a) should the Commission be the debtor in a case under Title 11 of the United States Code, as amended.

"Balloon Indebtedness" -- Long-Term Indebtedness of which 25% or more of the principal matures in the same Fiscal Year and is not required by the documents pursuant to which such Indebtedness was issued to be amortized by payment or redemption prior to that Fiscal Year, provided that such Indebtedness will not constitute Balloon Indebtedness if the Trustee is provided a certificate of a Commission Official certifying that such

Indebtedness is not to be treated as Balloon Indebtedness (because, by way of example, such Indebtedness is intended to serve as "wrap around" Indebtedness).

"Bank" -- as to any particular Series of Bonds, each Person (other than a Bond Insurer) providing a letter of credit, a line of credit, a guaranty or another credit or liquidity enhancement facility as designated in the Supplemental Indenture providing for the issuance of such Bonds.

"Bank Fee" -- any commission, fee or expense payable to a Bank pursuant to a Reimbursement Agreement (but not amounts payable as reimbursement for amounts drawn under a Credit Facility or interest on such amounts).

"Bankruptcy Law" -- Title 9 of the United States Code, as amended from time to time, and any successor to or replacement of such Title and any other applicable federal or state bankruptcy, insolvency or similar law.

"Beneficial Owner" -- the beneficial owner of any Bond which is held by a nominee.

"Bond" or "Bonds" -- indebtedness of any kind or class, including bonds, notes, bond anticipation notes, commercial paper and other obligations, issued as Initial Bonds or Additional Bonds under Section 210 of the Indenture, other than Additional Bonds issued as Subordinated Indebtedness.

"Bond Buyer Index" -- shall mean the Bond Buyer 20-Bond Index as published weekly in "The Bond Buyer". If such Index shall cease to be published, the Financial Consultant shall select another index which shall be reflective of the Commission's fixed borrowing cost.

"Bond Counsel" -- any attorney or firm of attorneys whose experience in matters relating to the issuance of obligations by states and their political subdivisions is nationally recognized.

"Bond Insurer" -- as to any particular maturity or any particular Series of Bonds, the Person undertaking to insure such Bonds as designated in a Supplemental Indenture providing for the issuance of such Bonds.

"Bond Insurance Policy" -- means, as to any particular maturity or any particular Series of Bonds, the municipal bond insurance policy insuring the timely payment of the principal of (including mandatory sinking fund installments, if any) and interest on the particular maturity or Series of Bonds by the Bond Insurer.

"Bond Owner," "Bondholder," "Holder," "Owner" or "Registered Owner" (or the lower case version of the same) -- the Person in whose name any Bond or Bonds are registered on the books maintained by the Registrar.

"Bond Register" -- the register maintained pursuant to Section 205 of the Indenture.

"Bond Registrar" -- with respect to any series of Bonds, that Person which maintains the Bond Register or such other entity designated by the Bond Registrar to serve such function and initially shall be the Trustee.

"Book Entry Bonds" -- shall mean Bonds issued under a Book-Entry-Only System as provided in the Indenture.

"Book-Entry-Only System" -- a system similar to the system described in the Indenture pursuant to which Bonds are registered in book-entry form.

"Bridge Act" -- the Bridge Act of 1906, as amended (33 U.S.C. §491 *et seq.*), the General Bridge Act of 1946, as amended (33 U.S.C. §§525 *et seq.*), and any successor statute of similar import. References in the Indenture to the Bridge Act shall also be deemed to refer to Section 135 of the Surface Transportation and Uniform Relocation Assistance Act of 1987 (33 U.S.C. §508), as the same may be amended from time to time, and any successor legislation of similar import.

"Broker-Dealers" shall have the meaning set forth in Exhibit "C" to the Fourth Supplemental Indenture.

"Broker-Dealer Agreements" shall have the meaning set forth in Exhibit "C" to the Fourth Supplemental Indenture.



"Business Day" -- any day other than a Saturday or a Sunday or a day on which banking institutions are required or authorized by law or executive order to remain closed in the city in which the designated office of the Trustee is located, the Commonwealth, the State or the City of New York.

"Calculation Agent" -- means, (i) during the Initial Period, the Purchaser, in the case of the 2007B-1 Bonds, and, the Purchaser, in the case of the 2007B-2 Bonds, and (ii) during any other SIFMA Index Rate Period, the Trustee or any other person appointed by a Commission Official with the consent of the applicable Purchaser, to serve as calculation agent for 2007B Bonds.

"Code" -- the Internal Revenue Code of 1986, as amended, and the regulations proposed or in effect with respect thereto.

"Commonwealth" -- the Commonwealth of Pennsylvania.

"Commission Official" -- the Chairman, the Executive Director, the Secretary, or any commissioner, director, officer or employee of the Commission authorized to perform specific acts or duties by resolution duly adopted by the Commission.

"Commercial Paper Rate" -- shall mean the per annum interest rate on a 2007B Bond in the CP Mode determined for such Bond pursuant to Section 4.5 of the Fourth Supplemental Indenture. The 2007B Bonds in the CP Mode may bear interest at different Commercial Paper Rates.

"Commercial Paper Rate Bond" shall mean a 2007B Bond in the Commercial Paper Mode.

"Commercial Paper Rate Period" shall mean the period of from one to the lesser of (i) 270 calendar days, or (ii) such lesser number of days specified in a Credit Facility (which period must end on a day preceding a Business Day) during which a Commercial Paper Rate Bond shall bear interest at a Commercial Paper Rate, as established by the Remarketing Agent pursuant to Section 4.5 of the Fourth Supplemental Indenture. The 2007B Bonds in the CP Mode may be in different Commercial Paper Rate Periods.

"Commission Purchase Account" shall mean the account of that name created in Section 5.9 of the Fourth Supplemental Indenture.

"Compact" -- the agreement or compact made by and between the Commonwealth and the State entitled "Agreement between the Commonwealth of Pennsylvania and the State of New Jersey Creating the Delaware River Joint Toll Bridge Commission as a Body Corporate and Politic and Defining its Powers and Duties", dated December 19, 1934, as such agreement has been heretofore or may hereafter be amended and supplemented, which Agreement has heretofore been authorized by certain Acts of the Senate and General Assembly of the State and certain Acts of the General Assembly of the Commonwealth and heretofore consented to by certain Acts of the Congress of the United States.

"Computation Date" means (i) with respect to the 2007B-1 Bonds during each SIFMA Index Rate Period, Wednesday of each week, or if any Wednesday is not a Business Day, the next preceding Business Day, and (ii) with respect to the 2007B-2 Bond during each SIFMA Index Rate Period, Wednesday of each week, or if any Wednesday is not a Business Day, the next preceding Business Day; provided, however, that in connection with the conversion of 2007B Bonds to a SIFMA Index Rate Mode, the Computation Date for the first SIFMA Index Interest Period shall be the Wednesday next preceding the Mode Change Date unless a different date is specified in the related Index Rate Agreement and duly noticed to the Calculation Agent and Trustee; provided further that if the Alternate Index is applied in connection with the determination of the SIFMA Index, the Computation Date shall be the day which is two London Business Days immediately preceding the Wednesday that would otherwise be the Computation Date.

"Conditional Redemption" -- shall have the meaning set forth in Section 302 of the Indenture.

"Consultant" -- a Person who shall be independent, appointed by the Commission as needed, qualified and having a nationwide and favorable reputation for skill and experience in such work for which the Consultant was appointed. In those situations in which a Consultant is appointed to survey risks and to recommend insurance coverage, such Consultant may be a broker or agent with whom the Commission transacts business.

"Consulting Engineers" -- the engineer or engineering firm or corporation at the time employed by the Commission under the provisions of Section 707 of the Indenture.

"Continuing Covenant Agreement" -- means the Continuing Covenant Agreement dated as of May 1, 2011, between the Commission and Wells Fargo Bank, National Association, as the Purchaser of the sub-Series 2007B-1 Bonds, as the same may be amended from time to time.

"Cost" -- all or any part of:

(a) the cost of acquisition, construction, reconstruction, restoration, repair and rehabilitation of a Project or portion thereof (including, but not limited to, indemnity and surety bonds, permits, taxes or other municipal or governmental charges lawfully levied or assessed during the permit or approval process and during construction);

(b) the cost of acquisition of all real or personal property, rights, rights-of-way, franchises, easements and interests acquired or used for such Project or portion thereof;

(c) the cost of demolishing or removing any structures on land so acquired, including the cost of acquiring any land to which the structures may be removed;

(d) any cost of borings and other preliminary investigations necessary or incident to determining the feasibility or practicability of constructing such Project and any cost necessary or desirable to satisfy conditions associated with the issuance of any permit for the construction thereof (including the costs of environmental mitigation required in connection therewith);

(e) the cost of all machinery and equipment, vehicles, materials and rolling stock;

(f) Issuance Costs;

(g) interest on Bonds and on any Reimbursement Obligation for the period prior to, during and for a period of up to one year after completion of construction as determined by the Commission, provisions for working capital, reserves for principal and interest and for extensions, enlargements, additions, replacements, renovations and improvements;

(h) the cost of architectural, engineering, environmental feasibility, financial and legal services;

(i) plans, specifications, estimates and administrative and other expenses which are necessary or incidental to the determination of the feasibility of constructing such Project or portion thereof or incidental to the obtaining of construction contracts or to the construction (including construction administration and inspection), acquisition or financing thereof and which constitute capital costs;

(j) Current Expenses, provided that, if applicable, the Trustee has received an opinion of Bond Counsel (which opinion may address either specific Current Expenses or categories of Current Expenses) to the effect that the treatment of such Current Expenses as a Cost will not adversely affect the exclusion of interest on the Bonds from gross income for federal income tax purposes;

(k) the repayment of any loan or advance for any of the foregoing;

(l) In the case of any Project consisting of a grant or loan to be made by the Commission to any Person, all or any portion of such grant or loan, and any costs or expenses of any nature relating to the making

of such grant or loan or the administration, servicing or collection thereof or of any grant or loan program associated therewith, as the case may be; and

(m) with respect to the use of Bond proceeds, such other costs and expenses as are permitted by the Compact at the time such Bonds are issued.

"Counsel" -- an attorney or law firm (who may be counsel for the Commission) not unsatisfactory to the Trustee.

"CP Mode" -- shall mean the Mode during which the 2007B Bonds bear interest at the Commercial Paper Rate.

"Credit Enhancement" -- shall have the same meaning as the term Credit Facility as set forth in the General Indenture.

"Credit Facility" -- any letter of credit, line of credit, standby letter of credit, indemnity or surety insurance policy or agreement to purchase a debt obligation or any similar extension of credit, credit enhancement or liquidity support obtained by the Commission from a responsible financial or insurance institution, to provide for or to secure payment of principal and purchase price of, and/or interest on Bonds pursuant to the provisions of a Supplemental Indenture under which such Bonds are issued. The use of such definition is not intended to preclude the Commission from providing the credit or liquidity support with respect to one or more series of Bonds directly rather than through a financial or insurance institution.

"Credit Provider" -- shall mean the issuer of any particular Credit Facility, and its successors and assigns as such issuer.

"Credit Provider Failure" or "Liquidity Provider Failure" -- shall mean, with respect to any Credit Provider at any particular time, the occurrence and continuance of one or more of the following events: (a) such Credit Provider shall have failed to pay or perform when due its obligations under the Credit Facility issued by it; (b) the Credit Facility issued by such Credit Provider or any material term or provision thereof shall cease to be in full force and effect (except in accordance with such Credit Facility), or such Credit Provider shall, or shall purport to, terminate (except in accordance with the terms of such Credit Facility), repudiate, declare voidable or void or otherwise contest the validity of, such Credit Facility or any term or provision thereof or any obligation or liability of such Credit Provider thereunder; (c) the commencement by such Credit Provider of a voluntary case or other proceeding seeking liquidation, reorganization or other relief with respect to itself or its debts under any bankruptcy, insolvency or other similar law now or hereafter in effect including, without limitation, the appointment of a trustee, receiver, liquidator, custodian or other similar official for itself or any substantial part of its property; or (d) the consent of such Credit Provider to any relief referred to in the previous clause (c) in an involuntary case or other proceeding commenced against it.

"Current Expenses" -- the Commission's reasonable and necessary current expenses of maintenance, repair and operation of the System, including, without limiting the generality of the foregoing, all premiums for insurance and payments into any self-insurance reserve fund, all administrative, management, service and engineering expenses relating to maintenance, repair and operation of the System, fees and expenses of the Trustee and of the Paying Agents, Policy Costs, legal expenses and any other expenses required to be paid by the Commission as shown in the Annual Operating Budget for the System. Such amount may be computed in the aggregate or separately for the toll and toll-supported portions of the System.

"Current Mode" shall have the meaning specified in Section 4.10(a)(i) of the Fourth Supplemental Indenture.

"Daily Mode" shall mean the Mode during which a 2007B Bond bears interest at the Daily Rate.

"Daily Rate" shall mean the per annum interest rate on any 2007B Bond in the Daily Mode determined pursuant to Section 4.6(a) of the Fourth Supplemental Indenture.

"Daily Rate Period" shall mean the period during which a 2007B Bond in the Daily Mode shall bear a Daily Rate, which shall be from the Business Day upon which a Daily Rate is set, to but not including the next succeeding Business Day.

"Default Rate" shall have the meaning given such term in the applicable Index Rate Agreement.

"Delayed Remarketing Period" shall have the meaning specified in Section 5.10(b) of the Fourth Supplemental Indenture.

"Debt Service Fund" -- the fund created by Section 503 of the Indenture.

"Debt Service Reserve Fund" -- the fund created by Section 503 of the Indenture.

"Debt Service Reserve Fund Bonds" -- shall mean the Long-Term Indebtedness specified by the Commission in the Indenture or in any Supplemental Indenture that is secured by the Debt Service Reserve Fund as described in Section 507 of the Indenture.

"Debt Service Reserve Requirement" -- with respect to all Debt Service Reserve Fund Bonds, an amount equal to the Maximum Annual Debt Service on account of all of such Bonds, provided however, that the amount to be deposited in connection with the issuance of any Series of Bonds (or issue of Bonds, if multiple Series are considered one issue for tax purposes) shall not exceed an amount equal to the lesser of (A) ten percent (10%) of the original principal amount of each Series of Bonds (or the issue price of such Series, or issue as aforesaid, if the original issue discount and plus any original issue premium of such issue exceeds two percent (2%) of the original aggregate principal amount of the Series of Bonds), or (B) 125% of the average annual debt service requirement on said Series of Bonds of the same issue for tax purposes.

"Defeasance Securities" –

- (a) Cash,
- (b) Government Obligations,
- (c) Government Obligations which have been stripped by the U.S. Treasury and CATS, TIGRS and similar securities,
- (d) Resolution Funding Corp. strips which have been stripped by the Federal Reserve Bank of New York,
- (e) Pre-refunded obligations of a state or municipality rated in the highest rating category by the Rating Agency, and
- (f) Obligations issued by the following agencies which are backed by the full faith and credit of the U.S.:
  - (1) Farmers Home Administration: Certificates of beneficial ownership,
  - (2) Federal Financing Bank,
  - (3) General Services Administration: Participation certificates,
  - (4) U.S. Maritime Administration: Guaranteed Title XI financing,
  - (5) U.S. Department of Housing and Urban Development: Project Notes Local Authority Bonds New Communities Debentures – U.S. government guaranteed debentures, or

(6) U.S. Public Housing Notes and Bonds: U.S. government guaranteed public housing notes and bonds.

"Depository" -- a bank or trust company designated as such by the Commission to receive moneys under the provisions of the Indenture and approved by the Trustee, and shall include the Trustee.

"Depository Participants" -- any Person for which the Securities Depository holds Bonds as securities depository.

"DSRF Security" -- shall have the meaning set forth in Section 507 of the Indenture.

"DTC" -- means The Depository Trust Company, a limited-purpose trust company organized under the laws of the State of New York, or any successor thereto.

"DTC Participant" -- means any securities broker or dealer, bank, trust company, clearing corporation or other Person having an account at DTC.

"Electronic Means" -- shall mean facsimile transmission, e-mail transmission or other similar electronic means of communication providing evidence of transmission, including a telephone communication confirmed by any other method set forth in this definition.

"Eligible Account" -- means an account which is either (a) maintained with a federal or state-chartered depository institution or trust company that has an S&P short-term debt rating of at least 'A-2' (or, if no short-term debt rating, a long-term debt rating of 'BBB+'); or (b) maintained with the corporate trust department of a federal depository institution or state-chartered depository institution subject to regulations regarding fiduciary funds on deposit similar to Title 12 of the U.S. Code of Federal Regulation Section 9.10(b), which, in either case, has corporate trust powers and is acting in its fiduciary capacity.

"Expiration Date" -- shall mean the stated expiration date of the Credit Enhancement or the Liquidity Facility, as it may be extended from time to time as provided in the Credit Enhancement or the Liquidity Facility, or any earlier date on which the Credit Enhancement or the Liquidity Facility shall terminate at the direction of the Commission, expire or be cancelled.

"Event of Bankruptcy" -- the filing of a petition in bankruptcy (or other commencement of a bankruptcy or similar proceedings) by or against the Commission as debtor under the Bankruptcy Law.

"Event of Default" -- those events specified in Section 801 of the Indenture and such other events specified in any Supplemental Indentures.

"Favorable Opinion" -- means an opinion of nationally recognized bond counsel addressed to the Commission, the Trustee and the Paying Agent to the effect that (i) the action proposed to be taken is authorized or permitted by the Compact and the Indenture and (ii) such action will not adversely affect the exclusion from gross income for purposes of federal income taxation of interest on the Bonds.

"Financial Consultant" -- any financial advisor or firm of financial advisors of favorable national reputation for skill and experience in performing the duties for which a Financial Consultant is required to be employed pursuant to the provisions of the Indenture and who is retained by the Commission as a Financial Consultant for the purposes of the Indenture.

"Fiscal Year" -- the period commencing on the first day of January and ending on the last day of December of the same year.

"Fitch" -- Fitch Ratings, its successors and assigns, and, if such corporation shall for any reason no longer perform the functions of a securities rating agency, "Fitch" shall be deemed to refer to any nationally recognized securities rating agency selected by the Commission other than S&P and Moody's after consultation with the Remarketing Agent, if any, and the Broker-Dealers, if any.

"Fixed Rate" -- shall mean the per annum interest rate on any 2007B Bond in the Fixed Rate Mode determined pursuant to Section 4.7(b) of the Fourth Supplemental Indenture.

"Fixed Rate Bond" -- shall mean a 2007B Bond in the Fixed Rate Mode.

"Fixed Rate Mode" -- shall mean the Mode during which a 2007B Bond bears interest at the Fixed Rate.

"Fixed Rate Period" -- shall mean for 2007B Bonds in the Fixed Rate Mode, the period from the Mode Change Date upon which the 2007B Bonds were converted to the Fixed Rate Mode to but not including the Maturity Date for the 2007B Bonds.

"Forward Purchase Continuing Covenant Agreement" -- shall mean the Forward Purchase Continuing Covenant Agreement dated as of January 1, 2014, by and between Delaware River Joint Toll Bridge Commission and Wells Fargo Municipal Capital Strategies, LLC, relating to the Series 2007B-2 Bonds.

"General Reserve Fund" -- the fund created by Section 503 of the Indenture.

"Government Obligations" --

(a) direct obligations of, or obligations the principal of and interest on which are unconditionally guaranteed as to full and timely payment by, the United States of America,

(b) obligations issued by a Person controlled or supervised by and acting as an instrumentality of the United States of America, the payment of the principal of and interest on which is fully and unconditionally guaranteed as a full faith and credit obligation of the United States of America (including any securities described in clause (a) above issued or held in book-entry form in the name of the Trustee only on the books of the Department of Treasury of the United States of America),

(c) any certificates or any other evidences of an ownership interest in obligations or specified portions thereof (which may consist of specified portions of the interest thereon) of the character described in clause (a) or (b) above, which obligations are held by a bank or trust company organized and existing under the laws of the United States of America or any state thereof in the capacity of custodian,

(d) stripped obligations of interest issued by the Resolution Funding Corporation pursuant to the Financial Institutions Reform, Recovery and Enforcement Act of 1989 ("FIRREA"), the interest on which, to the extent not paid from other specified sources, is payable when due by the Secretary of the Treasury pursuant to FIRREA, and

(e) obligations of any state or political subdivision thereof or any agency or instrumentality of such a state or political subdivision, provided that cash, obligations described in clause (a), (b), (c) or (d) above, or a combination thereof have been irrevocably pledged to and deposited into a segregated escrow account for the payment when due of the principal or redemption price of and interest on such obligations, and provided further that, at the time of purchase, such obligations are rated by the Rating Service in its highest rating category.

"Historical Debt Service Coverage Ratio" -- for any period of time, the ratio determined by dividing Net Revenues for such period by the Annual Debt Service for all Applicable Long-Term Indebtedness which is Outstanding during such period.

"Historical Pro Forma Debt Service Coverage Ratio" -- for any period of time, the ratio determined by dividing Net Revenues for such period by the Maximum Annual Debt Service for all Applicable Long-Term Indebtedness then Outstanding and the Applicable Long-Term Indebtedness proposed to be issued pursuant to Section 703(b) of the Indenture.

"Immediate Notice" -- notice transmitted by electronic means, in writing, by telecopier or other electronic means or by telephone (promptly confirmed in writing) and received by the Person to whom it was addressed.

"Indebtedness" -- any obligation or debt incurred for money borrowed.

"Indenture" -- means the General Indenture as amended and supplemented by the First Supplemental Indenture, the Second Supplemental Indenture, the Third Supplemental Indenture, the Fourth Supplemental Indenture, the Fifth Supplemental Indenture, the Sixth Supplemental Indenture, the Seventh Supplemental Indenture, the Eighth Supplemental Indenture, the Ninth Supplemental Indenture, the Tenth Supplemental Indenture, and as further amended or supplemented at the time in question.

"Index Rate Agreement" -- means (i) during the Initial Period, the Continuing Covenant Agreement with respect to the 2007B-1 Bonds and the Supplemental Agreement with respect to the 2007B-2 Bonds, and (ii) during any SIFMA Index Rate Period other than the Initial Period, any agreement between the Commission and the applicable Purchaser which may be designated as an Index Rate Agreement.

"Initial Bonds" -- the initial series of Bonds issued under the Indenture.

"Initial Period" -- means the initial SIFMA Index Rate Period commencing on May 18, 2011 with respect to the 2007B-1 Bonds and on May 18, 2011 with respect to the 2007B-2 Bonds, and ending on the first to occur of (i) the Initial SIFMA Index Interest Rate Termination Date, (ii) the Mode Change Date, or (iii) the redemption date (whether at maturity, pursuant to optional redemption, or otherwise), if any, permitted by the applicable Index Rate Agreement.

"Initial SIFMA Index Rate Termination Date" -- means (i) initially, May 1, 2014 with respect to the 2007B-1 Bonds, and (ii) initially, May 1, 2014 with respect to the 2007B-2 Bonds, or, in the case of any sub-Series of the 2007B Bonds, such other date as may be agreed to in accordance with the then applicable Index Rate Agreement.

"Interest Accrual Period" -- shall mean the period during which a 2007B Bond accrues interest payable on the next 2007B Interest Payment Date applicable thereto. Each Interest Accrual Period shall commence on (and include) the last 2007B Interest Payment Date to which interest has been paid (or, if no interest has been paid, from the date of original authentication and delivery of the 2007B Bonds) to, but not including, the 2007B Interest Payment Date on which interest is to be paid. If, at the time of authentication of any 2007B Bond, interest is in default or overdue on the 2007B Bonds, such 2007B Bond shall bear interest from the date to which interest has previously been paid in full or made available for payment in full on Outstanding 2007B Bonds.

"Interest Payment Date" -- with respect to each series of Bonds, the dates which are defined as such in the Supplemental Indenture under which such Bonds are issued. However, in each case, if the date specified above is not a Business Day then the Interest Payment Date shall be the Business Day next succeeding the date specified above.

"Interest Period" -- shall mean for the 2007B Bonds in a particular Mode, the period of time that the 2007B Bonds bear interest at the rate (per annum) which becomes effective at the beginning of such period and shall include an ARS Rate Period, a Commercial Paper Rate Period, a Daily Rate Period, a Weekly Rate Period, a SIFMA Index Interest Period, a Term Rate Period and a Fixed Rate Period.

"Issuance Cost" -- costs incurred by or on behalf of the Commission in connection with the issuance of the Initial Bonds and all Additional Bonds including, without limitation, the following: payment of financial, legal, accounting and appraisal fees and expenses, the Commission's fees and expenses attributable to the issuance of the Bonds, the cost of printing, engraving and reproduction services, fees and expenses incurred in connection with any Credit Facility and any Approved Swap Obligation, legal fees and expenses for Bond Counsel, Commission's counsel, Trustee's counsel and Underwriter's counsel relating to the issuance of the Bonds, the initial or acceptance fee of the Trustee, and all other fees, charges and expenses incurred in connection with the issuance of the Bonds and the preparation of the Indenture.

"Letter of Credit Account" -- shall be the account of that name created in Section 5.8 of the Fourth Supplemental Indenture.

"Letter of Representations" -- means the representation letter from the Commission, the Trustee and the Paying Agent to DTC dated the Series Issue Date or, if the Commission has executed and delivered a Blanket Letter

of Representations in favor of DTC, such Blanket Letter of Representations, as such Blanket Letter of Representations may be amended, supplemented or otherwise modified and in effect from time to time.

"LIBOR Index" -- means, for any day, the London interbank offered rate for U.S. dollar deposits for a one-month period, as reported on the Reuters Screen LIBOR01 Page (or any successor) as of 11:00 a.m., London time, on such day, or if any day is not a London Business Day, on the next preceding London Business Day; provided, however that, if any such rate is not reported on a London Business Day, LIBOR Index shall mean the rate as determined by the Calculation Agent for another recognized source or interbank quotation.

"Liquidity Facility" -- shall have the same meaning as the term Credit Facility as set forth in the General Indenture, but which provides liquidity support for tenders of the 2007B Bonds as set forth in Section 5.8(b) of the Fourth Supplemental Indenture.

"Liquidity Facility Purchase Account" -- shall mean the account by that name created in Section 5.9(b) of the Fourth Supplemental Indenture.

"Liquidity Provider" -- shall have the same meaning as the term Credit Facility Issuer as set forth in the General Indenture.

"Liquidity Provider Bonds" -- shall mean any 2007B Bonds purchased by the Liquidity Provider with funds drawn on or advanced under the Liquidity Facility.

"London Business Day" -- means any day on which commercial banks are open for general business (including dealings in foreign exchange and foreign currency) in the City of London, United Kingdom.

"Long-Term Mode" -- shall mean a Term Rate Mode or a Fixed Rate Mode.

"Letter of Representations" -- the letter of representations or similar document executed by the Commission and delivered to the Securities Depository (and any amendments thereto or successor agreements) for one or more Series of Book Entry Bonds.

"Long-Term Indebtedness" -- all Indebtedness, which is not (a) Short-Term Indebtedness or (b) Subordinated Indebtedness.

"Mandatory Purchase Date" -- shall mean: (i) with respect to a Commercial Paper Rate Bond, the first Business Day following the last day of each Commercial Paper Rate Period with respect to such 2007B Bond, (ii) for 2007B Bonds in the Term Rate Mode, the first Business Day following the last day of each Term Rate Period, (iii) any Mode Change Date; provided that if the date on which the Bonds are subject to tender for purchase shall be a Mode Change Date from a SIFMA Index Rate Period to another SIFMA Index Rate Period, the Bondholder may elect to retain its 2007B Bonds by filing with the Trustee not less than five (5) days prior to the mandatory tender date a written notice identifying such 2007B Bonds and the principal amount it wishes to retain, (iv) any Substitution Date, (v) the fifth Business Day prior to the Expiration Date (other than as a Result of an Automatic Termination Event), (vi) the date specified by the Trustee following the occurrence of an event of default (other than an Automatic Termination Date) under the Reimbursement Agreement, which date shall be the fifth (5th) Business Day after the Trustee's receipt of notice of such event of default from the Credit Provider or the Liquidity Provider and in no event later than the day preceding the termination date specified by the Credit Provider or the Liquidity Provider, (vii) the date specified by the Credit Provider or Liquidity Provider in a notice of nonreinstatement of interest, which shall be the second (2nd) Business Day after the Trustee's receipt of notice of nonreinstatement of interest, (viii) with respect to a 2007B Bond in a SIFMA Index Rate Mode, any Special Mandatory Purchase Date specified in accordance with the applicable Index Rate Agreement, (ix) with respect to a 2007B Bond in a SIFMA Index Rate Mode, the date specified by the Trustee following the occurrence of an event of default under the applicable Index Rate Agreement, which date shall be the fifth (5th) Business Day after the Trustee's receipt of notice of such event of default from the applicable Purchaser (or Majority Holder) under the applicable Index Rate Agreement directing the mandatory tender of such 2007B Bonds, and (x) for 2007B Bonds in the Daily Mode or Weekly Mode, any Business Day specified by the Commission not less than 20 days after the Trustee's receipt of such notice. All such Mandatory Purchase Dates are subject to and shall conform with the provisions of Section 5.7



of the Fourth Supplemental Indenture and provided further, all such Mandatory Purchase Dates specified in clauses (viii) and (ix) above, shall conform with the applicable provisions of the related Index Rate Agreement.

"Market Agent" -- means a third party financial advisory firm, investment banking firm, commercial bank or any other financial institution with experience in pricing information for tax-exempt municipal securities, as selected by the Commission (and consented to by the applicable Purchaser) to serve as market agent in connection with a conversion to a SIFMA Index Rate Period.

"Maximum Annual Debt Service" -- at any point in time the maximum amount of Annual Debt Service on all Applicable Long-Term Indebtedness, as required by the context (e.g., whether relating to all such Applicable Long-Term Indebtedness or only specified Applicable Long-Term Indebtedness) paid or payable in the then current or any future Fiscal Year.

"Maximum Rate" -- shall mean, with respect to 2007B Bonds other than Liquidity Provider Bonds, 2007B Bonds in a SIFMA Index Rate Mode and 2007B Bonds in an ARS Mode, the rate of 12% per annum; with respect to Liquidity Provider Bonds, the rate specified in the Liquidity Facility; and with respect to Bonds in a SIFMA Index Rate Mode, the rate specified in the applicable Index Rate Agreement; provided that in no event shall such rate(s) exceed the highest rate allowed by applicable law. With respect to 2007B Bonds in an ARS Mode, "Maximum Rate" shall have the meaning set forth in Exhibit "C" to the Fourth Supplemental Indenture.

"Mode" -- shall mean, as the context may require, the ARS Mode, the CP Mode, the Daily Mode, the Weekly Mode, the SIFMA Index Rate Mode, the Term Rate Mode or the Fixed Rate Mode.

"Mode Change Date" -- shall mean, (i) with respect to the 2007B Bonds in a particular Mode, the day on which a New Mode for such 2007B Bonds begins; (ii) the day upon which the 2007B Bonds in the Term Rate Mode change to a new Term Rate Period and (iii) the day upon which the 2007B Bonds in a SIFMA Index Rate Mode change to a new SIFMA Index Rate Period.

"Mode Change Notice" -- shall mean the notice from the Commission to the other Notice Parties of the Commission's intention to change the Mode with respect to any 2007B Bonds.

"Moody's" -- Moody's Investors Service, a corporation organized and existing under the laws of the State of Delaware, its successors and their assigns, and, if such corporation shall for any reason no longer perform the functions of a securities rating agency, "Moody's" shall be deemed to refer to any other nationally recognized rating agency designated by the Commission.

"Net Revenues" -- the amount by which total Revenues exceed Current Expenses for any particular period.

"New Mode" -- shall have the meaning specified in Section 4.10(a) of the Fourth Supplemental Indenture.

"Notice Parties" -- shall mean the Trustee, the Tender Agent, the Remarketing Agent, if any, each Broker-Dealer, if any, the Paying Agent, the Auction Agent, the Credit Provider, the Liquidity Provider and the Commission.

"Office" -- of an entity means its office at the address set forth in the applicable Supplemental Indenture, or any other office designated in writing by such entity to the Commission, the Trustee and the Paying Agent as the Office of such entity for purposes of the applicable Supplemental Indenture; provided that, for the purposes of the definition of "Business Day" herein, the Office of the Trustee shall be the corporate trust office of the Trustee designated in writing by the Trustee to the Commission, the Office of the Paying Agent shall be the corporate trust office of the Paying Agent designated in writing to the Commission.

"Opinion of Counsel" -- shall mean a written legal opinion from a firm of attorneys experienced in the matters to be covered in the opinion.

"Other Revenues" -- any funds received or payable to the Commission, other than Revenues, which the Commission chooses to include as security for Parity Obligations and/or Subordinated Indebtedness pursuant to a Supplemental Indenture.

"Outstanding" or "outstanding" in connection with Bonds -- all Bonds which have been authenticated and delivered under the Indenture, except:

- (a) Bonds theretofore cancelled or delivered to the Trustee for cancellation under Section 208 of the Indenture;
- (b) Bonds which are no longer considered Outstanding in accordance with Section 302(c) of the Indenture;
- (c) Bonds which are deemed to be no longer Outstanding in accordance with Section 1102 of the Indenture;
- (d) Bonds in substitution for which other Bonds have been authenticated and delivered pursuant to Article II of the Indenture; and
- (e) As may otherwise be provided by Supplemental Indenture.

In determining whether the owners of a requisite aggregate principal amount of Bonds Outstanding have concurred in any request, demand, authorization, direction, notice, consent or waiver under the provisions of the Indenture, Bonds which are held by or on behalf of the Commission (unless all of the Outstanding Bonds are then owned by the Commission) shall be disregarded for the purpose of any such determination.

"Parity Obligations" -- includes Bonds, Parity Swap Agreements and other obligations of the Commission owed to Secured Owners and excludes Subordinated Indebtedness.

"Parity Swap Agreement" -- shall have the meaning set forth in Section 211 of the Indenture.

"Parity Swap Agreement Counterparty" -- the counterparty to a Parity Swap Agreement with the Commission or with the Trustee.

"Paying Agent" -- with respect to any series of Bonds, that Person appointed pursuant to Section 911 of the Indenture to make payments to Bondholders of interest and/or principal pursuant to the terms of the Indenture, which initially shall be the Trustee.

"Permitted Investments" -- (to the extent permitted by law)

- (a) Government Obligations;
- (b) obligations issued or guaranteed as to full and timely payment of principal and interest by any agency or Person controlled or supervised by and acting as an instrumentality of the U.S., pursuant to authority granted by the U.S. Congress;
- (c) obligations of the Governmental National Mortgage Association, Rural Development, Federal Financing Bank, Federal Housing Administration, Maritime Administration and Public Housing Authorities, provided that the full and timely payment of the principal and interest on such obligations shall be unconditionally guaranteed by the U.S.;
- (d) obligations of the Federal Intermediate Credit Corporation and of Fannie Mae;
- (e) obligations of the Federal Banks for Cooperation;
- (f) obligations of Federal Land Banks;
- (g) obligations of Federal Home Loan Banks; provided that the obligations described in clauses (c) through (g) above shall constitute Permitted Investments only to the extent that the Rating Agency has

assigned a rating to such obligations which is not lower than the highest rating assigned by such Rating Agency to any series of Bonds then Outstanding;

(h) certificates of deposit of any bank, savings and loan or trust company organized under the laws of the U.S. or any state thereof, including the Trustee or any holder of the Bonds, provided that such certificates of deposit shall be fully collateralized (with a prior perfected security interest), to the extent they are not insured by the Federal Deposit Insurance Corporation, by Permitted Investments described in (a), (b), (c), (d), (e), (f) or (g) above having a market value at all times at least equal to the uninsured amount of such deposit;

(i) money market funds registered under the Investment Company Act of 1940, whose shares are registered under the Securities Act of 1933, including funds for which the Trustee, its parent, its affiliates or its subsidiaries provide investment advisory or other management services, and which are rated by a Rating Agency that then maintains a rating on the Bonds in one of their two highest rating categories;

(j) investment agreements (which term, for purposes of this clause, shall not include repurchase agreements) with a Qualified Financial Institution;

(k) repurchase agreements with banks or primary government dealers reporting to the Federal Reserve Bank of New York ("Repurchasers"), including but not limited to the Trustee and any of its affiliates; provided that each such repurchase agreement results in transfer to the Trustee of legal and equitable title to, or the granting to the Trustee of a prior perfected security interest in, identified Permitted Investments described in (a), (b), (c), (d), (e), (f) or (g) above which are free and clear of any claims by third parties and are segregated in a custodial or trust account held either by the Trustee or by a third party (other than the Repurchaser) as the agent solely of, or in trust solely for the benefit of, the Trustee, provided that Government Obligations acquired pursuant to such repurchase agreements shall be valued at the lower of the then current market value of such Government Obligations or the repurchase price thereof set forth in the applicable repurchase agreement;

(l) bonds or notes issued by any state or municipality which are rated by each Rating Agency that then maintains a rating on the Bonds in one of their two highest rating categories;

(m) commercial paper rated in the highest short-term, note or commercial paper Rating Category by each Rating Agency that then maintains a rating on the Bonds in one of their two highest rating categories;

(n) any auction rate certificates which are rated by each Rating Agency that then maintains a rating on the Bonds in one of their two highest rating categories;

(o) corporate bonds and medium term notes rated at least "AA-" by each Rating Agency that then maintains a rating on the Bonds;

(p) asset-backed securities rated in the highest rating category by each Rating Agency that then maintains a rating on the Bonds;

(q) any other investment approved by the Commission for which confirmation is received from each Rating Agency that then maintains a rating on the Bonds that such investment will not adversely affect such Rating Agency's rating then in effect on such Bonds; or

(r) any other investment approved by the provider of a Credit Facility for which confirmation is received from each Rating Agency that then maintains a rating on the Bonds that such investment will not adversely affect such Rating Agency's rating then in effect on such Bonds.

"Person" -- an individual, public body, a corporation, a limited liability company, a partnership, a limited liability partnership, an association, a joint stock company, a trust and any unincorporated organization.

"Pledged Bonds" -- a Bond purchased by the Trustee or Paying Agent with amounts received pursuant to a drawing under a Credit Facility and pledged to or registered in the name of a Bank which is a provider of such Credit Facility or its designee.

"Policy Costs" -- a periodic fee or charge required to be paid to maintain a DSRF Security.

"Project" -- any improvements or purposes which are authorized by the Compact, or the refunding of obligations which financed such improvements or purposes.

"Projected Annual Debt Service" -- for any future period of time, shall equal the amount of Maximum Annual Debt Service on all Applicable Long-Term Indebtedness then Outstanding and on any Applicable Long-Term Indebtedness proposed to be issued on or before the end of such future period of time.

"Projected Debt Service Coverage Ratio" -- for the two Fiscal Years following the end of any period during which interest was fully capitalized on the Applicable Long-Term Indebtedness proposed to be issued, the ratio determined by dividing Projected Net Revenues for such period by the Projected Annual Debt Service for such period.

"Projected Net Revenues" -- projected Net Revenues for the period in question, taking into account any revisions of the Tolls which have been approved by the Commission and which will be effective during such period and any additional Tolls which the Commission or the Consultant, as appropriate, estimates will be received by the Commission following the completion of any Project then being constructed or proposed to be constructed.

"Purchase Date" -- shall mean (i) for a 2007B Bond in the Daily Mode or the Weekly Mode, any Business Day selected by the Beneficial Owner of said 2007B Bond pursuant to the provisions of Section 5.1 of the Fourth Supplemental Indenture, and (ii) any Mandatory Purchase Date.

"Purchase Fund" -- shall mean the fund of that name created in Section 5.9 of the Fourth Supplemental Indenture.

"Purchase Price" -- shall mean (i) in relation to the 2007B Bonds, an amount equal to the principal amount of any 2007B Bonds purchased on any Purchase Date, plus accrued interest to the Purchase Date (unless the Purchase Date is a 2007B Interest Payment Date, in which case the Purchase Price shall not include accrued interest, which shall be paid in the normal course), or (ii) otherwise, shall mean the purchase price payment described in paragraph (a) of the definition of Tender Indebtedness

"Purchaser" -- means, during any SIFMA Index Rate Period, except as otherwise provided in the applicable Index Rate Agreement, the Holder of the 2007B Bonds of a sub-Series provided the 2007B Bonds of such sub-series are not then held under the Book-Entry System; provided further that if there is more than one Holder of the applicable sub-Series of the 2007B Bonds, "Purchaser" means Holders owning a majority of the aggregate principal amount of the applicable sub-Series of the 2007B Bonds then Outstanding. If the 2007B Bonds of a sub-series are then held under the Book-Entry System, "Purchaser" means the Beneficial Owner of such Bonds provided there is a single Beneficial Owner of all of such Bonds; provided further that if there is more than one Beneficial Owner of such 2007B Bonds, "Purchaser" means Beneficial Owners who are the beneficial owners of a majority of the aggregate principal amount of the applicable sub-Series of the 2007B Bonds then Outstanding. Notwithstanding the foregoing, during the Initial Period the Purchaser shall be Wells Fargo Bank, National Association with respect to the 2007B-1 Bonds, and JPMorgan Chase Bank, National Association with respect to the 2007B-2 Bonds, except as otherwise provided in the applicable Index Rate Agreement.

"Purchaser Rate" -- means, with respect to Unremarketed Bonds, the rate so defined by the applicable Index Rate Agreement, but, subject to the provisions of subsection (b) of Section 4.9A of the Fourth Supplemental Indenture, not in excess of the Maximum Rate.

"Qualified Financial Institution" -- (a) any U.S. domestic institution which is a bank, trust company, national banking association or a corporation, including the Trustee and any of its affiliates, subject to registration with the Board of Governors of the Federal Reserve System under the Bank Holding Company Act of 1956, or a member of the National Association of Securities Dealers, Inc. whose unsecured obligations or uncollateralized long-term debt obligations have been assigned a rating within the two highest rating categories by the Rating Agency or which has issued a letter of credit, contract, agreement or surety bond in support of debt obligations which have been so rated; (b) an insurance company with a claims-paying ability or a corporation whose obligations

are guaranteed by an insurance company (in the form of an insurance policy) or by an insurance holding company rated in the highest rating category by the Rating Agency or whose unsecured obligations or uncollateralized long-term debt obligations have been assigned a rating within the highest rating category by the Rating Agency; or (c) any banking institution whose unsecured obligations or uncollateralized long-term debt obligations have been assigned a rating within one of the two highest rating categories by the Rating Agency.

"Rate Covenant" -- the requirement to establish and maintain a schedule of Tolls sufficient to provide the funds required pursuant to Section 501 of the Indenture.

"Rate Determination Date" -- shall mean any date on which the interest rate on any sub-series of 2007B Bonds shall be determined, which, (i) in the case of the CP Mode, shall be the first day of an Interest Period; (ii) in the case of the Daily Mode, shall be each Business Day commencing with the first day (which must be a Business Day) the 2007B Bonds become subject to the Daily Mode; (iii) (a) in the case of the conversion of a 2007B-1 Bond to the Weekly Mode, shall be no later than the Business Day prior to the Mode Change Date, and thereafter, shall be each Wednesday, and (b) in the case of the initial conversion of a 2007B-2 Bond to the Weekly Mode, shall be no later than the Business Day prior to the Mode Change Date, and thereafter, shall be each Thursday or, if Thursday is not a Business Day, then the Business Day next preceding such Thursday; (iv) in the case of the Term Rate Mode shall be a Business Day no earlier than fifteen (15) Business Days and no later than the Business Day next preceding the first day of an Interest Period, as determined by the Remarketing Agent; (v) in the case of the Fixed Rate Mode, shall be a date determined by the Remarketing Agent which shall be at least one Business Day prior to the Mode Change Date; and (vi) in the case of the SIFMA Index Rate Mode, the applicable SIFMA Rate Reset Date.

"Rate Period" -- means an ARS Rate Period (as defined in Exhibit "C" to the Fourth Supplemental Indenture), a Commercial Paper Rate Period, a Daily Rate Period, a Weekly Rate Period, a SIFMA Index Rate Period, a Term Rate Period or a Fixed Rate Period.

"Rating Agency" -- Fitch, Moody's or S&P or such other nationally recognized securities rating agency as may be so designated in writing to the Trustee by a Commission Official.

"Rating Category" -- each major rating classification established by the Rating Agency, determined without regard to gradations such as "1," "2" and "3" or "plus" and "minus."

"Rating Confirmation Notice" -- shall mean a notice from Moody's, S&P or Fitch, as appropriate, confirming that the rating on the 2007 Bonds will not be lowered or withdrawn (other than a withdrawal of a short-term rating of the 2007B Bonds upon a change to a Long-Term Mode) as a result of the action proposed to be taken.

"Rebate Fund" -- the fund created by Section 503 of the Indenture.

"Rebate Regulations" -- the Treasury Regulations issued under Section 148(f) of the Code.

"Record Date" -- unless otherwise provided with respect to any series of Bonds in a Supplemental Indenture: (a) for Bonds on which interest is payable on the first day of a month, the fifteenth day of the immediately preceding month; or (b) for Bonds on which interest is payable on the fifteenth day of a month, the last day of the immediately preceding month. However, in each case, if the date specified above is not a Business Day, then the Record Date shall be the Business Day next preceding the date specified above.

For purposes of the 2007 Bonds, the Record Date shall mean (i) with respect to the 2007A Bonds, the fifteenth (15<sup>th</sup>) day (whether or not a Business Day) of the month next preceding each 2007A Interest Payment Date; (ii) with respect to 2007B Bonds in a Short-Term Mode, the last Business Day before a 2007B Interest Payment Date; (iii) with respect to 2007B Bonds in a SIFMA Index Rate Mode, the last Business Day before a 2007B Interest Payment Date; (iv) with respect to the 2007B Bonds in the ARS Mode, pursuant to Exhibit B hereto; and (v) with respect to 2007B Bonds in a Long-Term Mode, the fifteenth (15<sup>th</sup>) day (whether or not a Business Day) of the month next preceding each 2007B Interest Payment Date.

"Reimbursement Agreement" -- an agreement between the Commission and one or more Banks pursuant to which, among other things, such Bank or Banks issue a Credit Facility with respect to Bonds of one or more Series and the Commission agrees to reimburse such Bank or Banks for any drawings made thereunder.

"Reimbursement Obligation" -- an obligation of the Commission pursuant to a Reimbursement Agreement to repay any amounts drawn under a Credit Facility and to pay interest on such drawn amounts pursuant to such Reimbursement Agreement.

"Remarketing Agent" -- shall mean any investment banking firm appointed by or which may be substituted in its place as provided in Section 11.01 of the Fourth Supplemental Indenture.

"Remarketing Agreement" -- shall mean any Remarketing Agreement relating to the 2007B Bonds by and between the Commission and the Remarketing Agent or any similar agreement between the Commission and the Remarketing Agent, as it may be amended or supplemented from time to time in accordance with its terms.

"Remarketing Proceeds Account" -- shall mean the account of that name within the Purchase Fund created in Section 5.9(a) of the Fourth Supplemental Indenture.

"Representation Letter" -- means the representation letter from the Commission, the Trustee and the Paying Agent to DTC dated the applicable Series Issue Date or, if the Commission has executed and delivered a Blanket Letter of Representations in favor of DTC, such Blanket Letter of Representations.

"Reserve Maintenance Fund" -- the fund created by Section 503 of the Indenture.

"Reserve Maintenance Fund Requirement" -- the amount to be deposited to the credit of the Reserve Maintenance Fund from the Revenues of the Commission pursuant to Section 508 of the Indenture.

"Responsible Officer" -- when used with respect to the Trustee, any officer in the corporate trust department (or any successor thereto) of the Trustee, or any other officer or representative of the Trustee customarily performing functions similar to those performed by any of such officers and also means, with respect to a particular corporate trust matter, any other officer of the Trustee to whom such matter is referred because of that officer's knowledge of and familiarity with the particular subject.

"Revenue Fund" -- the fund created by Section 503 of the Indenture.

"Revenues" -- (a) all Tolls received by or on behalf of the Commission from the System, (b) miscellaneous non-Toll revenues derived from the System, (c) any other sources of revenues or funds of the Commission which the Commission chooses to include in the Trust Estate pursuant to a Supplemental Indenture, and (d) the interest and income earned on any fund or account where said interest or income is required to be credited to the Revenue Fund pursuant to the Indenture. As more fully provided in Section 504 of the Indenture, in the event the Commission receives advances or prepayments or otherwise operates or participates in a system in which funds are collected prior to the actual usage of the System, such funds shall not be deemed to be Revenues until the usage occurs or the funds are earned pursuant to the agreement under which the Commission receives such funds.

"S&P" -- Standard & Poor's Rating Service, a division of The McGraw-Hill Companies, Inc., a corporation organized and existing under the laws of the State of New York, its successors and their assigns, and, if such corporation shall for any reason no longer perform the functions of a securities rating agency, "S&P" shall be deemed to refer to any other nationally recognized securities rating agency designated by the Commission.

"Secured Owner" -- each Person who is a Bondholder of any Bonds (including, without limitation, any Purchaser as defined in the Sixth Supplemental Indenture), each Parity Swap Agreement Counterparty providing a Parity Swap Agreement, each Bank providing a Credit Facility and each Person providing a bond insurance policy or swap insurance policy with respect to a Parity Obligation.

"Securities Depository" -- a Person that is registered as a clearing agency under Section 17A of the Securities Exchange Act of 1934, as amended, or whose business is confined to the performance of the functions of a clearing agency with respect to exempted securities, as defined in Section 3(a)(12) of such Act for the purposes of Section 17A thereof.

“Serial 2007B Bonds” – means the 2007B Bonds maturing on the dates set forth in Section 4.10(b) of the Fourth Supplemental Indenture.

"Series" -- one or more Bonds issued at the same time, or sharing some other common term or characteristic, and designated as a separate series of Bonds.

“Series 2005A Bond” or “2005A Bond” – means any bond or bonds authenticated and delivered pursuant to Article II of the Second Supplemental Indenture.

"Series 2007 Bond" or "2007 Bond" -- means any bond or bonds authenticated and delivered under the Fourth Supplemental Indenture.

"Series 2007A Bond" or "2007A Bond" -- means any Bridge System Revenue Bonds, Series 2007A, authenticated and delivered pursuant to Article II of the Fourth Supplemental Indenture.

"Series 2007B Bond" or "2007B Bond" -- means any Bridge System Revenue Bonds, Series 2007B, authenticated and delivered pursuant to Article IV of the Fourth Supplemental Indenture and shall mean, collectively, the 2007B-1 Bonds and the 2007B-2 Bonds.

"Series 2007B-1 Bond" or "2007B-1 Bond" -- means that certain sub-series of 2007B Bonds, known as sub-series 2007B-1, authenticated and delivered pursuant Article IV of the Fourth Supplemental Indenture in an amount not to exceed \$75,000,000.

"Series 2007B-2 Bond" or "2007B-2 Bond" -- means that certain sub-series of 2007B Bonds, known as sub-series 2007B-2, authenticated and delivered pursuant Article IV of the Fourth Supplemental Indenture in an amount not to exceed \$75,000,000.

“Series 2012A Bond” or “2012A Bonds” – means any Bridge System Revenue Refunding Bonds, Series 2012A, authenticated and delivered pursuant to Article II of the Seventh Supplemental Indenture, originally issued in the aggregate principal amount of \$77,145,000.

“Series 2012B Bond” or “2012B Bonds” – means any Bridge System Revenue Refunding Bonds, Series 2012B (Federally Taxable) authenticated and delivered pursuant to Article II of the Seventh Supplemental Indenture, originally issued in the aggregate principal amount of \$20,665,000.

“Series 2015 Bond” or “2015 Bonds” – means any bond or bonds authenticated and delivered pursuant to Article II of the Ninth Supplemental Indenture.

"Series Issue Date" -- means, with respect to a particular Series of Bonds, the date of original issuance of such Series of Bonds.

"Short-Term Indebtedness" -- all Indebtedness which matures in less than 365 days and is designated as Short-Term Indebtedness pursuant to Section 703(a) of the Indenture. In the event a Bank has extended a line of credit or the Commission has undertaken a commercial paper or similar program, only amounts actually borrowed under such line of credit or program and repayable in less than 365 days shall be considered Short-Term Indebtedness and the full amount of such commitment or program shall not be treated as Short-Term Indebtedness to the extent that such facility remains undrawn.

"Short-Term Mode" -- shall mean the Daily Mode, the Weekly Mode or the CP Mode.

"SIFMA Index" -- means, for any SIFMA Rate Reset Date, the "SIFMA Municipal Swap Index" announced by Municipal Market Data on the related Computation Date, and if the SIFMA Municipal Swap Index is no longer published on such Computation Date, then, (i) for the purposes of the 2007B-1 Bonds, the Alternate Index as of such Computation Date and (ii) for purposes of the 2007B-2 Bonds, the "S&P Weekly High Grade Index" (formerly the J.J. Kenny Index) maintained by Standard & Poor's Securities Evaluations Inc. for a 7-day maturity.

"SIFMA Index Interest Period" means (i) subject to the provisions of clause (iii) below, while a 2007B-1 Bond bears interest at the SIFMA Index Rate, the period from (and including) the SIFMA Index Rate Conversion Date to (and including) the first Wednesday thereafter, and thereafter shall mean the period from (and including) Thursday of each week to (and including) Wednesday of the following week (or, if sooner, to but excluding the last day of the SIFMA Index Rate Period) and (ii) subject to the provisions of clause (iii) below, while a 2007B-2 Bond bears interest at the SIFMA Index Rate, the period from (and including) the SIFMA Index Rate Conversion Date to (and including) the first Wednesday thereafter, and thereafter shall mean the period from (and including) Thursday of each week to (and including) Wednesday of the following week (or, if sooner, to but excluding the last day of the SIFMA Index Rate Period) and (iii) in the case of a conversion to the SIFMA Index Rate Mode, the initial SIFMA Index Interest Period upon such conversion shall run to, but not include, the first Thursday occurring after the SIFMA Index Rate Conversion Date.

"SIFMA Index Rate" -- means a per annum rate of interest equal to the sum of the Applicable Spread or Applicable Margin, as applicable, plus the SIFMA Index.

"SIFMA Index Rate Mode" -- means the Mode during which a 2007B Bond bears interest at the SIFMA Index Rate.

"SIFMA Index Rate Conversion Date" -- means (a) the date on which a 2007B Bond begins to bear interest as the SIFMA Index Rate (for the initial conversions, May 18, 2011 for the 2007B-1 Bonds and May 18, 2011 for the 2007B-2 Bonds) or, (b) if a 2007B Bond has previously borne interest at the SIFMA Index Rate during a SIFMA Index Rate Period then ending, the Special Mandatory Purchase Date occurring at the end of the then ending SIFMA Index Rate Period.

"SIFMA Index Rate Period" -- means each period from and including a SIFMA Index Rate Conversion Date to but excluding the earlier of (i) the immediately succeeding Special Mandatory Purchase Date, (ii) the Mode Change Date, and (iii) the redemption date (whether at maturity, pursuant to optional redemption, or otherwise).

"SIFMA Rate Reset Date" -- means the initial day of the relevant SIFMA Index Interest Period which generally shall be: (i) with respect to a sub-Series 2007B -1 Bond, Thursday of each week and (ii) with respect to a sub-Series 2007B-2 Bond, Thursday of each week.

"Special Mandatory Purchase Date" -- means (i) with respect to any Initial Period, the Initial SIFMA Index Rate Termination Date, and (ii) with respect to any SIFMA Index Rate Period other than the Initial Period, the date designated by an authorized Commission Official."

"Special Record Date" -- the date or dates specified as such in a Supplemental Indenture with respect to Additional Bonds issued under such Supplemental Indenture.

With respect to the 2007 Bonds, "Special Record Date" -- means: (i) with respect to the 2007A Bonds, the date ten (10) days immediately preceding the date established by the Trustee for the payment of interest on the 2007A Bonds not paid on a regularly scheduled 2007A Interest Payment Date; and (ii) with respect to the 2007B Bonds, the date five (5) days immediately preceding the date established by the Trustee for the payment of interest on the 2007B Bonds not paid on a regularly scheduled 2007B Interest Payment Date.

"State" -- means the State of New Jersey.

"Subordinated Indebtedness" -- Indebtedness incurred pursuant to Section 703(c) of the Indenture.

"Substitution Date" -- shall mean the date upon which an Alternate Credit Enhancement or Alternate Liquidity Facility is scheduled to be substituted for the Credit Enhancement or Liquidity Facility then in effect.

"Supplemental Agreement" -- means the Bond Purchase and Supplemental Agreement dated as of May 1, 2011, between the Commission and JPMorgan Chase Bank, N.A., as the Purchaser of the 2007B-2 Bonds, as the same may be amended from time to time.



"Supplemental Indenture" -- any supplemental indenture to the Indenture, now or hereafter duly authorized and entered into in accordance with the provisions of Article X of the Indenture.

"Swap Agreement" -- shall have the meaning set forth in Section 211 of the Indenture.

"System" -- all bridges and other vehicular traffic facilities whether now or hereafter owned, acquired or constructed by or on behalf of the Commission and operated by it, whether toll or toll-supported, including, without limitation, all land and interests in land acquired or owned by the Commission in connection with such bridges whether the same be immediately adjacent or contiguous to any such bridge or not, all approach facilities thereto acquired or constructed by or on behalf of the Commission and all bridge approaches, toll plazas, entrance plazas, overpasses, underpasses and approach highways and all administration, service and storage buildings and other structures and improvements thereon acquired or constructed by or on behalf of the Commission and all other vehicular traffic facilities and all interests in real property related thereto.

"Taxable Date" -- means the date as of which interest on the Series 2007B Bonds is first includable in the gross income of the Holder (including, without limitation, any previous Holder) thereof as determined pursuant to either (i) an opinion of Bond Counsel or (ii) a final decree or judgment of any federal court or final action by the Internal Revenue Service that is delivered to the Trustee and the Commission.

"Taxable Rate" -- shall have the meaning given such term in the applicable Index Rate Agreement.

"Tender Indebtedness" -- any Indebtedness or portion thereof:

(a) the terms of which include (1) an option or an obligation on the part of the Secured Owner to tender all or a portion of such Indebtedness to the Commission, the Trustee, the Paying Agent or another fiduciary or agent for payment or purchase and (2) a requirement on the part of the Commission to purchase or cause to be purchased such Indebtedness or portion thereof if properly presented; and

(b) which is rated in either (1) one of the two highest long-term Rating Categories by the Rating Agency or (2) the highest short-term, note or commercial paper Rating Category by the Rating Agency.

"Tender Agent" -- shall mean the commercial bank, trust company or other entity which may from time to time be appointed to serve as Tender Agent. Until such time as an alternate Tender Agent is appointed, the Tender Agent shall be the Trustee.

"Tender Notice" -- shall mean a notice delivered by Electronic Means or in writing that states (i) the principal amount of such Bond to be purchased pursuant to Section 5.1 of the Fourth Supplemental Indenture, (ii) the Purchase Date on which such 2007B Bond is to be purchased, (iii) applicable payment instructions with respect to the 2007B Bonds being tendered for purchase and (iv) an irrevocable demand for such purchase.

"Tender Notice Deadline" -- shall mean (i) during the Daily Mode, 11:00 A.M. on any Business Day and (ii) during the Weekly Mode, 5:00 P.M. on the Business Day seven days prior to the applicable Purchase Date.

"Term Rate" -- shall mean the per annum interest rate for the 2007B Bonds in the Term Rate Mode determined pursuant to Section 4.7(a) of the Fourth Supplemental Indenture.

"Term Rate Mode" -- shall mean the Mode during which a 2007B Bond bears interest at the Term Rate.

"Term Rate Period" -- shall mean the period from (and including) the Mode Change Date or the date of initial issuance of the 2007B Bonds, as applicable, to (but excluding) the last day of the first period that the 2007B Bonds shall be in the Term Rate Mode as established by the Commission for the 2007B Bonds pursuant to Sections 4.10(a)(i) of the Fourth Supplemental Indenture and, thereafter, the period from (and including) the beginning date of each successive Interest Rate Period selected for the 2007 Bonds by the Commission pursuant to Section 4.7(a) of the Fourth Supplemental Indenture while it is in the Term Rate Mode to (but excluding) the commencement date of the next succeeding Interest Period, including another Term Rate Period. Except as otherwise provided in the Fourth Supplemental Indenture, an Interest Period for the 2007B Bonds in the Term Rate Mode must be at least 180 days or any integral multiple of six (6) months in length.

"Tolls" -- all rates, rents, fees, charges, fines or other income derived by the Commission from vehicular usage of the System, and all rights to receive the same.

"Trust Estate" -- shall mean Commission's pledge and assignment to the Trustee and grant to the Trustee, of a security interest in all right, title and interest of the Commission in and to (i) the Net Revenues as defined in the Indenture, (ii) all monies deposited into accounts or funds created by the Indenture and held by or on behalf of the Commission or the Trustee (other than the Rebate Fund), (iii) any insurance proceeds and other moneys required to be deposited in the Indenture, (iv) all payments received by the Commission pursuant to Parity Swap Agreements, and (v) all investment earnings on all moneys held in accounts and funds established by the Indenture, other than the Rebate Fund, all as more particularly described in the Granting Clauses of the Preambles of the Original Indenture.

"Trustee" -- the Trustee at the time in question, whether the initial Trustee or a successor.

"Unremarketed Bonds" -- means 2007B Bonds of a sub-series which, on the applicable Special Mandatory Purchase Date, have not been successfully converted to another Rate Period and remain held by the Purchasers.

"U.S." -- United States of America.

"Variable Rate Indebtedness" -- any Indebtedness the interest rate on which fluctuates from time to time subsequent to the time of incurrence. Variable Rate Indebtedness may include, without limitation, (a) "auction rate" Indebtedness, that is, Variable Rate Indebtedness (1) the interest rate applicable to which (after an initial period following the issuance thereof or the conversion thereof to such an interest rate mode) is reset from time to time through an auction or bidding system and (2) which the Commission has no obligation to repurchase in connection with the resetting of the interest rate applicable thereto except to the extent proceeds are available for such purpose either from the remarketing of such Variable Rate Indebtedness or from such other sources as identified in the Supplemental Indenture pursuant to which such Variable Rate Indebtedness was issued, (b) Tender Indebtedness, (c) commercial paper Indebtedness which is intended to be reissued and refinanced periodically, or (d) other forms of Indebtedness on which the interest fluctuates or is subject to being set or reset from time to time.

"Variable Rate Mode" -- shall mean the Short-Term Mode or the Term Rate Mode.

"Weekly Mode" -- shall mean the Mode during which a 2007B Bond bears interest at the Weekly Rate.

"Weekly Rate" -- shall mean the per annum interest rate on the 2007B Bonds in the Weekly Mode determined pursuant to Section 2.6(b) of the Fourth Supplemental Indenture.

"Weekly Rate Period" -- shall mean: (i) the period during which a 2007B-1 Bond in the Weekly Mode shall bear a Weekly Rate, which shall be the period commencing on Thursday of each week to and including Wednesday of the following week, except the first Weekly Rate Period which shall be from the Mode Change Date to and including the Wednesday of the following week and the last Weekly Rate Period which shall be from and including the Thursday of the week prior to the Mode Change Date to and including the day next preceding the Mode Change Date or 2007B-1 Maturity Date; and (ii) the period during which a 2007B-2 Bond in the Weekly Mode shall bear a Weekly Rate, which shall be the period commencing on Friday of each week to and including Thursday of the following week, except the first Weekly Rate Period which shall be from the Mode Change Date to and including the Thursday of the following week and the last Weekly Rate Period which shall be from and including the Friday of the week prior to the Mode Change Date to and including the day next preceding the Mode Change Date or 2007B-2 Maturity Date.

"2007 Bond Insurance Policy" -- means the insurance policy issued by the 2007 Bond Insurer guaranteeing the scheduled payment of principal of and interest on the 2007A Bonds when due. The 2007 Bond Insurance Policy shall constitute a "Credit Facility" within the meaning of the General Indenture

"2007B Authorized Denominations" -- shall mean (i) with respect to 2007B Bonds in a Daily Mode or Weekly Mode, \$100,000 and any integral multiple of \$5,000 in excess thereof, (ii) with respect to 2007B Bonds in a SIFMA Index Rate Mode, \$250,000 and any integral multiple of \$5,000 in excess thereof, (iii) with respect to 2007B Bonds in a CP Mode, \$100,000 and any integral multiple of \$1,000 in excess thereof, (iv) with respect to

2007B Bonds in a Long-Term Mode, \$5,000 and any integral multiple thereof, and (v) with respect to 2007B Bonds in an ARS Mode, \$25,000 and integral multiples thereof.

"2007B Interest Payment Date" -- with respect to the 2007B Bonds shall mean each date on which interest is to be paid and is (i) with respect to the 2007B Bonds in the CP Mode, each Mandatory Purchase Date applicable thereto, (ii) with respect to 2007B Bonds in the Daily Mode or Weekly Mode, the first Business Day of each month, (iii) with respect to 2007B Bonds in a SIFMA Index Rate Mode, the first Business Day of each month, each Special Mandatory Purchase Date and, with respect to any such 2007B Bonds held pursuant to an Index Rate Agreement subsequent to a failure of the Commission to pay (or cause the payment of) the tender price on a Special Mandatory Purchase Date, the dates specified by the Index Rate Agreement, (iv) with respect to the 2007B Bonds in a Long-Term Mode, each January 1 and July 1 commencing with the first January 1 or July 1 following conversion to a Long-Term Mode, (v) without duplication as to any Interest Payment Date listed above) any Mode Change Date, other than a change between a Daily and a Weekly Mode, and each Maturity Date, (vi) with respect to any Liquidity Provider Bonds, the day set forth in the Reimbursement Agreement, and (vii) with respect to the 2007B Bonds in the ARS Mode, 2007B Interest Payment Date shall have the meaning set forth in Exhibit "C" of the Fourth Supplemental Indenture.

"2007B Maturity Date" -- shall mean the dates set forth on Schedule I to Exhibit "C" of the Fourth Supplemental Indenture and, if established pursuant to Section 4.10(b)(v) of the Fourth Supplemental Indenture upon a change to the Fixed Rate Mode, any Serial Maturity Date.

## **SUMMARY OF CERTAIN PROVISIONS OF THE INDENTURE**

### **Issuance of Bonds; Form and Terms Thereof (Section 201).**

Subject to the applicable provisions of the Indenture, all Bonds shall be issued and shall contain such maturities, payment terms, interest rate provisions, redemption or prepayment features and other provisions as shall be set forth in the Supplemental Indenture providing for the issuance of such Bonds.

### **Limited Obligations (Section 202).**

The Bonds shall be limited obligations of the Commission, payable solely from the Trust Estate. The Bonds shall constitute a valid claim of the respective owners thereof against the Trust Estate, which is pledged to secure the payment of the principal of, redemption premium, if any, and interest on the Bonds, and which shall be utilized for no other purpose, except as expressly authorized in the Indenture. The Bonds shall not constitute general obligations of the Commission and under no circumstances shall the Bonds be payable from, nor shall the holders thereof have any rightful claim to, any income, revenues, funds or assets of the Commission other than those pledged under the Indenture as security for the payment of the Bonds.

### **Execution of Bonds; Payment (Section 203).**

The Bonds shall be signed by the manual or facsimile signature of the Chairman or the Vice-Chairman of the Commission or by the manual or facsimile signature of the Executive Director of the Commission and attested by the manual or facsimile signature of the Secretary or an Assistant Secretary of the Commission. The Bonds may bear the seal of the Commission or a facsimile thereof affixed to or imprinted on the Bonds. In case any officer whose signature or a facsimile of whose signature shall appear on any Bond shall cease to be such officer before the delivery of such Bond, such signature or facsimile shall nevertheless be valid and sufficient for all purposes as if such officer had remained in office until such delivery.

The principal of, premium, if any, and interest on the Bonds shall be payable in any currency of the U.S. which, on the respective dates of payment thereof, is legal tender for the payment of public and private debts and may be payable by wire transfer. The principal of all Bonds shall be payable at the designated trust office of the Trustee, and payment of the interest on each Bond shall be made on each Interest Payment Date to the Person appearing on the registration books of the Bond Registrar as of the Record Date as the registered owner thereof, by check or draft mailed to such registered owner at his address as it appears on such registration books. However, if and to the extent that the Commission defaults on the payment of interest due on an Interest Payment Date, such

defaulted interest shall be paid to those Persons who are the registered owners as of the Special Record Date on a payment date established by the Trustee, notice of which shall have been mailed to those Persons who are the registered owners as of the Special Record Date on such date or dates established in the Supplemental Indenture under which such Bonds are issued.

#### **Registration of Transfer and Exchange of Bonds; Persons Treated as Bondholders (Section 205).**

The Trustee shall act as initial bond registrar (the "Bond Registrar") and in such capacity shall maintain a bond register (the "Bond Register") for the registration and transfer of Bonds. Upon surrender of any Bonds at the designated office of the Trustee, as the Bond Registrar, together with an assignment duly executed by the current Bondholder of such Bonds or such Bondholder's duly authorized attorney or legal representative in such form as shall be satisfactory to the Trustee, such Bonds may, at the option of the Bondholder, be exchanged for an equal aggregate principal amount of Bonds of the same Series and maturity, of Authorized Denominations and bearing interest at the same rate and in the same form as the Bonds surrendered for exchange, registered in the name or names designated on the assignment; provided the Trustee is not required to exchange or register the transfer of Bonds after the giving of notice calling such Bond for redemption, in whole or in part. The Commission shall execute and the Trustee shall authenticate any Bonds whose execution and authentication is necessary to provide for exchange of Bonds pursuant to Section 205 of the Indenture and the Commission may rely on a representation from the Trustee that such execution is required. Notwithstanding anything to the contrary contained in the Indenture, any 2007B Bond held in the SIFMA Index Rate Mode shall be subject to the restrictions on transfer of such 2007B Bond set forth in the applicable Index Rate Agreement, if any.

The Trustee may make a charge to any Bondholder requesting such exchange or registration in the amount of any tax or other governmental charge required to be paid with respect thereto.

Prior to due presentment for registration of transfer of any Bond, the Trustee shall treat the Person shown on the Bond Register as owning a Bond as the Bondholder and the Person exclusively entitled to payment of principal thereof, redemption premium, if any, and interest thereon and, except as otherwise expressly provided in the Indenture, the exercise of all other rights and powers of the owner thereof, and neither the Commission, the Trustee nor any agent of the Commission or the Trustee shall be affected by notice to the contrary.

#### **Initial Bonds and Additional Bonds (Section 210).**

The Commission will not issue or incur any other Indebtedness having a parity lien on the Trust Estate except for Initial Bonds and Additional Bonds issued pursuant to Section 210 of the Indenture and other Parity Obligations. Initial Bonds and Additional Bonds may be issued and the Trustee shall authenticate and deliver such Bonds when there have been filed with the Trustee the following:

(a) A copy certified by a Commission Official of the resolution or resolutions of the Commission authorizing (1) the execution and delivery of a Supplemental Indenture providing for, among other things, the date, rate or rates of interest on, interest payment dates, maturity dates and redemption provisions of such Bonds, and (2) the issuance, sale, execution and delivery of the Bonds;

(b) An original executed counterpart of the Supplemental Indenture;

(c) An opinion or opinions of Bond Counsel, addressed to the Commission and the Trustee, to the effect that (1) issuance of the Bonds is permitted under the Indenture, (2) each of the Supplemental Indenture and the Bonds has been duly authorized, executed and delivered and is a valid, binding and enforceable obligation of the Commission, subject to bankruptcy, equitable principles and other standard legal opinion exceptions, (3) subject to the last paragraph of Section 210 of the Indenture, interest on the Bonds is not included in gross income for federal income tax purposes under the Code, and (4) under the Bridge Act, the Compact and other applicable law, Net Revenues may be applied to the payment of the principal of and interest on such proposed Series of Bonds in the manner and priority contemplated under the Indenture;

(d) A request and authorization of the Commission, signed by a Commission Official, to the Trustee to authenticate and deliver the Bonds to such Person or persons named therein after confirmation of payment

to the Trustee for the account of the Commission of a specified sum (which may include directions as to the disposition of such of such sum);

(e) A certificate of the Commission, signed by a Commission Official, that the Commission is not in default under the Indenture and evidence satisfactory to the Trustee that, upon issuance of the Bonds, amounts will be deposited in the Funds under the Indenture adequate for the necessary balances therein after issuance of the Bonds (including an amount sufficient to satisfy the Debt Service Reserve Requirement if the Bonds constitute Debt Service Reserve Fund Bonds);

(f) A certificate of the Commission, signed by a Commission Official, identifying the Bonds as Short-Term Indebtedness, Long-Term Indebtedness or Subordinated Indebtedness and, in the case of Additional Bonds, demonstrating with reasonable detail that the provisions of Section 703(a), (b) or (c) of the Indenture, as applicable, have been met for the issuance of such Additional Bonds; and

(g) Such further documents, moneys and securities as are required by the provisions of the Supplemental Indenture.

Anything in the Indenture to the contrary notwithstanding, Bonds may bear interest which is included in gross income for federal income tax purposes under the Code, in which event provisions in the Indenture requiring or referencing the exclusion of interest on Bonds of gross income for federal income tax purposes may be ignored or modified, as appropriate, as set forth in an opinion of Bond Counsel.

#### **Approved and Parity Swap Obligations (Section 211).**

The Commission may enter into one or more exchange contracts having an interest rate, cash-flow, or other basis desired by the Commission (a "Swap Agreement"), including, without limitation, interest rate swap agreements, forward payment conversion agreements, futures contracts, contracts providing for payments based on levels of or changes in interest rates, stock or other indices, or contracts to exchange cash flows or a series of payments, and contracts including, without limitation, interest rate floors or caps, options, swap options, puts or calls to hedge payment, spread or similar exposure. In the event the Commission wishes the payments to be made and received by the Commission under the Swap Agreement to be taken into account in any calculation of Annual Debt Service under the Indenture, the Commission shall file with the Trustee the following on or before entering into the Swap Agreement (in which event, such Swap Agreement shall constitute an "Approved Swap Agreement"):

(a) A copy certified by a Commission Official of the resolution or resolutions of the Commission authorizing the execution and delivery of the Swap Agreement (no Supplemental Indenture being required unless the Commission determines it to be necessary or appropriate);

(b) An original executed counterpart of the Swap Agreement;

(c) An opinion of Bond Counsel addressed to the Commission and to the Trustee, to the effect that the Commission has the authority to enter into the Swap Agreement and the Swap Agreement will not adversely affect the exclusion from gross income from interest on any Bonds for federal income tax purposes; provided that if the Swap Agreement relates to Bonds being issued and the Swap Agreement is entered into prior to the issuance of such Bonds, the portion of the opinion of Bond Counsel referring to tax-exempt status of the Bonds need not be delivered until such Bonds are issued;

(d) A certificate of the Commission, signed by a Commission Official, that the Commission is not under default under the Indenture;

(e) Evidence that the execution of the Swap Agreement will not result in a reduction or withdrawal of the rating then assigned to any Bonds by the Rating Agency;

(f) Evidence that the provisions of Section 703(d) of the Indenture have been met; and

(g) Such further documents as are required by the Swap Agreement or Bond Counsel.

In the event the Commission wishes to enter into an Approved Swap Agreement and to have its obligations thereunder be on parity with all Bonds and other Parity Obligations, it shall file with the Trustee the items set forth above, together with a Supplemental Indenture granting such parity position (in which event, such Swap Agreement shall constitute a "Parity Swap Agreement"). Upon entering into a Parity Swap Agreement, unless otherwise provided in the Supplemental Indenture, the Commission shall pay to the Trustee for deposit into the Interest Account the net amount payable, if any, to the Parity Swap Agreement Counterparty as if such amounts were additional amounts of interest due; and the Trustee shall pay on behalf of the Commission to the Parity Swap Agreement Counterparty, to the extent required under the Parity Swap Agreement, amounts deposited in the Interest Account. Net amounts received by the Commission or the Trustee from the counterparty pursuant to a Parity Swap Agreement shall be deposited to the credit of the Interest Account or to such other account as designated by a Commission Official.

Amounts paid by or to the Commission pursuant to Approved Swap Agreements which do not constitute Parity Swap Agreements shall not be required to be made through the Trustee as described in the preceding paragraph (but shall be taken into account in calculation of Annual Debt Service as provided in the definition of such term).

#### **Conversions of Variable Rate Indebtedness to Fixed Rate Indebtedness (Section 212).**

The Commission may convert Variable Rate Indebtedness to a fixed rate if permitted pursuant to the terms thereof and if the Commission was in compliance with the Rate Covenant for the most recently completed Fiscal Year. If the Commission did not meet the Rate Covenant for such Fiscal Year, the Commission must treat the proposed conversion as if it constituted the issuance of Additional Bonds by meeting the requirements set forth in Section 703(b) of the Indenture (computing the Annual Debt Service with respect to such Variable Rate Indebtedness proposed to be converted as bearing interest at the Bond Buyer Index or such other rate as identified by a Financial Consultant as being more appropriate under the circumstances).

#### **Purchase of Bonds at Any Time (Section 303).**

The Trustee, upon the written request of the Commission, shall purchase Bonds as specified by the Commission in the open market at a price not exceeding the price specified by the Commission. Such purchase of Bonds shall be made with funds available under the Indenture or provided by the Commission in such written request. Upon purchase by the Trustee, such Bonds shall be treated as delivered for cancellation pursuant to Section 208 of the Indenture. Nothing in the Indenture shall prevent the Commission from purchasing Bonds on the open market without the involvement of the Trustee and delivering such Bonds to the Trustee for cancellation pursuant to Section 208 of the Indenture. Bonds purchased pursuant to Section 303 of the Indenture which are subject to a mandatory sinking fund redemption schedule may be credited against future mandatory sinking fund redemption payments. The principal amount of Bonds to be redeemed by optional redemption under the Indenture may be reduced by the principal amount of Bonds purchased by the Commission and delivered to the Trustee for cancellation at least five (5) business days prior to the last date on which the notice of Redemption can be mailed.

#### **Construction Fund (Section 401).**

There is created in the Indenture a special fund known as the "Construction Fund", which shall be held in trust by the Trustee. Money shall be deposited to the Construction Fund pursuant to the provisions of Article II and from any other sources identified by the Commission.

Payment of the costs of the construction portion of any Project shall be made from the Construction Fund. Said payments may be made by payment to third parties or by reimbursement to the Commission. A special account shall be created and identified for each such construction project, although funds, at the written direction of a Commission Official, may be transferred from one such account in the Construction Fund to another account in such Fund.

#### **Payments From Construction Fund (Section 402).**

Before any payment shall be made from the Construction Fund, the Commission shall file with the Trustee a requisition, signed by a Commission Official stating in respect of each payment to be made:

- (a) the name of the Person, firm or corporation to whom payment is due,
- (b) the amount to be paid, and
- (c) the purpose for which the obligation to be paid was incurred;
- (d) each item is a proper charge against the Construction Fund and has not been paid, and
- (e) such requisition contains no item representing payment on account of any retainage which the Commission is at the date of such certificate not entitled to release.

Upon receipt of each requisition, the Trustee shall transfer from the Construction Fund to the Commission funds equal to the total of the amounts to be paid as set forth in such requisition and the Commission covenants to apply such funds to the payments described in the requisition.

#### **Trustee to Retain Requisitions (Section 403).**

All requisitions received by the Trustee pursuant to Section 402 of the Indenture may be relied upon by and shall be retained in the possession of the Trustee for a period of five (5) years, subject at all times to the inspection of the Commission, its agents and representatives, and any other Person authorized by a certificate of a Commission Official.

#### **Transfer of Excess Moneys in Construction Fund (Section 404).**

If at any time a Commission Official shall file with the Trustee a certificate stating that the cost of a Project has been finally determined and that the funds remaining in the account established for such Project exceed the remaining costs of the Project, then an amount equal to such excess shall be transferred to such fund or account as directed in the certificate, provided the same is accompanied by an opinion of Bond Counsel to the effect that such transfer or and/or application will not adversely affect the tax-exempt status of the interest of the applicable Bonds.

#### **Rate Covenant (Section 501).**

(a) The Commission covenants under the Indenture that at all times it will establish and maintain a schedules of Tolls for vehicular traffic over the System, and will collect Tolls, so that the Net Revenues in each Fiscal Year will at all times be at least sufficient to provide funds in an amount not less than

(1) the greater of:

(i) one hundred thirty percent (130%) of the Annual Debt Service for such Fiscal Year on account of all Applicable Long-Term Indebtedness then outstanding under the provisions of the Indenture; or

(ii) one hundred percent (100%) of the Maximum Annual Debt Service on all Applicable Long-Term Indebtedness, plus (A) the amount of required transfers from the Revenue Fund to the credit of the Reserve Maintenance Fund pursuant to the Annual Capital Budget, and (B) an amount sufficient to restore any deficiency in the Debt Service Reserve Fund within an eighteen (18) month period;

plus

(2) the amount of any Short-Term Indebtedness outstanding pursuant to Section 703(a)(2) of the Indenture; plus

(3) The amount of Net Revenues in excess of the sum of the amounts set forth in clauses (1) and (2), together with Other Revenues pledged to the payment of Subordinated Indebtedness, shall be sufficient to pay the Annual Debt Service for any Subordinated Indebtedness.

The foregoing covenant is referred to in the Indenture as the "Rate Covenant".

(b) The Commission's failure to meet the Rate Covenant shall not constitute an Event of Default under the Indenture if (1) no Event of Default occurred under Sections 801(a) or (b) of the Indenture as a result of such failure and (2) the Commission promptly after determining that the Rate Covenant was not met retains a Consultant at the expense of the Commission to make written recommendations as to appropriate revisions to the schedules of Tolls necessary or appropriate to meet the Rate Covenant and advises the Trustee in writing of such retention. Anything in the Indenture to the contrary notwithstanding, if the Commission shall comply with the recommendations of the Consultant in respect of Tolls, it will not constitute an Event of Default under the provisions of the Indenture if the Commission fails to meet the Rate Covenant during the succeeding Fiscal Year as long as no Event of Default has occurred under Sections 801(a) or (b) of the Indenture. If the Commission does not comply with the recommendations of the Consultant in respect of Tolls, the Trustee may, and upon the request of the holders of not less than twenty-five per centum (25%) in principal amount of the Bonds then outstanding and upon being indemnified to its satisfaction shall, institute and prosecute in a court of competent jurisdiction any appropriate action to compel the Commission to revise the schedules of Tolls. The Commission covenants that it will adopt, charge and collect Tolls in compliance with any final order or decree entered in any such proceeding.

In the event that the Consultant shall fail to file with the Commission such recommendations in writing within sixty (60) days after its retention by the Commission, the Trustee may designate and appoint a different Consultant at the expense of the Commission to make recommendations as to an adjustment of the schedules of Tolls, which recommendations shall be reported in writing to the Commission and to the Trustee within sixty (60) days after such retention. Such written report shall for all purposes be considered to be the equivalent of and substitute for the recommendations of the Consultant retained by the Commission.

In preparing its recommendations, the Consultant may rely upon written estimates of Revenues prepared by the other Consultants of the Commission. Copies of such written estimates signed by such Consultants shall be attached to such recommendations. The Commission covenants that promptly after receipt of such recommendations and the adoption of any revised schedules of Tolls, certified copies thereof will be filed with the Trustee.

#### **Classification of Tolls; Free Passage (Section 502).**

(a) Classifications. The Commission covenants under the Indenture that Tolls will be classified in a reasonable way to cover all traffic, so that the Tolls may be uniform in application to all traffic falling within any reasonable class regardless of the status or character of any Person participating in the traffic; provided that the foregoing shall not be interpreted to restrict the Commission's right, in its discretion in connection with its management of the System, to establish and maintain flexible Toll schedules including, but not limited to, provisions for, utilizing or otherwise taking into account, peak and nonpeak pricing, introductory pricing, weight, method of payment, frequency, carpooling, electronic and other Toll collection technologies, traffic management systems, and similar classifications.

Any change in classification which results in a reduced Toll or any new classification shall be reviewed by the Commission with a Consultant before implementing the same unless the same is temporary (e.g., having a duration of less than one year). In addition, in the event the Commission did not meet the Rate Covenant for the preceding Fiscal Year, any classification resulting in a reduced Toll or a new classification shall be subject to a Consultant approving the same before it is implemented. In all events, the Commission shall not make a change in classification or any new classification which would cause the Commission to fail to meet the Rate Covenant.

(b) Free Passage or Reduced Tolls. The Commission shall not grant free passage within a class and shall not reduce tolls within a class, except, in its discretion, it may do so:

(1) Through the use of commutation or other tickets or privileges based upon frequency or volume or through the use of electronic toll collection,



- (2) For operational or safety reasons including, but not limited to, reasons arising out of a work stoppage, work slowdown or work action,
- (3) To members, officers and employees of the Commission,
- (4) For use by the Army, Air Force, Navy, Coast Guard, Marine Corps or militia or any branch thereof in time of war or other emergency,
- (5) For use by the Pennsylvania or New Jersey State Police Forces in the performance of their duties, for members of any fire department or any local police department in the performance of their duties and for any public or private ambulance or rescue squad service for the emergency passage of its ambulance or rescue vehicles,
- (6) For use of any bridge not subject to toll as of the date of execution and delivery of the Indenture, or
- (7) As may otherwise be provided by law.

Any reduced Toll or grant of free passage (except as provided in clause (6) above) shall be reviewed by the Commission with a Consultant before implementing the same unless the same is temporary (e.g., having a duration of less than one year). In addition, in the event the Commission did not meet the Rate Covenant for the preceding Fiscal Year, any reduced Toll or free passage (except as provided in clause (6) above) shall be subject to a Consultant approving the same before it is implemented by the Commission unless the circumstances require immediate implementation, in which event the Commission shall obtain such approval promptly following implementation. In all events, the Commission shall not reduce Tolls or grant free passage (except as provided in clause (6) above) if it would cause the Commission to fail to meet the Rate Covenant.

(c) The Commission's covenant as to uniformity of tolls shall not be construed as requiring that Tolls for any given class of traffic shall be identical in amount throughout the entire System. The Commission may fix and place in effect schedules of Tolls for any given class of traffic wherein the Tolls charged for passage over a given bridge shall be different from the Tolls charged for passage over a different bridge.

#### **Creation of Funds (Section 503).**

In addition to the Construction Fund created pursuant to Section 401 of the Indenture and any other funds created by Supplemental Indentures, the following funds are created under the Indenture and amounts deposited therein shall be held in trust until applied as directed thereafter:

- (a) Revenue Fund, to be held by the Commission;
- (b) Debt Service Fund, to be held by the Trustee;
- (c) Debt Service Reserve Fund, to be held by the Trustee;
- (d) Reserve Maintenance Fund, to be held by the Commission;
- (e) General Reserve Fund, to be held by the Commission; and
- (f) Rebate Fund, to be held by the Trustee.

#### **Revenue Fund; Agreements With Other Toll Facilities (Section 504).**

(a) The Commission covenants under the Indenture that all Revenues will be deposited daily, as far as practicable, with a Depositary or Depositaries, to the credit of the Revenue Fund.

(b) To the extent now or hereafter authorized by law, the Commission may enter into agreements with any commission, authority or other similar legal body operating one or more toll road, bridge or tunnel facilities, whether or not connected to the System, (1) with respect to the establishment of combined schedules of Tolls and/or (2) for the collection and application of Tolls charged for passage over all or a portion of the System and/or trips over such other toll facilities, which on the basis of the revenues to be received by any such agreement will result in the receipt by the Commission of its allocable portion of such Tolls (less fees and expenses associated with such arrangement). To the extent now or hereafter authorized by law, the Commission also may enter into agreements with other Persons with respect to the collection of Tolls or advances or prepayment of Tolls charged for passage over all or a portion of the System, which on the basis of the revenues to be received by any such agreement will result in the receipt by the Commission of the appropriate Tolls for such passage. Unless approved by a Consultant, no agreement establishing a combined schedule of Tolls shall restrict the ability of the Commission to implement an increase in its Tolls at least annually.

Amounts received by the Commission from any such other commission, authority or other similar legal body or Person, in accordance with such agreements, shall be deposited in the Revenue Fund when they constitute Revenues. Such amounts may be held with one of the depositories noted in Subsection 504(a) of the Indenture until they constitute Revenues. Amounts received by the Commission and deposited in the Revenue Fund which are payable by the Commission to any such other commission, authority or other similar legal body or Person, in accordance with any such agreements, shall be withdrawn by the Commission from the Revenue Fund and shall be paid by the Commission in accordance with such agreements. In making any such withdrawal, the Commission shall be deemed to be certifying that such withdrawal is required pursuant to the terms of such an agreement. Any agreement entered into pursuant to Section 504 of the Indenture shall be made available to the Trustee upon its request.

(c) Except as otherwise provided in Section 504 of the Indenture, transfers from the Revenue Fund shall be made to the following funds and in the following order of priority:

- (1) Rebate Fund;
- (2) Operating Account;
- (3) Debt Service Fund;
- (4) Debt Service Reserve Fund;
- (5) Reserve Maintenance Fund; and

(6) General Reserve Fund (after retaining such funds in the Revenue Fund as are identified in the certificate described in Section 509 of the Indenture).

#### **Operating Account (Section 505).**

The Commission shall establish an account known as the "Operating Account" which shall be held by the Commission in the name of the Commission outside of the Indenture until applied as directed by the Indenture. The Commission shall transfer from the Revenue Fund on or before the last Business Day of each month to the credit of the Operating Account an amount equal to (a) the amount shown by the Annual Operating Budget to be necessary to pay Current Expenses for the ensuing month and (b) an amount determined by a Commission Official as being reasonably necessary to pay Current Expenses which are expected for such month, after taking into account the amount on deposit in the Operating Account (including the amount described in clause (a)), it being recognized that the Annual Operating Budget may have to be amended accordingly.

In making payments from the Operating Account, the Commission shall be deemed to be certifying that obligations in the stated amounts have been incurred by the Commission and that each item thereof was properly incurred in maintaining, repairing and operating the System, and has not been paid previously.

#### **Debt Service Fund (Section 506).**

There are created under the Indenture two separate accounts in the Debt Service Fund to be known as the "Interest Account" and the "Principal Account."

The Trustee and the Commission may create such additional accounts in the Debt Service Fund pursuant to a Supplemental Indenture as they deem necessary or appropriate, including, but not limited to, (a) an account into which drawings on a Credit Facility are to be deposited and from which principal (including redemption price) and Purchase Price of and interest on the Series of Bonds secured by such Credit Facility are to be paid (and upon such payment, amounts on deposit in the Principal and Interest Accounts for such Bonds shall be used to repay the provider of the Credit Facility for such payments), and (b) an account into which payments to the Commission to any Parity Swap Counterparty are to be deposited and from which payments to such Parity Swap Counterparty are to be paid.

On or before the last Business Day preceding each Interest Payment Date or principal (or sinking fund redemption) payment date or such other day as set forth in a Supplemental Indenture, after making the deposits to the Operating Account pursuant to Section 505 of the Indenture, the Commission shall withdraw from the Revenue Fund and pay over to the Trustee for deposit to the applicable Account in the Debt Service Fund (or to a Series Credit Facility Fund in lieu of either of the foregoing) the amounts due on any Parity Obligation.

The moneys in the Interest and Principal Accounts shall be held by the Trustee in trust for the benefit of the Bonds, to the extent the foregoing are payable from such accounts, and, to said extent and pending application, shall be subject to a lien and charge in favor of the Owners of the Bonds until paid out or transferred as hereinafter provided. There shall be withdrawn from the Interest Account and the Principal Account from time to time and set aside or deposited with the Trustee sufficient money for paying the interest on and the principal of and premium on the Bonds as the same shall become due, except to the extent such interest, principal or other amounts are payable from a fund or account other than the Debt Service Fund as provided in any Supplemental Indenture.

If at the time the Trustee is required to make a withdrawal from the Debt Service Fund the moneys therein shall not be sufficient for such purpose, the Trustee shall withdraw (or direct the Commission to pay over) the amount of such deficiency from the moneys on deposit in the following funds or accounts and transfer the same to the Debt Service Fund in the following order: the Debt Service Reserve Fund, the General Reserve Fund, and the Reserve Maintenance Fund.

#### **Debt Service Reserve Fund (Section 507).**

A special account within the Debt Service Reserve Fund may be created with respect to each series of Debt Service Reserve Fund Bonds issued under the Indenture and any Supplemental Indenture.

In each Fiscal Year, after first having made the deposits provided by Sections 505 and 506 of the Indenture, the Commission shall transfer from the Revenue Fund on or before the last day of each month and pay over to the Trustee to the credit of the Debt Service Reserve Fund (a) the amount, if any, required to make the amount on deposit in the Debt Service Reserve Fund equal to the Debt Service Reserve Requirement which restoration, as implied by the Rate Covenant contained in Section 501 of the Indenture, is intended to occur within eighteen (18) months; provided, such transfer shall not be required for Bonds for which no Debt Service Reserve Fund is required; and (b) the amount set forth in a Supplemental Indenture if an amount different from the Debt Service Reserve Requirement is required. The amounts transferred from the Revenue Fund to the Debt Service Reserve Fund pursuant to the previous sentence shall be allocated on a pro rata basis among the accounts and unallocated funds in the Debt Service Reserve Fund from which the moneys were withdrawn pursuant to the Indenture.

To the extent accounts are created in the Debt Service Reserve Fund for Debt Service Reserve Fund Bonds, the funds and DSRF Security, as hereinafter defined, held therein shall be available to make payments required under the Indenture for the benefit of all Debt Service Reserve Fund Bonds unless otherwise specified in a Supplemental Indenture.

In the event the Trustee shall be required to withdraw funds from the Debt Service Reserve Fund to restore a deficiency in the Debt Service Fund related to Debt Service Reserve Fund Bonds, the amount of such deficiency

shall be allocated pro rata among the accounts and unallocated funds in the Debt Service Reserve Fund that relate to the series of Debt Service Reserve Funds Bonds for which payment is coming due on the next succeeding payment date on the basis of the ratio that the debt service for each particular series of Debt Service Reserve Fund Bonds for which payment is coming due bears to the debt service for all series of Debt Service Reserve Fund Bonds for which payment is coming due on the next succeeding payment date. If, as provided in a Supplemental Indenture, an account (a "Specific Series Only Account") has been established in the Debt Service Reserve Fund solely for the benefit of a particular series of Bonds ("Specific Account Bonds"), the Trustee shall first withdraw monies from such Specific Series Only Account to restore a deficiency in the interest and principal subaccounts established in the Debt Service Fund for such Specific Account Bonds and, thereafter, to the extent necessary or required, from the other accounts and unallocated funds in the Debt Service Reserve Fund on a pro rata basis. In effecting the pro rata allocation of funds from the Debt Service Reserve Fund for the various series of Debt Service Reserve Fund Bonds, the share of such funds allocable to such series of Specific Account Bonds shall be net of funds withdrawn from the related Specific Series Only Account. At such time as a series of Specific Account Bonds are no longer Outstanding under the Indenture, the Commission may direct the Trustee to transfer monies in the related Specific Series Only Account to any other account established in the Debt Service Reserve Fund.

The Trustee is authorized, if the Commission deems desirable, to create one or more special accounts in order to comply with the Commission's tax covenants set forth in Section 712 of the General Indenture.

Moneys held in the Debt Service Reserve Fund shall be used for the purpose of paying interest on, maturing principal and mandatory sinking fund redemption price of Debt Service Reserve Fund Bonds whenever and to the extent that the moneys held for the credit of the Debt Service Fund shall be insufficient for such purpose. If at any time the moneys and the principal amount of any DSRF Security held in the Debt Service Reserve Fund shall exceed the Debt Service Reserve Requirement, the Commission shall direct, in writing, whether such excess moneys shall be transferred by the Trustee to the credit of the General Reserve fund or used to reduce the principal amount of any DSRF Security.

In lieu of the deposit of moneys into the Debt Service Reserve Fund, the Commission may cause to be provided a surety bond, an insurance policy, a letter of credit or similar financial instrument satisfactory to the Rating Agency (as evidenced by a letter from the Rating Agency confirming that the DSRF Security will not result in the rating on any outstanding Bonds being downgraded) (each, a "DSRF Security") payable to the Trustee for the benefit of the Bondholders in an amount equal to the difference between the Debt Service Reserve Requirement and the amounts then on deposit in the Debt Service Reserve Fund. The DSRF Security shall be payable (upon the giving of notice as required thereunder) on any Interest Payment Date on which moneys will be required to be withdrawn from the Debt Service Reserve Fund and applied to the payment of the principal of or interest on any Bonds to the extent that such withdrawals cannot be made by amounts on deposit in the Debt Service Reserve Fund.

If a disbursement is made pursuant to a DSRF Security, the Commission shall be obligated either (a) to reinstate the maximum limits of such DSRF Security or (b) to deposit into the Debt Service Reserve Fund funds in the amount of the disbursement made under such DSRF Security, or a combination of such alternatives, as shall provide that the amount credited to the Debt Service Reserve Fund equals the Debt Service Reserve Requirement within a time period of eighteen (18) months.

If the DSRF Security shall cease to have a rating satisfactory to the Rating Agencies described in the second preceding paragraph, the Commission shall use reasonable efforts to replace such DSRF Security with one having the required rating, but shall not be obligated to pay, or commit to pay, increased fees, expenses or interest in connection with such replacement or to deposit Revenues in the Debt Service Reserve Fund in lieu of replacing such DSRF Security with another.

#### **Reserve Maintenance Fund (Section 508).**

In each Fiscal Year, after first having made the deposits provided by Sections 504, 505, 506 and 507 of the Indenture, the Commission shall transfer from the Revenue Fund on or before the last Business Day of each month to the credit of the Reserve Maintenance Fund the amount shown in the Annual Capital Budget for the ensuing month.

Except as provided in Sections 506 and 804 of the Indenture, or except in case of an emergency, as characterized in a certificate signed by a Commission Official stating that the moneys to the credit of the Operating Account are insufficient to meet such emergency, moneys in the Reserve Maintenance Fund shall be disbursed to pay current capital expenditures shown in the Annual Capital Budget for the System, plus the cost of unusual or extraordinary maintenance (as determined solely by the Commission) and shall be disbursed only for such purposes, except to the extent hereinafter provided. Such purposes shall include, but not be limited to, paying the cost of constructing, improving and reconstructing improvements and betterments to all parts of the System now or hereafter open to vehicular or pedestrian traffic, including, without limitation, additional lanes, tunnels, interchanges, toll plazas, bridges and connecting roads, transit interface facilities and any other improvements deemed necessary or desirable by the Commission. In making any such withdrawal, the Commission shall be deemed to be certifying that such withdrawal is authorized pursuant to Section 508 of the Indenture.

The Commission may transfer any moneys from the Reserve Maintenance Fund to the credit of the General Reserve Fund from time to time if a Commission Official determines that the amount so to be transferred is not required for the purposes for which the Reserve Maintenance Fund has been created and said transfer is in accordance with the Annual Capital Budget as then in effect.

#### **General Reserve Fund (Section 509).**

After first having made the deposits provided by Sections 505 through 508 of the Indenture, the Commission shall transfer from the Revenue Fund on or before the last Business Day of each year (or more frequently if desired) to the credit of the General Reserve Fund any funds which a Commission Official determines to be in excess of the amount required to be reserved therein for future transfers to the Debt Service Fund.

Moneys in the General Reserve Fund may be expended by the Commission to restore deficiencies in any funds or accounts created under the Indenture and, absent any such deficiency, for any of the following purposes, with no one item having priority over any of the others:

- (a) To purchase or redeem Bonds;
- (b) To secure and pay the principal or redemption price of and interest on any Subordinated Indebtedness;
- (c) To make payments into the Construction Fund;
- (d) To fund improvements, extensions and replacements of the System;
- (e) As a self-insurance reserve; or
- (f) To further any corporate purpose.

The Commission is authorized to apply monies on deposit in the General Reserve Fund for any of such purposes.

#### **Rebate Fund (Section 510).**

The Commission covenants under the Indenture to calculate and to pay directly to the government of the United States of America all amounts due for payment of "arbitrage rebate" under Section 148(f) of the Code with respect to any Bonds. Nevertheless, the Commission in the future may deposit with the Trustee or direct the Trustee to deposit in the Rebate Fund amounts held in any Fund under the Indenture for any or all Series of Bonds (which direction shall specify the procedures for collection and payment of amounts due in respect of arbitrage rebate) if (a) required under any amendments to Section 148(f) of the Code or (b) the Commission otherwise determines that the funding of the Rebate Fund is necessary or appropriate. The Rebate Fund is a trust fund but the amounts therein do not constitute part of the Trust Estate. Amounts on deposit in the Rebate Fund may be used solely to make payments to the United States of America under Section 148 of the Code and to pay costs related to the calculation of the amounts due. Upon satisfaction of the Commission's covenants described above, any amounts remaining in the Rebate Fund shall be deposited in the General Reserve Fund.

### **Moneys Set Aside for Principal and Interest Held in Trust (Section 511).**

All moneys which the Commission or the Trustee shall have set aside (or deposited with any paying agent) for the purpose of paying any of the Bonds secured by the Indenture, either at the maturity thereof or upon call for redemption, shall be held in trust for the respective holders of such Bonds. However, any moneys which shall be so held or deposited by the Trustee, and which shall remain unclaimed by the holders of such Bonds for the period of two years after the date on which such Bonds shall have become payable, shall be paid to the Commission upon its written request or to such officer, board or body as may then be entitled by law to receive the same; thereafter the holders of such Bonds shall look only to the Commission or to such officer, board or body, as the case may be, for payment and then only to the extent of the amounts so received without any interest thereon, and the Trustee shall have no responsibility with respect to such moneys.

### **Additional Security (Section 512).**

Except as otherwise provided or permitted in the Indenture, the Trust Estate securing all Bonds issued under the terms of the Indenture shall be shared on a parity with other Parity Obligations on an equal and ratable basis. The Commission may, however, in its discretion and pursuant to a Supplemental Indenture, provide additional security or credit enhancement for specified Parity Obligations with no obligation to provide such additional security or credit enhancement to other Parity Obligations, except that no additional security or credit enhancement shall be provided unless there shall have been first delivered to the Trustee an opinion of Bond Counsel that the exclusion from gross income of interest on any Bonds for federal income tax purposes will not be adversely affected thereby. Moreover, the Commission may provide in a Supplemental Indenture that Bonds issued thereunder are not secured, or are secured only in part or only under certain circumstances, by the Trust Estate.

### **Investment of Moneys (Section 602).**

Moneys held in any of the funds or accounts under the Indenture may be retained uninvested, if deemed necessary by the Commission, as trust funds and secured as provided in Section 601 of the Indenture of the Investment or may be invested in Permitted Investments. All investments by the Trustee shall be made upon the oral request of the Commission, which is confirmed in writing by a Commission Official specifying the account or fund from which moneys are to be invested and designating the specific Permitted Investments to be acquired.

All investments made pursuant to Section 602 of the Indenture shall be subject to withdrawal or shall mature or be subject to repurchase or redemption by the holder, not later than the earlier of (a) the date or dates set forth for similar investments in the applicable Supplemental Indenture or (b) the date on which the moneys may reasonably be expected to be needed for the purpose of the Indenture.

Investments acquired with the moneys in any fund or account shall be a part of such fund or account and, for the purposes of determining the amount in such fund or account, shall be valued at their then fair market value. The interest or income received on an investment shall remain in the fund or account to which the investment is credited except to the extent otherwise provided in the applicable Supplemental Indenture.

The Trustee shall withdraw, redeem or sell all or a portion of any investment upon receipt of the written direction from the Commission or upon a determination by the Trustee that moneys in such fund or account are to be applied or paid by the Trustee pursuant to the provisions of the Indenture, and the proceeds thereof shall be deposited by the Trustee in the appropriate fund or account. Neither the Trustee nor the Commission shall be liable or responsible for any depreciation in the value of the Permitted Investments or for any losses incurred upon any unauthorized disposition thereof; provided, however, the Commission shall remain responsible to restore any deficiencies in the funds and account under the Indenture.

Each fund held under the Indenture shall be valued by the Trustee at least once annually within thirty days after the end of each Fiscal Year.

### **Payment of Principal, Interest and Premium (Section 701).**

The Commission covenants under the Indenture that it will promptly pay the principal of, premium, if any, and the interest on every Bond issued under the provisions of the Indenture at the places, on the dates and in the

manner provided in the Indenture and in said Bonds. Except as otherwise provided in the Indenture, the principal, interest and premium are payable solely from Net Revenues, which Net Revenues are pledged by the Indenture to the payment thereof in the manner and to the extent provided in the Indenture. Neither the general credit of the Commission nor the general credit nor the taxing power of the Commonwealth or the State or any political subdivision, agency or instrumentality thereof is pledged for the payment of the Bonds.

#### **Annual Operating Budget; Annual Capital Budget (Section 702).**

(a) Annual Operating Budget. The Commission covenants under the Indenture that on or before the 31st day of December (or such other date as is consistent with the Commission's policies then in effect) in each Fiscal Year it will adopt an operating budget for the ensuing Fiscal Year (the "Annual Operating Budget"). The Annual Operating Budget may contain separate components for the toll and toll-supported portions of the System. Copies of each Annual Operating Budget shall be provided to the Trustee. Prior to adopting the Operating Budget, the Commission shall provide a draft of such budget to a Consultant as determined by the Commission sufficiently in advance of the adoption of such Operating Budget in order for the Consultant to provide comments before such adoption. The Commission further covenants that it will prepare each such Annual Operating Budget on the basis of monthly requirements, so that it will be possible to determine the Current Expenses for each month during the Fiscal Year.

If for any reason the Commission shall not have adopted the Annual Operating Budget before the first day of any Fiscal Year, the budget for the preceding Fiscal Year, shall, until the adoption of the Annual Operating Budget, be deemed to be in force and shall be treated as the Annual Operating Budget under the provisions of Article VII of the Indenture.

The Commission may adopt an amended or supplemental Annual Operating Budget at any time for the remainder of the then current Fiscal Year. Copies of any such amended or supplemental Annual Operating Budget shall be provided to the Trustee.

(b) Annual Capital Budget. The Commission further covenants under the Indenture that it will adopt a capital budget (the "Annual Capital Budget") on or before December 31st of each Fiscal Year. The Annual Capital Budget will detail the Commission's planned capital expenditures over a period of up to 10 years and the portion of capital expenditures expected to be funded from the Reserve Maintenance Fund. The Annual Capital Budget shall include the expected beginning balance in the Reserve Maintenance Fund, the amounts to be transferred by the Commission to the Reserve Maintenance Fund from the General Reserve Fund, the amount of bond proceeds expected to become available during the Fiscal Year, the amounts expected to be transferred monthly by the Commission from the Revenue Fund, and the desired year-end balance in the Reserve Maintenance Fund. The Annual Capital Budget may contain separate components for the toll and toll-supported portions of the System. Prior to adopting the Annual Capital Budget, the Commission shall provide a draft of the capital budget to the Consulting Engineer a sufficient time in advance of the Commission's adoption of the Annual Capital Budget in order for the Consulting Engineer to provide comments before the date of such adoption. The Commission may adopt amendments or supplements to the Annual Capital Budget and any amendments or supplements thereto at any time. Copies of the Annual Capital Budget shall be provided to the Trustee.

#### **Limitations on Issuance of Additional Bonds and Execution of Approved Swaps (Section 703).**

(a) Short-Term Indebtedness. The Commission agrees under the Indenture that it will not issue any Additional Bonds constituting Short-Term Indebtedness unless (1) immediately after the incurrence of such Short-Term Indebtedness, the outstanding principal amount of all Short-Term Indebtedness issued pursuant to this subsection does not exceed 30% of the Revenues for the most recent Fiscal Year for which audited financial statements are available; and (2) for a period of not fewer than seven consecutive days within each Fiscal Year, commencing with the Fiscal Year following the issuance of such Short-Term Indebtedness, the aggregate principal amount of all outstanding Short-Term Indebtedness described in this subsection is reduced to less than 5% of the Revenues for the immediately preceding Fiscal Year for which audited financial statements are available. Short-Term Indebtedness issued pursuant to this subsection will be on a parity with other Additional Bonds.

(b) Long-Term Indebtedness. The Commission agrees under the Indenture that it will not issue any Additional Bonds constituting Long-Term Indebtedness unless prior to or contemporaneously with the incurrence thereof, the provisions of Section 210 of the Indenture are met and there is delivered to the Trustee:

(1) a certificate of a Commission Official certifying that the Historical Pro Forma Debt Service Coverage Ratio for the most recent Fiscal Year preceding the delivery of such certificate for which audited financial statements are available was not less than 1.50; or

(2) a report of a Consultant to the effect that (i) the Net Revenues of the Commission during the preceding Fiscal Year were at least 130% of the Maximum Annual Debt Service on all Applicable Long-Term Indebtedness then Outstanding and on any Applicable Long-Term Indebtedness proposed to be issued (which report may assume any revisions of the Tolls which have been approved by the Commission subsequent to the beginning of such Fiscal Year were in effect for the entire Fiscal Year), and (ii) the Projected Debt Service Coverage Ratio is not less than 1.30; or

(3) if the Long-Term Indebtedness is being incurred solely for the purposes of refunding, repurchasing or refinancing (whether in advance or otherwise) any outstanding Long-Term Indebtedness, a certificate of a Commission Official certifying the Maximum Annual Debt Service on all Applicable Long-Term Indebtedness prior to the issuance of the proposed Long-Term Indebtedness is greater than the Maximum Annual Debt Service on all Applicable Long-Term Indebtedness after the issuance of such proposed Long-Term Indebtedness.

(c) Subordinated Indebtedness. The Commission may incur Indebtedness (hereinafter referred to as "Subordinated Indebtedness") without limit which is subordinated and junior in all respects to payment of all Bonds and other Parity Obligations incurred under the Indenture so that the same is payable as to principal and interest once all other payments have been made under the Indenture from the amounts on deposit to the credit of the General Reserve Fund as long as prior to or contemporaneously with the incurrence thereof, there is delivered to the Trustee:

(1) a certificate of a Commission Official certifying that the Rate Covenant would have been met during the preceding Fiscal Year taking into account the Maximum Annual Debt Service on such Subordinated Indebtedness, and

(2) the other items listed in Section 210 of the Indenture (as the same may be modified to reflect the fact that such Indebtedness is Subordinated Indebtedness).

Such Subordinated Indebtedness and the payment thereof may be secured by a lien and pledge (a) subordinate to that of the Bonds on the Net Revenues or (b) prior to, on a parity with or subordinate to, the Bonds on Other Revenues, in which event the Commission and the Trustee may establish such other accounts under the Indenture as they deem necessary or appropriate.

(d) Approved Swap Agreements. The Commission agrees under the Indenture that it will not enter into any Approved Swap Agreement unless prior to or contemporaneously with the incurrence thereof, the provisions of Section 211 of the Indenture are met and there is delivered to the Trustee one of the certificates or reports required in subsection (b) above, which takes into account the expected payments by and to the Commission pursuant to such Approved Swap Agreement in calculating Annual Debt Service.

#### **Use and Operation of System (Section 704).**

The Commission covenants under the Indenture that:

- (a) it will maintain, and operate the System in an efficient and economical manner,
- (b) it will maintain the System in good repair and will make all necessary repairs, renewals and replacements, and



(c) it will comply with laws and all rules, regulations, orders and directions of any legislative, executive, administrative or judicial body applicable to the System, subject to the right of the Commission to contest the same in good faith and by appropriate legal proceedings.

#### **Inspection of the System (Section 705).**

The Commission shall make arrangements for the System to be inspected at least once every two years by engaging one or more Consultants to conduct the actual inspections and to prepare a report. Such report shall state (a) whether the System has been maintained in good repair, working order and condition since the last inspection report pursuant to Section 705 of the Indenture and (b) any recommendations which such Consultants may have as to revisions or additions to the Commission's latest Annual Capital Budget. Copies of such reports shall be filed with the Trustee.

#### **Construction of Projects (Section 706).**

The Commission covenants under the Indenture that:

(a) it will proceed with diligence to construct any Projects in conformity with law and all requirements of all governmental authorities having jurisdiction thereover.

(b) before entering into any construction contract it will secure the approval of the plans and specifications for such contract by a professional engineer or registered architect, who may be an employee of the Commission, and that it will require each Person, firm or corporation with whom it may contract in connection with the construction of any Project to furnish (1) a performance bond for 100% of the contract amount, and (2) a payment bond for 100% of the contract amount. Each of such bonds shall be executed by one or more responsible surety companies authorized to do business in the Commonwealth or the State (as applicable). Any proceeds received from such bonds first shall be applied toward the completion of the applicable Project and second shall be deposited in the General Reserve Fund.

(c) construction contracts for labor and/or materials also shall provide that payments thereunder shall not be made by the Commission in excess of 95% of current estimates except that once the work is at least 50% complete, such retainage may be reduced by a Commission Official to the extent such officer deems such reduction to be necessary or appropriate.

#### **Employment of Consulting Engineers (Section 707).**

The Commission covenants under the Indenture to employ an independent engineer or engineering firm or corporation having a national reputation for skill and experience in such work to perform any functions of the Consulting Engineer under the Indenture.

#### **Insurance (Section 708).**

The Commission covenants under the Indenture that it will keep the System and its use and operation thereof insured (including through self-insurance, which may be through reservations of a portion of the moneys in the General Reserve Fund or otherwise) at all times in such amounts, subject to such exceptions and deductibles and against such risks, as are customary for similar organizations. All insurance policies shall be carried with a responsible insurance company or companies authorized to do business in the Commonwealth or the State (as applicable) or shall be provided under a self-insurance program; any self-insurance program shall be actuarially sound in the written opinion of an accredited actuary, which opinion shall be filed with the Trustee at least annually. At any time and from time to time, the Commission may elect to terminate self-insurance of a given type. Upon making such election, the Commission shall, to the extent then deemed necessary by a Consultant, obtain and maintain comparable commercial insurance.

On or before February 1, 2003 and every three years thereafter (except with respect to self-insurance, which shall be annually), the Commission shall cause a Consultant to certify to the Trustee that (a) it has reviewed the adequacy of the Commission's insurance, listing the types and amounts of insurance, and (b) it finds such coverage to be reasonable and customary for similar organizations. If the Consultant concludes that coverage other

than that which is currently carried by the Commission should be carried, the Commission shall obtain such insurance coverage unless it determines in good faith that it is unreasonable or uneconomical to obtain such coverage and certifies the same in writing to the Trustee.

All insurance policies maintained by the Commission shall be available at reasonable times for inspection by the Trustee, its agents and representatives.

The Commission covenants under the Indenture that it will take actions as it deems necessary to demand, collect and sue for any proceeds that may become due and payable to it under any policy of insurance.

#### **Damage or Destruction (Section 709).**

Immediately after any damage to or destruction of any part of the System which materially adversely affects the Revenues of the Commission, the Commission will promptly take action to repair, reconstruct or replace the damaged or destroyed property or to otherwise ameliorate the adverse impact on Revenues.

#### **Annual Audit (Section 710).**

The Commission covenants under the Indenture that it will cause an annual audit to be made of its books and accounts of each Fiscal Year by an independent certified public accountant. A copy of such audit shall be filed with the Trustee promptly after the receipt by the Commission for such purpose.

#### **Encumbrance of Revenues; Sale, Lease or Other Disposition of Property (Section 711).**

The Commission covenants under the Indenture that so long as any Bonds are Outstanding under the Indenture,

(a) (1) it will not create or suffer to be created any lien or charge upon any Revenues, except the lien and charge of the Bonds secured by the Indenture and any Subordinated Indebtedness permitted pursuant to the provisions of the Indenture; and (2) from such Revenues or other funds available under the Indenture, it will pay or cause to be discharged, or will make adequate provision to pay or discharge, within ninety (90) days after the same shall accrue, all lawful claims and demands for labor, materials or supplies which, if unpaid, might by law become a lien upon any Revenues; provided, however, that the Commission shall not be required to pay or discharge, or make provision for such payment or discharge of, any such lien or charge so long as the validity thereof shall be contested in good faith and by appropriate legal proceedings.

(b) The Commission will not sell or otherwise dispose of any real estate or personal property comprising a portion of the System unless the Commission determines:

(1) such property (i) has become obsolete or worn out or is reasonably expected to become so within one year after the date of such disposition, (ii) is no longer used or useful in the operation of the System or in the generation of Revenues or (iii) is to be or has been replaced by other property; or

(2) by resolution that such action will not materially adversely affect the Net Revenues of the Commission.

The Commission shall have the discretion to deposit the proceeds of such sale or disposition in a fund or account held under the Indenture or a Commission account held outside the Indenture, as it deems appropriate. In the event the Commission did not meet the Rate Covenant during the preceding Fiscal Year, however, then the Commission shall notify the Trustee of the sale or disposition of any property which generated Net Revenues in excess of one percent of the Commission's Net Revenues during the prior Fiscal Year and all proceeds from such sale or disposition shall be deposited in the Revenue Fund.

(c) The Commission will not lease any real estate or personal property comprising a portion of the System unless the Commission determines by resolution that such action will not materially adversely affect the Net Revenues of the Commission. The rental and other proceeds from any lease shall not be required to be deposited in the Revenue Fund unless the effect of such lease is to reduce Tolls.

Without intending to limit the foregoing, the Commission also may enter into contracts or other forms of agreement for the use of any real estate comprising a portion of the System including, but not limited to, rights of way for telephone, telegraph, optic fiber and other forms of communication, electric, gas transmission and other lines or facilities for utilities, and other uses which do not materially adversely affect the operation of the System and the payments received in connection with the same shall be deposited in such accounts (which may be outside the Indenture) as the Commission shall determine.

#### **Tax Covenants (Section 712).**

(a) The Commission covenants under the Indenture that it will neither make nor direct the Trustee to make any investment or other use of the proceeds of any Series of Bonds issued under the Indenture that would cause such Series of Bonds to be "arbitrage bonds", as that term is defined in Section 148(a) of the Code, and that it will comply with the requirements of the Code throughout the term of such Series of Bonds. The Trustee covenants that in those instances where it exercises discretion over the investment of funds, it shall not knowingly make any investment inconsistent with the foregoing covenants.

(b) The Commission covenants under the Indenture that it (1) will take, or use its best efforts to require to be taken, all actions that may be required of the Commission for the interest on the Bonds to be and remain not included in gross income for federal income tax purposes and (2) will not take or authorize to be taken any actions within its control that would adversely affect that status under the provisions of the Code.

(c) Notwithstanding the foregoing, under the Indenture, the Commission reserves the right to elect to issue one or more Series of Additional Bonds, the interest on which is included in gross income for federal income tax purposes. If such election is made prior to the issuance of such Additional Bonds, then the covenants contained in Section 712 of the Indenture shall not apply to such Series of Bonds.

#### **Security Agreement; Financing Statements (Section 713).**

In addition to the assignment by the Commission of its rights in the Trust Estate to the Trustee, the Commission acknowledges in the Indenture that in order to more fully protect, perfect and preserve the rights of the Trustee and the Bondholders in the Trust Estate, the Commission grants to the Trustee a security interest in the Trust Estate and the proceeds thereof. The Commission agrees to cooperate with the Trustee in filing financing statements, and continuations thereof, in such manner and in such places as may be required by law in order to perfect such security interest. In the event that the Trustee becomes aware of a change in law which might affect such filing, the Trustee, at the expense of the Commission, may obtain an opinion of Counsel setting forth what actions, if any, the Commission or the Trustee should take in order to protect, perfect and preserve such security interest. The Commission shall cooperate with the Trustee in taking such actions, including the execution of any necessary financing statements and continuations thereof.

#### **Further Instruments and Action (Section 714).**

The Commission covenants under the Indenture that it will, from time to time, execute and deliver such further instruments and take such further action as may be required to carry out the purposes of the Indenture.

#### **Events of Default (Section 801).**

Each of the following is an "Event of Default" under the Indenture:

(a) Default in the payment of any installment of principal, redemption premium, if any, interest or other amount due on any Bond when the same becomes due and payable;

(b) Default in the payment by the Commission of any other Parity Obligation within two (2) business days after the same becomes due and payable (or such lesser period as may be provided in the Supplemental Indenture pertaining to such other Parity Obligation);

(c) Subject to the provisions of Section 807 of the Indenture, default in the performance or breach of any covenant, warranty or representation of the Commission contained in the Indenture (other than a default under subsections (a) and (b) of Section 801 of the Indenture);

(d) The occurrence of any Event of Default under any Supplemental Indenture; or

(e) (1) The occurrence of an Event of Bankruptcy of the Commission; (2) the appointment of a receiver, liquidator, assignee, custodian, trustee, sequestrator or other similar official of the Commission or of any substantial portion of its property, which appointment shall not have been rescinded or stayed within ninety (90) days after taking effect; or (3) the ordering of the winding up or liquidation of the affairs of the Commission.

#### **Remedies Upon Default (Section 802).**

(a) If an Event of Default under Section 801 of the Indenture occurs and is continuing, the Trustee may, and upon the written request to the Trustee by the holder or holders of not less than a majority in aggregate principal amount of the Bonds then Outstanding shall, subject to the requirements of Section 902(e) of the Indenture, by written notice to the Commission, declare the principal of and interest on the Bonds to the date of acceleration to be immediately due and payable.

(b) Upon any such declaration of acceleration, the Trustee shall immediately exercise such rights as it may have to draw upon any Credit Facility.

(c) At any time after such a declaration of acceleration has been made and before the entry of a judgment or decree for payment of the money due, the Trustee may, or the holders of not less than a majority in aggregate principal amount of the Bonds then Outstanding, may by written notice to the Commission and the Trustee, and subject to the requirements of Section 902(e) of the Indenture, direct the Trustee to rescind and annul such declaration and its consequences if:

(1) there has been paid to or deposited with the Trustee by or for the account of the Commission, or provision satisfactory to the Trustee has been made for the payment of a sum sufficient to pay: (i) all overdue installments of interest on the Bonds; (ii) the principal of and redemption premium, if any, on any Bonds which have become due other than by such declaration of acceleration and interest thereon; (iii) all amounts due on other Parity Obligations; (iv) to the extent lawful, interest upon overdue installments of interest and redemption premium, if any; and (v) all sums paid or advanced by the Trustee under the Indenture, together with the reasonable compensation, expenses, disbursements and advances of the Trustee, its agents and Counsel prior to the date of notice of rescission; and

(2) all Events of Default, other than those described in Sections 801(a) and (b) of the Indenture, if any, which have occasioned such acceleration, have been cured or waived.

(d) No such rescission and annulment shall affect any subsequent default or impair any consequent right.

#### **Additional Remedies (Section 803).**

(a) The Trustee, upon the occurrence of an Event of Default may, and upon the written request of the holders of not less than a majority in aggregate principal amount of the Bonds Outstanding and subject, to the requirements of Section 902(e) of the Indenture, shall proceed to protect and enforce its rights and the rights of the holders of the Bonds under the Indenture by a suit or suits in equity or at law, either for the specific performance of any covenant or agreement contained in the Indenture or in aid of the execution of any power in the Indenture granted, or for the enforcement of any other appropriate legal or equitable remedy, as the Trustee in reliance upon the advice of Counsel may deem most effective to protect and enforce any of the rights or interests of the Bondholders under the Bonds or the Indenture.

(b) Without limiting the generality of the foregoing, the Trustee shall at all times have the power to institute and maintain such proceedings as it may deem expedient: (1) to prevent any impairment of the Trust Estate by any acts which may be unlawful or in violation of the Indenture, and (2) to protect its interests and

the interests of the Bondholders in the Trust Estate and in the issues, profits, revenues and other income arising therefrom, including the power to maintain proceedings to restrain the enforcement of or compliance with any governmental enactment, rule or order which may be unconstitutional or otherwise invalid, if the enforcement of, or compliance with, such enactment, rule or order would impair the Trust Estate or be prejudicial to the interests of the Bondholders or the Trustee.

#### **Marshaling of Assets (Section 804).**

Upon the occurrence of an Event of Default, the Commission shall, upon demand of the Trustee, pay over or cause to be paid over to the Trustee (with any necessary endorsement or assignment) (i) forthwith, all moneys, securities and instruments held by the Commission in any fund or account under the Indenture (including, without limitation, the Revenue Fund, the Operating Account, the Reserve Maintenance Fund and the General Reserve Fund) and (ii) all Revenues as promptly as practicable after receipt thereof. Until such Event of Default is remedied, all moneys in all Funds (other than moneys in the Rebate Fund) shall be available to be utilized by the Trustee in accordance with Article VIII of the Indenture. The rights of the Trustee under Section 905 of Indenture shall be applicable. During the continuance of any such Event of Default, all provisions of the Indenture relating to the utilization of Funds, including but not limited to those set out in Article V of the Indenture, shall be superseded by Article VIII of the Indenture. Subsequent to the curing or waiver of any such Event of Default, the provisions of the Indenture relating to utilization of Funds, including the provisions of Article V of the Indenture, shall be reinstated.

#### **Trustee May File Proofs of Claim (Section 805).**

(a) In case of the pendency of any receivership, insolvency, liquidation, bankruptcy, reorganization, arrangement, adjustment, composition or other judicial proceeding under the Bankruptcy Law relating to the Commission, any other obligor upon the Bonds or any property of the Commission, the Trustee (whether or not the principal of the Bonds shall then be due and payable by acceleration or otherwise, and whether or not the Trustee shall have made any demand upon the Commission for the payment of overdue principal, redemption premium, if any, and interest) shall be entitled and empowered, by intervention in such proceeding or other means:

(1) to file and prove a claim for the whole amount of the principal, redemption premium, if any, and interest owing and unpaid in respect of the Bonds then Outstanding or for breach of the Indenture and to file such other papers or documents as may be necessary or advisable in order to have the claims of the Trustee (including any claim for the reasonable compensation, expenses, disbursements and advances of the Trustee, its agents and Counsel) and of the holders allowed in such proceeding; and

(2) to collect and receive any moneys or other property payable or deliverable on any such claims and to distribute the same;

and any receiver, assignee, trustee, liquidator, sequestrator or similar official in any such judicial proceeding is authorized under the Indenture by each holder to make such payments to the Trustee and, in the event that the Trustee shall consent to the making of such payments directly to the holders, to pay to the Trustee any amount due it for the reasonable compensation, expenses, disbursements and advances of the Trustee, its agents and Counsel, and any other amounts due the Trustee under Section 905 of the Indenture.

(b) No provision of the Indenture empowers the Trustee to authorize or consent to or accept or adopt on behalf of any Bondholders any plan of reorganization, arrangement, adjustment or composition affecting any of the Bonds or the rights of any holder thereof, or to authorize the Trustee to vote in respect of the claim of any holder in any proceeding described in subsection (a) of Section 805 of the Indenture.

#### **Possession of Bonds Not Required (Section 806).**

All rights under the Indenture and the Bonds may be enforced by the Trustee without possession of any Bonds or the production of them at trial or other proceedings. Any proceedings instituted by the Trustee may be brought in its name for itself or as representative of the Bondholders without the necessity of joining Bondholders as parties, and any recovery resulting from such proceedings shall, subject to Section 808 of the Indenture, be for the ratable benefit of the Bondholders.

### **Notice and Opportunity to Cure Certain Defaults (Section 807).**

No default under Section 801(c) of the Indenture shall constitute an Event of Default until written notice of such default shall have been given to the Commission by the Trustee or by the holders of at least 25% in aggregate principal amount of the Bonds Outstanding, and the Commission shall have had thirty (30) days after receipt of such notice to correct such default or cause such default to be corrected, and shall have failed to do so. In the event, however, that the default is such that it cannot be corrected within such thirty (30) day period, it shall not constitute an Event of Default if corrective action is instituted by the Commission within such period and diligently pursued (as determined by the Trustee) until the default is corrected.

### **Priority of Payment Following Event of Default (Section 808).**

Any portion of the Trust Estate held or received by the Trustee, by any receiver or by any Bond Owner pursuant to any right given or action taken under the provisions of Article VIII of the Indenture, after payment of the costs and expenses of the proceedings resulting in the collection of such moneys and of the fees, expenses and liabilities incurred by the Trustee and the transfer to Secured Owners (other than Owners of the Bonds) of amounts to which they are entitled by virtue of their parity position, shall be deposited and applied as follows:

(a) If the principal of all the Bonds then Outstanding and the interest accrued thereon has been declared to be due and payable immediately pursuant to Section 802(a) of the Indenture (or, but for any legal prohibition on such declaration of acceleration, such principal and interest would have been declared to be due and payable immediately pursuant to such Section or the provisions of any applicable Reimbursement Agreement) and such declaration has not been rescinded and annulled, there shall be deposited into the Debt Service Fund moneys sufficient to pay the amounts described in clauses (1), (2) and (3) below, and all such moneys shall be applied, as promptly as practicable (but subject to the provisions of the last paragraph of Section 808 of the Indenture), proportionately to

(1) the payment to the persons entitled thereto of all payments of interest then due on the Bonds with interest on overdue installments, if lawful, at their respective rates from the respective dates upon which they became due, in the order of maturity of the installments of such interest and, if the amount available shall not be sufficient to pay in full any particular installment of interest, then to the payment ratably, according to the amounts due on such installment;

(2) the payment to the persons entitled thereto of the unpaid principal of any of the Bonds which shall have become due (or which but for any legal prohibition on such declaration of acceleration would have become due) with interest on such Bonds at their respective rates from the respective dates upon which they became due and, if the amount available shall not be sufficient to pay in full the Bonds due on any particular date, together with such interest, then to the payment ratably, according to the amount of principal and interest due on such date, in each case to the persons entitled thereto, without any discrimination or privilege; and

(3) the payment of any other amounts then owing under the Indenture, and, after said deposit into the Debt Service Fund, there shall be paid the Subordinated Indebtedness issued or incurred by the Commission pursuant to Section 703(c) of the Indenture.

(b) If the principal of and interest on all Bonds then Outstanding and has not been declared to be due and payable immediately pursuant to Section 802(a) of the Indenture (or deemed to be due and payable as contemplated in paragraph (a) above) or if such a declaration has been rescinded and annulled, then there shall be deposited into the Debt Service Fund moneys sufficient to pay the amounts described in clauses (1), (2) and (3) below, and all such moneys shall be applied, as promptly as practicable (but subject to the provisions of the last paragraph of Section 808 of the Indenture),

(1) first, to the payment to the persons entitled thereto of all installments of interest then due on the Bonds, with interest on overdue installments, if lawful, at their respective rates from the respective dates upon which they became due, in the order of maturity of the installments of such interest and, if the amount available shall not be sufficient to pay in full any particular installment of interest, then to the payment ratably, according to the amounts due on such installment;

(2) second, to the payment to the persons entitled thereto of the unpaid principal of any of the Bonds which shall have become due with interest on such Bonds at their respective rates from the respective dates upon which they became due and, if the amount available shall not be sufficient to pay in full the Bonds due on any particular date, together with such interest, then to the payment ratably, according to the amount of principal and interest due on such date, in each case to the persons entitled thereto, without any discrimination or privilege; and

(3) third, to the payment of any other amounts then owing under the Indenture, and, after said deposit into the Debt Service Fund, there shall be paid the Subordinated Indebtedness issued or incurred by the Commission pursuant to Section 703(c) of the Indenture.

Whenever moneys are to be applied pursuant to the provisions of Section 808 of the Indenture, such moneys shall be applied at such times, and from time to time, as the Trustee shall determine, having due regard to the amount of such moneys available for application and the likelihood of additional moneys becoming available for such application in the future. Whenever the Trustee shall apply such funds, it shall fix the date (which shall be an Interest Payment Date unless it shall deem another date more suitable) upon which such application is to be made and upon such date interest on the amounts of principal and interest to be paid on such date shall cease to accrue. The Trustee shall give notice of the deposit with it of any such moneys and of the fixing of any such date by mail to all Owners of Bonds with respect to which the Event of Default occurred and shall not be required to make payment to any Bond Owner until such Bonds shall be presented to the Trustee for appropriate endorsement or for cancellation if fully paid.

#### **Bondholders May Direct Proceedings (Section 809).**

The owners of a majority in aggregate principal amount of the Bonds Outstanding shall, subject to the requirements of Section 902(e) of the Indenture, have the right, by an instrument or instruments in writing executed and delivered to the Trustee, to direct the method and place of conducting all remedial proceedings by the Trustee under the Indenture, provided that such direction shall not be in conflict with any rule of law or the Indenture and that the Trustee shall have the right to decline to follow any such direction which in the opinion of the Trustee would be unduly prejudicial to the rights of Bondholders not parties to such direction or would subject the Trustee to personal liability or expense. Notwithstanding the foregoing, the Trustee shall have the right to select and retain Counsel of its choosing to represent it in any such proceedings. The Trustee may take any other action which is not inconsistent with any direction under Section 809 of the Indenture.

#### **Limitations on Rights of Bondholders (Section 810).**

(a) No Bondholder shall have any right to pursue any other remedy under the Indenture or the Bonds unless: (1) an Event of Default shall have occurred and is continuing; (2) the owners of not less than a majority in aggregate principal amount of all Bonds then Outstanding have requested the Trustee, in writing, to exercise the powers hereinabove granted or to pursue such remedy in its or their name or names; (3) the Trustee has been offered indemnity satisfactory to it against costs, expenses and liabilities reasonably anticipated to be incurred; (4) the Trustee has declined to comply with such request, or has failed to do so, within sixty (60) days after its receipt of such written request and offer of indemnity; and (5) no direction inconsistent with such request has been given to the Trustee during such 60-day period by the holders of a majority in aggregate principal amount of the Bonds Outstanding.

(b) The provisions of subsection (a) of Section 810 of the Indenture are conditions precedent to the exercise by any Bondholder of any remedy under the Indenture. The exercise of such rights is further subject to the provisions of Sections 809, 811 and 814 of the Indenture. No one or more Bondholders shall have any right in any manner whatever to enforce any right under the Indenture, except in the manner provided in the Indenture. All proceedings at law or in equity with respect to an Event of Default shall be instituted and maintained in the manner provided in the Indenture for the equal and ratable benefit of the Bondholders of all Bonds Outstanding.

#### **Unconditional Right of Bondholder to Receive Payment (Section 811).**

Notwithstanding any other provision of the Indenture, any Bondholder shall have the absolute and unconditional right to receive payment of principal of, redemption premium, if any, and interest on the Bonds on and after the due date thereof, and to institute suit for the enforcement of any such payment.

### **Restoration of Rights and Remedies (Section 812).**

If the Trustee or any Bondholder has instituted any proceeding to enforce any right or remedy under the Indenture, and any such proceeding has been discontinued or abandoned for any reason, or has been determined adversely to the Trustee or such Bondholder, then the Commission, the Trustee and the Bondholders, subject to any determination in such proceeding, shall be restored to their former positions under the Indenture, and all rights and remedies of the Trustee and the Bondholders shall continue as though no such proceeding had been instituted.

### **Rights and Remedies Cumulative (Section 813).**

No right or remedy in the Indenture conferred upon or reserved to the Trustee is intended to be exclusive of any other right or remedy, but each such right or remedy shall, to the extent permitted by law, be cumulative of and in addition to every other right or remedy given under the Indenture or now or hereafter existing at law, in equity or otherwise. The assertion or employment of any right or remedy under the Indenture shall not prevent the concurrent assertion or employment of any other appropriate right or remedy.

### **Delay or Omission Not Waiver (Section 814).**

No delay or omission by the Trustee or any Bondholder to exercise any right or remedy accruing upon any Event of Default shall impair any such right or remedy or constitute a waiver of such Event of Default. Every right and remedy given by Article XIII of the Indenture or by law to the Trustee or the Bondholders may be exercised from time to time, and as often as may be deemed expedient, by the Trustee or the Bondholders, as the case may be.

### **Waiver of Defaults (Section 815).**

(a) The holders of a majority in aggregate principal amount of the Outstanding Bonds may, by written notice to the Trustee and subject to the requirements of Section 8.02(e) of the Indenture, waive any existing default or Event of Default and its consequences, except an Event of Default under Section 8.01(a) or (b) of the Indenture. Upon any such waiver, the default or Event of Default shall be deemed cured and shall cease to exist for all purposes. No waiver of any default or Event of Default shall extend to or effect any subsequent default or Event of Default or shall impair any right or remedy consequent thereto.

(b) Notwithstanding any provision of the Indenture, in no event shall any Person, other than all of the affected Bondholders, have the ability to waive any Event of Default under the Indenture if such event results or may result, in the opinion of Bond Counsel, in interest on any of the Bonds becoming includable in gross income for federal income tax purposes if the interest on such Bonds was not includable in gross income for federal income tax purposes prior to such event.

### **Notice of Events of Default (Section 816).**

If an Event of Default occurs of which the Trustee has or is deemed to have notice under Section 902(h) of the Indenture, the Trustee shall give Immediate Notice thereof to the Commission. Within 90 days thereafter (unless such Event of Default has been cured or waived), the Trustee shall give notice of such Event of Default to each Bondholder then Outstanding, provided, however, that except in the instance of an Event of Default under Section 801(a) or (b) of the Indenture, the Trustee may withhold such notice if and so long as the Trustee in good faith determines that the withholding of such notice does not materially adversely affect the interests of Bondholders, and provided, further, that notice to Bondholders of any Event of Default under Section 801(c) of the Indenture shall be subject to the provisions of Section 807 of the Indenture and shall not be given until the grace period has expired.

### **Duties and Responsibilities of the Trustee (Section 901).**

(a) Prior to the occurrence of an Event of Default of which it has or is deemed to have notice under the Indenture, and after the curing or waiver of any Event of Default which may have occurred:

(1) the Trustee undertakes to perform such duties and only such duties as are specifically set forth in the Indenture, and no implied covenants or obligations shall be read into the Indenture against the Trustee; and



(2) in the absence of bad faith on its part, the Trustee may conclusively rely, as to the truth of the statements and the correctness of the opinions expressed therein, upon certificates or opinions furnished to the Trustee that conform to the requirements of the Indenture; but the Trustee is under a duty to examine such certificates and opinions to determine whether they conform to the requirements of the Indenture.

(b) In case an Event of Default of which the Trustee has or is deemed to have notice under the Indenture has occurred and is continuing, the Trustee shall exercise such of the rights and powers vested in it by the Indenture, and use the same degree of care and skill in their exercise, as a prudent Person would exercise or use in the conduct of such Person's own affairs.

(c) No provision of the Indenture shall be construed to relieve the Trustee from liability for its own negligent action, its own negligent failure to act, or its own willful misconduct, except that:

(1) this subsection shall not be construed to limit the effect of subsection (a) of Section 901 of the Indenture;

(2) the Trustee is not liable for any error of judgment made in good faith by a Responsible Officer, unless it is proven that the Trustee was grossly negligent in ascertaining the pertinent facts;

(3) the Trustee is not liable with respect to any action it takes or omits to be taken by it in good faith in accordance with the direction of the Bondholders under any provision of the Indenture relating to the time, method and place of conducting any proceeding for any remedy available to the Trustee, or exercising any trust or power conferred upon the Trustee under the Indenture; and

(4) no provision of the Indenture shall require the Trustee to expend or risk its own funds or otherwise incur any liability in the performance of any of its duties under the Indenture, or in the exercise of any of its rights or powers, if it has reasonable grounds for believing that the repayment of such funds or adequate indemnity against such risk or liability is not reasonably assured to it.

(d) The Trustee shall maintain records of all investments and disbursements of proceeds in the funds and accounts established pursuant to the Indenture through the date ending six (6) years following the date on which all the Bonds have been retired.

(e) Whether or not expressly so provided, every provision of the Indenture relating to the conduct or affecting the liability of or affording protection to the Trustee is subject to the provisions of Section 901 of the Indenture.

#### **Certain Rights of the Trustee (Section 902).**

Except as otherwise provided in Section 901 of the Indenture:

(a) the Trustee may rely and is protected in acting or refraining from acting upon any resolution, certificate, statement, instrument, opinion, report, notice, request, direction, consent, order, approval, bond, debenture or other paper or document believed by it to be genuine and to have been signed or presented by the proper party or parties;

(b) any request, direction, order or demand of the Commission under the Indenture shall be sufficiently evidenced by a certificate of a Commission Official (unless other evidence thereof is specifically prescribed) and any resolution of the Commission may be sufficiently evidenced by a copy thereof certified by a Commission Official, as appropriate;

(c) whenever in the administration of the Indenture the Trustee deems it desirable that a matter be proved or established prior to taking, suffering or omitting any action under the Indenture, the Trustee (unless other evidence thereof is specifically prescribed) may, in the absence of bad faith on its part, rely upon a certificate of a Commission Official;

(d) the Trustee may consult with Counsel and the written advice of such Counsel or an opinion of Counsel shall be full and complete authorization and protection for any action taken, suffered or omitted by it in good faith and in accordance with such advice or opinion;

(e) the Trustee is under no obligation to exercise any of the rights or powers vested in it by the Indenture at the request or direction of any of the Bondholders unless such holders have offered to the Trustee security or indemnity satisfactory to the Trustee with respect to the costs, expenses and liabilities which may be incurred by it in compliance with such request or direction;

(f) the Trustee is not required to make any inquiry or investigation into the facts or matters stated in any resolution, certificate, statement, instrument, opinion, report, notice, request, direction, consent, order, approval, bond, debenture or other paper or document but the Trustee, in its discretion, may make such further inquiry or investigation into such facts or matters as it may deem necessary or advisable and, if the Trustee determines to make such further inquiry or investigation, it is entitled to examine the books, records and premises of the Commission, in person or by agent or attorney;

(g) the Trustee may execute any of its trusts or powers or perform any duties under the Indenture either directly or by or through agents or attorneys, and may in all cases pay, subject to reimbursement as provided in Section 905 of the Indenture, such reasonable compensation as it deems proper to all such agents and attorneys reasonably employed or retained by it, and the Trustee shall not be responsible for any misconduct or negligence of any agent or attorney appointed with due care by it;

(h) the Trustee is not required to take notice or deemed to have notice of any default or Event of Default under the Indenture, except Events of Default under Section 801(a) and (b) of the Indenture, unless a Responsible Officer of the Trustee has actual knowledge thereof or has received notice in writing of such default or Event of Default from the Commission or the holders of at least 25% in aggregate principal amount of the Outstanding Bonds, and in the absence of any such notice, the Trustee may conclusively assume that no such default or Event of Default exists;

(i) the Trustee is not required to give any bond or surety with respect to the performance of its duties or the exercise of its powers under the Indenture;

(j) in the event the Trustee receives inconsistent or conflicting requests and indemnity from two or more groups of Bondholders, each representing less than a majority in aggregate principal amount of the Bonds Outstanding, pursuant to the provisions of the Indenture, the Trustee, in its sole discretion, may determine what action, if any, shall be taken;

(k) the Trustee's immunities and protections from liability and its right to indemnification in connection with the performance of its duties under the Indenture shall extend to the Trustee's officers, directors, agents, attorneys and employees. Such immunities and protections and right to indemnification, together with the Trustee's right to compensation, shall survive the Trustee's resignation or removal, the defeasance or discharge of the Indenture and final payment of the Bonds;

(l) the permissive right of the Trustee to take the actions permitted by the Indenture shall not be construed as an obligation or duty to do so; and

(m) except for information provided by the Trustee concerning the Trustee, the Trustee shall have no responsibility for any information in any offering memorandum or other disclosure material distributed with respect to the Bonds, and the Trustee shall have no responsibility for compliance with any state or federal securities laws in connection with the Bonds.

#### **Trustee May Own Bonds (Section 904).**

The Trustee, in its commercial banking or in any other capacity, may in good faith buy, sell, own, hold and deal in any of the Bonds and may join in any action which any Bondholder may be entitled to take with like effect as if it were not Trustee. The Trustee, in its commercial banking or in any other capacity, may also engage in or be interested in any financial or other transaction with the Commission and may act as depository, trustee or agent for

any committee of Bondholders secured by the Indenture or other obligations of the Commission as freely as if it were not Trustee. The provisions of Section 904 of the Indenture shall extend to affiliates of the Trustee.

#### **Compensation and Expenses of the Trustee (Section 905).**

The Commission covenants and agrees under the Indenture:

(a) to pay to the Trustee compensation for all services rendered by it under the Indenture and under the other agreements relating to the Bonds to which the Trustee is a party in accordance with terms agreed to from time to time and, subsequent to default, in accordance with the Trustee's then-current fee schedule for default administration (the entirety of which compensation shall not be limited by any provision of law regarding compensation of a trustee of an express trust);

(b) to reimburse the Trustee upon its request for all reasonable expenses, disbursements and advances incurred or made by the Trustee in accordance with any provision of the Indenture, any other agreement relating to the Bonds to which it is a party or in complying with any request by the Commission or the Rating Agency, including the reasonable compensation, expenses and disbursements of its agents and Counsel, except any such expense, disbursement or advance attributable to the Trustee's negligence, willful misconduct or bad faith; and

(c) to indemnify, defend and hold the Trustee harmless from and against any loss, liability or expense incurred without negligence, willful misconduct or bad faith on its part, arising out of or in connection with the acceptance or administration of the office of Trustee under the Indenture, including the costs of defending itself against any claim or liability in connection with the exercise or performance of any of its powers or duties under the Indenture.

In the event the Trustee incurs expenses or renders services in any proceedings under Bankruptcy Law relating to the Commission, the expenses so incurred and compensation for services so rendered are intended to constitute expenses of administration under Bankruptcy Law.

As security for the performance of the obligations of the Commission under Section 905 of the Indenture, the Trustee shall have a lien prior to the lien securing the Bonds, which it may exercise through a right of setoff, upon all property or funds held or collected by the Trustee pursuant to the Indenture (other than moneys in the Rebate Fund). The obligations of the Commission to make the payments described in Section 905 of the Indenture shall survive discharge of the Indenture, the resignation or removal of the Trustee and payment in full of the Bonds.

#### **Qualifications of Trustee (Section 906).**

There shall at all times be a trustee under the Indenture which shall be a corporation or banking association organized and doing business under the laws of the United States of America or of any state, authorized under such laws to exercise corporate trust powers, which has a combined capital and surplus of at least \$50,000,000, or is an affiliate of, or has a contractual relationship with, a corporation or banking association meeting such capital and surplus requirement which guarantees the obligations and liabilities of the proposed trustee, and which is subject to supervision or examination by federal or state banking authority. If such corporation or banking association publishes reports of condition at least annually, pursuant to law or the requirements of such banking authority, then for purposes of Section 906 of the Indenture, the combined capital and surplus of such corporation or banking association shall be deemed to be its combined capital and surplus as set forth in its most recent report of condition so published. If at any time the Trustee shall cease to be eligible in accordance with the provisions of Section 906 of the Indenture, it shall resign promptly in the manner and with the effect specified in Article IX of the Indenture.

#### **Resignation or Removal of Trustee; Appointment of Successor Trustee (Section 907).**

(a) No resignation or removal of the Trustee and no appointment of a successor Trustee pursuant to Article IX of the Indenture shall become effective until the acceptance of appointment by the successor Trustee under Section 908 of the Indenture.

(b) The Trustee may resign at any time by giving written notice to the Commission. Upon receiving such notice of resignation, the Commission shall promptly appoint a successor Trustee by an instrument in

writing. If an instrument of acceptance has not been delivered to the resigning Trustee within 30 days after the giving of such notice of resignation, the resigning Trustee or any Bondholder may petition a court of competent jurisdiction for the appointment of a successor Trustee.

(c) Prior to the occurrence and continuance of an Event of Default under the Indenture, or after the curing or waiver of any such Event of Default, the Commission or the holders of a majority in aggregate principal amount of the Outstanding Bonds, may remove the Trustee and shall appoint a successor Trustee. In the event there shall have occurred and be continuing an Event of Default under the Indenture, the holders of a majority in aggregate principal amount of the Outstanding Bonds may remove the Trustee and shall appoint a successor Trustee. In each instance, such removal and appointment shall be accomplished by an instrument or concurrent instruments in writing signed by the Commission or such holders, as the case may be, and delivered to the Trustee, the Commission, the holders of the Outstanding Bonds and the successor Trustee.

(d) If at any time: (1) the Trustee shall cease to be eligible and qualified under Section 906 of the Indenture and shall fail or refuse to resign after written request to do so by the Commission or the holder of any Bond, or (2) the Trustee shall become incapable of acting or shall be adjudged insolvent, or a receiver of the Trustee or its property shall be appointed, or any public officer shall take charge or control of the Trustee, its property or affairs for the purpose of rehabilitation, conservation or liquidation, then in either such case (i) the Commission may remove the Trustee and appoint a successor Trustee in accordance with the provisions of subsection (c) of Section 907 of the Indenture; or (ii) any holder of a Bond then Outstanding may, on behalf of the holders of all Outstanding Bonds, petition a court of competent jurisdiction for removal of the Trustee and appointment of a successor Trustee.

(e) The Commission shall give written notice of each resignation or removal of the Trustee and each appointment of a successor Trustee to each holder of Bonds then Outstanding as listed in the Bond Register. Each such notice shall include the name and address of the applicable corporate trust office of the successor Trustee.

#### **Acceptance of Appointment by Successor Trustee (Section 908).**

(a) Every successor Trustee appointed under the Indenture shall execute, acknowledge and deliver to the Commission and the predecessor Trustee an instrument accepting its appointment. The resignation or removal of the retiring Trustee shall thereupon become effective, and the successor Trustee shall, without further act, deed or conveyance become vested with all the estates, properties, rights, powers and duties of the predecessor Trustee. Upon the request of the Commission or the successor Trustee, the predecessor Trustee shall execute and deliver an instrument transferring to the successor Trustee all the estates, properties, rights, powers and duties of the predecessor Trustee under the Indenture, and shall duly assign, transfer, deliver and pay over to the successor Trustee all of the Trust Estate and moneys and other property then held under the Indenture, subject, however, to the lien provided for in Section 905. The successor Trustee shall promptly give written notice of its appointment to the holders of all Bonds Outstanding in the manner prescribed in the Indenture, unless such notice has previously been given.

(b) No successor Trustee shall accept appointment as provided in Section 908 of the Indenture unless, as of the date of such acceptance, it is eligible and qualified under the provisions of Section 906 of the Indenture.

#### **Merger, Succession or Consolidation of Trustee (Section 909).**

Any corporation or association: (a) into which the Trustee is merged or with which it is consolidated; (b) resulting from any merger or consolidation to which the Trustee is a party; or (c) succeeding to all or substantially all of the corporate trust business of the Trustee, shall be the successor Trustee without the execution or filing of any document or the taking of any further action; provided, however, the Trustee shall give written notice to the Commission at least sixty (60) days prior to the effective date of the proposed merger, consolidation or transaction. Any such successor must be eligible and qualified under the provisions of Section 906 of the Indenture.

### **Notices to Bondholders; Waiver (Section 910).**

Where the Indenture provides for notice to Bondholders of any event, such notice shall be sufficiently given (unless otherwise expressly provided in the Indenture) if in writing and mailed, first-class postage prepaid, to each Bondholder affected by each event, at his or her address as it appears on the Bond Register, not later than the latest date, and not earlier than the earliest date, prescribed for the first giving of such notice. In any case where notice to Bondholders is given by mail, neither the failure to mail such notice, nor any default in any notice so mailed to any particular Bondholder shall affect the sufficiency of such notice with respect to other Bondholders. Where the Indenture provides for notice in any manner, such notice may be waived in writing by the Person entitled to receive such notice, either before or after the event, and such waiver shall be the equivalent of such notice. Waivers of notice by Bondholders shall be filed with the Trustee, but such filing shall not be a condition precedent to the validity of any action taken in reliance upon such waiver.

For so long as the Bonds are registered solely in the name of the Securities Depository or its nominee, where the Indenture provides for notice to the Bondholders of the existence of, or during the continuance of, any Event of Default, the Trustee, at the expense of the Commission, shall: (a) establish a record date (the "Record Date") for determination of the Persons entitled to receive such notice; (b) request a securities position listing from the Securities Depository showing the Depository Participants holding positions in the Bonds affected by such notice as of the Record Date for such notice; (c) mail, first class postage prepaid, copies of the notice as provided above to each Depository Participant identified in the securities position listing as holding a position in the Bonds as of the Record Date for the notice, to each nationally recognized municipal securities information repository (within the meaning of Rule 15c2-12 of the United States Securities and Exchange Commission under the Securities Exchange Act of 1934), and to any Person identified to the Trustee as a nonobjecting beneficial owner pursuant to the immediately following clause; (d) request that the Depository Participant retransmit the notice to all Persons for which it served as nominee on the Record Date, including nonobjecting beneficial owners, or retransmit the notice to objecting beneficial owners and provide a listing of nonobjecting beneficial owners for whom the Depository Participant served as nominee on the Record Date to the Trustee, (e) provide on behalf of the Commission and not as its agent, an undertaking to pay to any Depository Participant or other nominee (other than the Securities Depository) the reasonable costs of transmitting the notice to Persons for whom the Depository Participant acts as nominee; and (f) provide as many copies of the notice as may be requested by any nominee owner of the Bonds. Any default in performance of the duties required by this paragraph shall not affect the sufficiency of notice to the Bondholders given in accordance with the first paragraph of Section 910 of the Indenture, nor the validity of any action taken under the Indenture in reliance on such notice to Bondholders.

Where the Indenture provides for notice to the Bondholders of any event, the form of the notice shall prominently include a title block, separate from the body of the notice, which shall include the following information: (a) the complete title of the Bonds; (b) the complete name of the Commission; (c) the entire CUSIP number of each affected maturity of the Bonds (which may be appended to such notice); (d) the Record Date, and (e) a summary that is no more than the maximum number of characters permitted by the Securities Depository.

Any notice required or permitted by the Indenture to be given to the Securities Depository shall be given to it in the manner provided by Section 910 of the Indenture for giving notice to Bondholders, and also shall be given in such electronic format as reasonably requested by the Securities Depository) and shall be sent to: The Depository Trust Company, Proxy Department, 55 Water Street, 50th Floor, New York, New York 10041-0099, (telecop: (212) 855-5181), or such other address as may be specified by the Securities Depository in writing to the Trustee.

### **Supplemental Indentures Without Bondholders' Consent (Section 1001).**

The Commission and the Trustee may from time to time and at any time enter into Supplemental Indentures, without the consent of or notice to any Bondholder, to effect any one or more of the following:

- (a) cure any ambiguity, defect or omission or correct or supplement any provision in the Indenture or in any Supplemental Indenture;
- (b) grant to or confer upon the Trustee for the benefit of the Bondholders any additional rights, remedies, powers, authority or security that may lawfully be granted to or conferred upon the Bondholders or

the Trustee which are not contrary to or inconsistent with the Indenture as then in effect or to subject to the pledge and lien of the Indenture additional revenues, properties or collateral including Defeasance Obligations;

(c) add to the covenants and agreements of the Commission in the Indenture other covenants and agreements thereafter to be observed by the Commission or to surrender any right or power reserved in the Indenture to or conferred upon the Commission which are not contrary to or inconsistent with the Indenture as then in effect;

(d) permit the appointment of a co-trustee under the Indenture;

(e) modify, alter, supplement or amend the Indenture in such manner as shall permit the qualification of the Indenture, if required, under the Trust Indenture Act of 1939, the Securities Act of 1933 or any similar federal statute hereafter in effect;

(f) make any other change in the Indenture that is determined by the Trustee not to be materially adverse to the interests of the Bondholders;

(g) implement the issuance of Bonds permitted under the Indenture; or

(h) if all Bonds in a Series are Book Entry Bonds, amend, modify, alter or replace any Letter of Representations as provided in Section 209 of the Indenture or other provisions relating to Book Entry Bonds.

The Trustee shall not be obligated to enter into any such Supplemental Indenture which adversely affects the Trustee's own rights, duties or immunities under the Indenture.

Upon the written request to the Trustee by any Bondholder of \$1,000,000 or more of Bonds, the Trustee shall provide written notice of any Supplemental Indenture effected without the consent of or notice to any Bondholder.

#### **Supplemental Indentures Requiring Bondholders' Consent (Section 1002).**

The Commission and the Trustee, at any time and from time to time, may execute and deliver a Supplemental Indenture for the purpose of making any modification or amendment to the Indenture, but only with the written consent, given as provided in Section 1003 of the Indenture, of the holders of at least a majority in aggregate principal amount of the Bonds Outstanding at the time such consent is given, and in case less than all of the Bonds then Outstanding are affected by the modification or amendment, of the holders of at least a majority in aggregate principal amount of the Bonds so affected and Outstanding at the time such consent is given; provided, however, that if such modification or amendment will, by its terms, not take effect so long as any Bonds so affected remain Outstanding, the consent of the holders of such Bonds shall not be required and such Bonds shall not be deemed to be Outstanding for the purpose of any calculation of Outstanding Bonds under Section 1002 of the Indenture. Notwithstanding the foregoing, no modification or amendment contained in any such Supplemental Indenture shall permit any of the following, without the consent of each Bondholder whose rights are affected thereby:

(a) a change in the terms of stated maturity or redemption of any Bond or of any installment of interest thereon;

(b) a reduction in the principal amount of or redemption premium on any Bond or in the rate of interest thereon or a change in the coin or currency in which such Bond is payable;

(c) the creation of a lien on or a pledge of any part of the Trust Estate which has priority over or parity with (to the extent not permitted under the Indenture) the lien or pledge granted to the Bondholders under the Indenture (but this provision shall not apply to the release of any part of the Trust Estate as opposed to the creation of a prior or parity lien or pledge);

(d) the granting of a preference or priority of any Bond or Bonds over any other Bond or Bonds, except to the extent permitted under the Indenture;

(e) a reduction in the aggregate principal amount of Bonds of which the consent of the Bondholders is required to effect any such modification or amendment; or

(f) a change in the provisions of Section 1002 of the Indenture.

Notwithstanding the foregoing, the holder of any Bond may extend the time for payment of the principal of or interest on such Bond; provided, however, that upon the occurrence of an Event of Default, funds available under the Indenture for the payment of the principal of and interest on the Bonds shall not be applied to any payment so extended until all principal and interest payments which have not been extended have first been paid in full. Notice of any Supplemental Indenture executed pursuant to Section 1002 of the Indenture shall be given to the Bondholders promptly following the execution thereof.

#### **Consents of Bondholders and Opinions (Section 1003).**

Each Supplemental Indenture executed and delivered pursuant to the provisions of Section 1002 of the Indenture shall take effect only when and as provided in Section 1003 of the Indenture. A copy of such Supplemental Indenture (or brief summary thereof or reference thereto in form approved by the Trustee), together with a request to Bondholders for their consent thereto in form satisfactory to the Trustee, shall be sent by the Trustee to Bondholders, at the expense of the Commission, by first class mail, postage prepaid, provided that a failure to mail such request shall not affect the validity of the Supplemental Indenture when consented to as provided in the Indenture. Such Supplemental Indenture shall not be effective unless and until there shall have been filed with the Trustee (a) the written consents of Bondholders of the percentage of Bonds specified in Section 1002 of the Indenture given as provided in Section 1210 of the Indenture, and (b) the opinion of Counsel described in Section 1006 of the Indenture. Any such consent shall be binding upon the Bondholder giving such consent and upon any subsequent holder of such Bonds and of any Bonds issued in exchange therefor or in lieu thereof (whether or not such subsequent Bondholder has notice thereof), unless such consent is revoked in writing by the Bondholder giving such consent or a subsequent holder of such Bonds by filing such revocation with the Trustee prior to the date the Trustee receives the material required in subsections (a) and (b) of Section 1003 of the Indenture.

Notwithstanding anything else in the Indenture, if a Supplemental Indenture is to become effective under Section 1002 of the Indenture on the same date as the date of issuance of Additional Bonds, the consents of the underwriters or purchasers of such Additional Bonds shall be counted for purposes of Section 1002 of the Indenture and Section 1003 of the Indenture.

#### **Exclusion of Certain Bonds for the Purpose of Consent, etc. (Section 1004).**

Bonds which are to be disregarded under the last sentence of the definition of "Outstanding" shall not be deemed Outstanding for the purpose of consent or other action or any calculation of Outstanding Bonds provided for in Article X of the Indenture. At the time of any consent or other action taken under Article X of the Indenture or elsewhere in the Indenture, the Commission shall furnish the Trustee a certificate of a Commission Official, upon which the Trustee may rely, describing all Bonds so to be excluded.

#### **Delivery of Counsel's Opinion with Respect to Supplemental Indentures (Section 1006).**

Subject to the provisions of Section 901 of the Indenture, the Trustee in executing a Supplemental Indenture may rely, and shall be fully protected in relying, on an opinion of Counsel acceptable to it stating that (a) the execution of such Supplemental Indenture is authorized or permitted by the Indenture and (b) all conditions precedent to the execution and delivery of such Supplemental Indenture have been complied with, and an opinion of Bond Counsel that the execution and performance of such Supplemental Indenture shall not, in and of itself, adversely affect the federal income tax status of any Bonds, the interest on which is not included in gross income for federal income tax purposes.

#### **Effect of Supplemental Indentures (Section 1007).**

Upon the execution and delivery of any Supplemental Indenture under Article X of the Indenture, the Indenture shall be modified in accordance therewith, and such Supplemental Indenture shall form a part of the

Indenture for all purposes; and every holder of any Bond theretofore or thereafter authenticated and delivered under the Indenture shall be bound thereby.

**Discharge (Section 1101).**

(a) If the principal of any Bonds and the interest due or to become due thereon, together with any redemption premium required by redemption of any of the Bonds prior to maturity, shall be paid, or is caused to be paid, or is provided for under Section 1102 of the Indenture, at the times and in the manner to which reference is made in the Bonds, according to the true intent and meaning thereof, or the outstanding Bonds shall have been paid and discharged in accordance with Article XI of the Indenture, and

(b) all of the covenants, agreements, obligations, terms and conditions of the Commission under the Indenture shall have been kept, performed and observed and there shall have been paid to the Trustee, the Bond Registrar and the Paying Agents all sums of money due or to become due to them in accordance with the terms and provisions of the Indenture,

then the right, title and interest of the Trustee in the Trust Estate shall thereupon cease and the Trustee, on request of the Commission and at the expense of the Commission, shall release the Indenture and the Trust Estate and shall execute such documents to evidence such release as may be reasonably required by the Commission and shall turn over to the Commission, or to such other Person as may be entitled to receive the same, all balances remaining in any Funds under the Indenture except for amounts required to pay such Bonds or held pursuant to Section 511 of the Indenture.

**Defeasance; Deposit of Funds for Payment of Bonds (Section 1102).**

If the Commission deposits with the Trustee moneys or Defeasance Securities which, together with the earnings thereon, are sufficient to pay the principal amount of and redemption premium on any particular Bond or Bonds becoming due, either at maturity, by means of mandatory sinking fund redemption or by call for optional redemption or otherwise, together with all interest accruing thereon to the due date or Redemption Date, and pays or makes provision for payment of all fees, costs and expenses of the Commission and the Trustee due or to become due with respect to such Bonds, all liability of the Commission with respect to such Bond or Bonds shall cease, such Bond or Bonds shall be deemed not to be Outstanding under the Indenture and the holder or holders of such Bond or Bonds shall be restricted exclusively to the moneys or Defeasance Securities so deposited, together with any earnings thereon, for any claim of whatsoever nature with respect to such Bond or Bonds, and the Trustee shall hold such moneys, Defeasance Securities and earnings in trust for such holder or holders. In determining the sufficiency of the moneys and Defeasance Securities deposited pursuant to Section 1102 of the Indenture, the Trustee shall receive, at the expense of the Commission, and may rely upon: (a) a verification report of a firm of nationally recognized independent certified public accountants or other qualified firm acceptable to the Commission and the Trustee; provided, however, that the Trustee may waive the requirement for the provision of such verification report if the Bonds which are being defeased will be paid and cancelled within 90 days and the Trustee can calculate the interest to be paid on such Bonds to and including such payment or redemption date; and (b) an opinion of Bond Counsel to the effect that (1) all conditions set forth in Article XI of the Indenture have been satisfied and (2) that defeasance of any Bonds will not cause interest on the Bonds to be includable in gross income for federal income tax purposes. Upon such defeasance, all rights of the Commission, including its right to provide for optional redemption or prepayment of any Bonds on dates other than planned pursuant to such defeasance shall cease unless specifically retained by filing a written notification thereof with the Trustee at the time the Defeasance Securities are deposited with the Trustee. If the Commission desires to effect a defeasance of 2007B Bonds in a Short-Term Mode, and the actual rate of interest to be borne by such 2007B Bonds to the date of maturity or earlier redemption is not known on the date moneys or Defeasance Securities are deposited with the Trustee to effect such defeasance pursuant to this Section, then either (i) in determining the sufficiency of moneys and Defeasance Securities deposited pursuant to this Section, the interest rate borne by such 2007B Bonds for such period during which the interest rate is not known shall be deemed to be the Maximum Rate, or (ii) the Commission shall provide to the Trustee a Rating Confirmation Notice from each Rating Agency having a current rating assigned to such 2007B Bonds. If the Commission desires to effect a defeasance of 2007B Bonds in a SIFMA Index Rate Mode, and the actual rate of interest to be borne by such 2007B Bonds to the date of maturity or earlier redemption is not known on the date moneys or Defeasance Securities are deposited with the Trustee to effect such defeasance pursuant to Section 1102 of the Indenture, then either (i) in determining the sufficiency of moneys and Defeasance Securities



deposited pursuant to this Section, the interest rate borne by such 2007B Bonds for such period during which the interest rate is not known shall be deemed to be the Maximum Rate (which, without limitation, may be ascertained pursuant to a waiver, instrument or certificate delivered to the Trustee by the applicable Calculation Agent, Purchaser or Majority Holder under the related Index Rate Agreement), or (ii) the Commission shall provide to the Trustee a Rating Confirmation Notice from each Rating Agency having a current rating assigned to such 2007B Bonds.

At such times as Bonds shall be deemed to be paid under the Indenture, as aforesaid, it shall no longer be secured by or entitled to the benefits of the Indenture, except for the purposes of any such payment from such money or Defeasance Securities.

#### **Notice of Defeasance (Section 1103).**

(a) In case any of the Bonds, for the payment of which moneys or Defeasance Securities have been deposited with the Trustee pursuant to Section 1102 of the Indenture, are to be redeemed on any date prior to their maturity, the Commission shall give to the Trustee in form satisfactory to it irrevocable instructions to give notice of redemption of such Bonds on the redemption date for such Bonds.

(b) In addition to the foregoing notice, in the event such Bonds to be redeemed are not by their terms subject to redemption within the next succeeding 60 days, the Trustee shall give further notice to the Bondholders that the deposit required by Section 1102 of the Indenture has been made with the Trustee and that said Bonds are deemed to have been paid in accordance with Article XI of the Indenture and stating the maturity or redemption date or dates upon which moneys are to be available for the payment of the principal of and redemption premium, if any, on said Bonds; such further notice shall be given promptly following the making of the deposit required by Section 1102 of the Indenture; and such further notice also shall be given in the manner set forth in Section 302 of the Indenture; but no defect in said further notice nor any failure to give all or any portion of such further notice shall in any manner defeat the effectiveness of the deposit.

(c) If the Commission has retained any rights pursuant to Section 1102 of the Indenture, notice thereof shall be sent to Bondholders of such Bonds as soon as practicable and not later than any notice required by subsections (a) or (b) of Section 1103 of the Indenture.

#### **Applicable Law (Section 1206).**

The Indenture shall be governed in all respects including validity, interpretation and effect by, and shall be enforceable in accordance with, the Compact and, to the extent not inconsistent with the Compact, the laws of the Commonwealth.

#### **Limitation of Liability of Officials of the Commission (Section 1207).**

No covenant, stipulation, obligation or agreement contained in the Indenture shall be deemed to be a covenant, stipulation, obligation or agreement of any present or future member, agent or employee of the Commission in his individual capacity, and neither the members of the Commission nor any official executing the Bonds shall be liable personally on the Bonds or be subject to any personal liability or accountability by reason of the issuance thereof. Notwithstanding anything to the contrary contained in the Indenture, the Trustee, the Bondholders and any other party entitled to seek payment from the Commission under or to enforce the Indenture and the Bonds will be entitled to look solely to the Trust Estate, and such collateral, if any, as may now or hereafter be given to secure the payment of the obligations of the Commission under the Indenture and the Bonds, and no other property or assets of the Commission or any officer or director of the Commission shall be subject to levy, execution or other enforcement procedure for the satisfaction of the remedies under the Indenture, or for any payment required to be made under the Indenture and the Bonds, or for the performance of any of the covenants or warranties contained in the Indenture.

### **Successors and Assigns (Section 1208).**

All the covenants, promises and agreements in the Indenture contained by or on behalf of the Commission, or by or on behalf of the Trustee, shall bind and inure to the benefit of their respective successors and assigns, whether so expressed or not.

### **Form of Documents Delivered to Trustee (Section 1209).**

In any case where several matters are required to be certified by, or covered by an opinion of, any specified Person, it is not necessary that all such matters be certified by, or covered by the opinion of, only one such Person, or that they be so certified or covered by only one document, but one such Person may certify or give an opinion with respect to some matters and one or more other such persons as to other matters, and any such Person may certify or give an opinion as to such matters in one or several documents.

Any certificate of a Commission Official or the Commission may be based, insofar as it relates to legal matters, upon a certificate or opinion of, or representations by, Counsel, unless such official or officer knows, or in the exercise of reasonable care should know, that the certificate or opinion or representations with respect to the matters upon which his or her certificate or opinion is based are erroneous. Any opinion of Counsel may be based, insofar as it relates to factual matters, upon a certificate or opinion of, or representations by, a Commission Official stating that the information with respect to such factual matters is in the possession of the Commission, unless such Counsel knows, or in the exercise of reasonable care should know, that the certificate or opinion or representations with respect to such matters are erroneous.

Where any Person is required to make, give or execute two or more applications, requests, consents, certificates, statements, opinions or other instruments under the Indenture, they may, but need not, be consolidated and form one instrument.

### **Consent of Holders (Section 1210).**

Any consent, request, direction, approval, objection or other instrument required by the Indenture to be signed and executed by the Bondholders may be in any number of concurrent writings of similar tenor and must be signed or executed by such Bondholders in person or by an agent appointed in writing. Proof of the execution of any such consent, request, direction, approval, objection or other instrument or of the writing appointing any such agent and of the ownership of Bonds, if made in the following manner, shall be sufficient for any of the purposes of the Indenture, and shall be conclusive in favor of the Trustee with regard to any action taken by it under such request or other instrument, namely:

(a) The fact and date of the execution by any Person of any such writing may be proved by the certificate of any officer in any jurisdiction who by law has power to take acknowledgments within such jurisdiction that the Person signing such writing acknowledged the execution thereof, or by an affidavit of any witness to such execution.

(b) The Trustee may establish a record date for the purpose of identifying Bondholders entitled to issue any such consent, request, direction, approval or instrument.

## **SUMMARY OF CERTAIN PROVISIONS OF THE FOURTH SUPPLEMENTAL INDENTURE**

The following is a summary of certain provisions of the Fourth Supplemental Indenture, as such Fourth Supplemental Indenture has heretofore been supplemented and amended by the Fifth Supplemental Indenture, the Sixth Supplemental Indenture, and the Eighth Supplemental Indenture.

### **Payment of Principal and Interest of 2007B Bonds; Acceptance of Terms and Conditions (Section 4.3)**

(a) The interest on the 2007B Bonds shall become due and payable on the 2007B Interest Payment Dates in each year to and including the 2007B Maturity Date, and on each 2007B Redemption Date and on the date

of any acceleration prior thereto. The principal of the 2007B Bonds shall become due and payable on the 2007B Principal Payment Dates.

(b) By the acceptance of its 2007B Bond, the Owner and each Beneficial Owner thereof shall be deemed to have agreed to all the terms and provisions of such 2007B Bond as specified in such 2007B Bond, the General Indenture and the Fourth Supplemental Indenture, including, without limitation, the applicable Interest Periods, interest rates (including any applicable Alternate Rate), Purchase Dates, Purchase Prices, mandatory and optional purchase and redemption provisions applicable to such 2007B Bond, Mode conversion provisions and method and timing of purchase, redemption and payment. Such Owner and each Beneficial Owner further agree that if, on any date upon which one of its 2007 Bonds is to be purchased, redeemed or paid at maturity or earlier due date, funds are on deposit with the Paying Agent or the Trustee to pay the full amount due on such 2007B Bond, then such Owner or Beneficial Owner shall have no rights under the Original Indenture and the Fourth Supplemental Indenture, other than to receive such full amount due with respect to such 2007B Bond and that interest on such 2007B Bond shall cease to accrue as of such date.

(c) While any 2007B Bonds are Liquidity Provider Bonds, such 2007B Bonds shall bear interest and be payable at the times and in the amounts required under the Liquidity Facility. While any 2007B Bonds are held pursuant to an Index Rate Agreement upon failure of the Commission to purchase (or cause the purchase of) such 2007B Bonds on a Special Mandatory Purchase Date, such 2007B Bonds shall bear interest and be payable at the times and in the amounts required under the applicable Index Rate Agreement.

#### **Calculation and Payment of Interest; Change in Mode; Maximum Rate (Section 4.4).**

(a) When a Short-Term Mode is in effect, interest shall be calculated on the basis of a 365/366 day year for the actual number of days elapsed. When a SIFMA Index Rate Mode is in effect, interest shall be calculated on the basis of a 365/366 day year for the actual number of days elapsed. When a Long-Term Mode is in effect, interest shall be calculated on the basis of a 360 day year comprised of twelve 30-day months. Interest on the 2007B Bonds in the ARS Mode will be computed on the basis of a 360 day year of twelve thirty (30) day months for the actual number of days elapsed. Payment of interest on each 2007B Bond shall be made on each 2007B Interest Payment Date for such 2007B Bond for unpaid interest accrued during the Interest Accrual Period to the Owner of record of such 2007B Bond on the applicable Record Date.

(b) The 2007B Bonds in any Mode, other than a Fixed Rate Mode, may be changed to any other Mode at the times and in the manner hereinafter provided. Subsequent to such change in Mode (other than a change to a Fixed Rate Mode), the 2007B Bonds may again be changed to a different Mode at the times and in the manner hereinafter provided. A Fixed Rate Mode shall be in effect until the Maturity Date, or acceleration or redemption thereof prior to the 2007B Maturity Date, and may not be changed to any other Mode.

(c) No 2007B Bonds shall bear interest at an interest rate higher than the Maximum Rate.

(d) In the absence of manifest error, the determination of interest rates (including any determination of rates in connection with a New Mode) and Interest Periods by the Remarketing Agent, the Market Agent, each Calculation Agent or the Auction Agent and the record of interest rates maintained by the Paying Agent shall be conclusive and binding upon the Remarketing Agent, the Market Agent, each Calculation Agent, each Broker-Dealer, the Auction Agent, the Paying Agent, the Trustee, the Owners and the Beneficial Owners.

#### **Determination of Commercial Paper Rates and Interest Periods During CP Mode (Section 4.5).**

An Interest Period for the 2007B Bonds in the CP Mode shall be of such duration of from one to 270 calendar days (or such lesser number of days specified in a Credit Facility), ending on a day preceding a Business Day or the 2007B Maturity Date, as the Remarketing Agent shall determine in accordance with the provisions of this Section. Each 2007B Bond bearing interest at a Commercial Paper Rate can have Commercial Paper Rate Period, and bear interest at a Commercial Paper Rate, different than another 2007B Bond bearing interest at a Commercial Paper Rate. In making the determinations with respect to Interest Periods, subject to limitations imposed by the second preceding sentence and in Section 4.4 of the Fourth Supplemental Indenture, on each Rate Determination Date for a 2007B Bond bearing interest at a Commercial Paper Rate, the Remarketing Agent shall select for such 2007B Bond, the Interest Period which would result in the Remarketing Agent being able to remarket such 2007B

Bond at par in the secondary market at the lowest average interest cost for all 2007B Bonds bearing interest at a Commercial Paper Rate; provided, however, that if the Remarketing Agent has received notice from the Commission that the 2007B Bonds are to be changed from the CP Mode to any other Mode, the Remarketing Agent shall select Interest Periods which do not extend beyond the resulting applicable Mandatory Purchase Date of the 2007B Bonds.

Except while the 2007B Bonds are registered in a Book-Entry System, in order to receive payment of the Purchase Price, the Owner of any 2007B Bond in the CP Mode must present such 2007B Bond to the Paying Agent, by 12:00 noon on the Mandatory Purchase Date, in which case, the Paying Agent shall pay the Purchase Price to such Owner by 3:00 P.M. on the same day.

By 1:00 P.M. on each Rate Determination Date, the Remarketing Agent, with respect to each 2007B Bond in the CP Mode which is subject to adjustment on such date, shall determine the Commercial Paper Rate(s) for the Commercial Paper Rate Periods then selected for such 2007B Bond and shall give notice by Electronic Means to the Paying Agent and the Commission, of the Commercial Paper Rate Periods, the Purchase Date(s) and the Commercial Paper Rate(s). The Remarketing Agent shall make the Commercial Paper Rate and Commercial Paper Rate Period available after 2:00 p.m. on each Rate Determination Date by telephone or Electronic Means to any Beneficial Owner or Notice Party requesting such information.

#### **Determination of Interest Rates During the Daily Mode and the Weekly Mode (Section 4.6).**

The interest rate for the 2007B Bonds in the Daily Mode or Weekly Mode shall be the rate of interest per annum determined by the Remarketing Agent on and as of the applicable Rate Determination Date as the minimum rate of interest which, in the opinion of the Remarketing Agent under then-existing market conditions, would result in the sale of the 2007B Bonds in the Daily Rate Period or Weekly Rate Period, as applicable, at a price equal to the principal amount thereof, plus interest, if any, accrued through the Rate Determination Date during the then current Interest Accrual Period.

(a) During the Daily Mode, the Remarketing Agent shall establish the Daily Rate by 10:00 A.M. on each Rate Determination Date. The Daily Rate for any day during the Daily Mode which is not a Business Day shall be the Daily Rate established on the immediately preceding Rate Determination Date. The Remarketing Agent shall make the Daily Rate available no less frequently than 3:00 p.m. of each day by Electronic Means to any Beneficial Owner or Notice Party requesting such rate.

(b) During the Weekly Mode, the Remarketing Agent shall establish the Weekly Rate by 5:00 P.M. on each Rate Determination Date. The Weekly Rate shall be in effect during the applicable Weekly Rate Period. The Remarketing Agent shall make the Weekly Rate available after 5:00 P.M. on the Rate Determination Date by Electronic Means to any Beneficial Owner or Notice Party requesting such rate.

#### **Determination of Term Rates and Fixed Rates (Section 4.7).**

(a) Term Rates. Except as provided in Section 4.8 of the Fourth Supplemental Indenture, once the 2007B Bonds are changed to the Term Rate Mode, the 2007B Bonds shall continue in the Term Rate Mode until changed to another Mode in accordance with Section 4.10 hereof. The Term Rate shall be determined by the Remarketing Agent not later than 4:00 P.M. on the Rate Determination Date, and the Remarketing Agent shall make the Term Rate available by telephone or by Electronic Means to any Notice Party requesting such rate. The Term Rate shall be the minimum rate which, in the sole judgment of the Remarketing Agent, would result in a sale of the 2007B Bonds at a price equal to the principal amount thereof on the Rate Determination Date for the Term Rate Period selected by the Commission in writing delivered to the Remarketing Agent before such Rate Determination Date. If a new Term Rate Period is not selected by the Commission prior to a Rate Determination Date, the new Term Rate Period shall be the same length as the current Term Rate Period (or such lesser period as shall be necessary to comply with the last sentence of this paragraph). The Remarketing Agent shall make the Term Rate available by telephone or Electronic Means after 5:00 p.m. on the Rate Determination Date to any Notice Party requesting such Term Rate. Upon request of any Notice Party the Paying Agent shall give notice of such rate by Electronic Means. No Interest Period in the Term Rate Mode may extend beyond the applicable 2007B Maturity Date.

(b) Fixed Rates. The Remarketing Agent shall determine the Fixed Rate for the 2007B Bonds being converted to the Fixed Rate Mode in the manner and at the times as follows: not later than 4:00 P.M. on the applicable Rate Determination Date, the Remarketing Agent shall determine the Fixed Rate (or Rates, if the 2007B Bonds will have Serial Maturity Dates in accordance with Section 4.10(b)(v) of the Fourth Supplemental Indenture). Except as set forth in Section 4.10(b)(v) of the Fourth Supplemental Indenture, the Fixed Rate shall be the minimum interest rate which, in the sole judgment of the Remarketing Agent, will result in a sale of the 2007B Bonds at a price equal to the principal amount thereof on the Rate Determination Date. The Remarketing Agent shall make the Fixed Rate available by telephone or by Electronic Means after 5:00 p.m. on the Rate Determination Date to any Notice Party requesting such Fixed Rate. Upon request of any Notice Party, the Paying Agent shall give notice of such rate by Electronic Means. Subject to Section 4.10(b)(v) of the Fourth Supplemental Indenture, the Fixed Rate so established shall remain in effect until the Maturity Date of such 2007B Bonds.

#### **Alternate Rates (Section 4.8).**

The following provisions shall apply in the event (i) the Remarketing Agent fails or is unable to determine the interest rate or Interest Period for the 2007B Bonds other than when the 2007B Bonds are in the ARS Mode, (ii) the method by which the Remarketing Agent determines the interest rate or Interest Period with respect to the 2007B Bonds (or the selection by the Commission of the Interest Periods for 2007B Bonds in the Term Rate Mode) shall be held to be unenforceable by a court of law of competent jurisdiction or (iii) if the Remarketing Agent suspends its remarketing effort in accordance with the Remarketing Agreement. These provisions shall continue to apply until such time as the Remarketing Agent (or the Commission if applicable) again makes such determinations. In the case of clause (ii) above, the Remarketing Agent (or the Commission, if applicable) shall again make such determination at such time as there is delivered to the Remarketing Agent and the Commission an opinion of Bond Counsel to the effect that there are no longer any legal prohibitions against such determinations. The following shall be the methods by which the interest rates and, in the case of the CP and Term Rate Modes, the Interest Periods, shall be determined for the 2007B Bonds as to which any of the events described in clauses (i), (ii) or (iii) shall be applicable. Such methods shall be applicable from and after the date any of the events described in clauses (i), (ii) or (iii) first become applicable to the 2007B Bonds until such time as the events described in clauses (i), (ii) or (iii) are no longer applicable to the 2007B Bonds. These provisions shall not apply if the Commission fails to select an Interest Period for the 2007B Bonds in the Term Rate Mode for a reason other than as described in clause (ii) above.

(a) For Commercial Paper Rate Bonds, the next Interest Period shall be from, and including, the first day following the last day of the current Interest Period for the 2007B Bonds to, but excluding, the next succeeding Business Day and thereafter shall commence on each Business Day and extend to, but exclude, the next succeeding Business Day. For each such Interest Period, the interest rate for the 2007B Bonds shall be the applicable Alternate Rate in effect on the Business Day that begins an Interest Period.

(b) If the 2007B Bonds are in the Daily Mode, then the 2007B Bonds shall bear interest during each subsequent Interest Period at the Alternate Rate in effect on the first day of such Interest Period.

(c) If the 2007B Bonds are then in the Term Rate Mode, then the 2007B Bonds shall automatically convert to 2007B Bonds bearing interest at a Commercial Paper Rate of seven (7) days. For each such Interest Period, the interest rate for the 2007B Bonds shall be the applicable Alternate Rate in effect at the beginning of each such Interest Period.

(d) If the 2007B Bonds are in the Weekly Mode, then (1) the Weekly Rate for such week shall be the same as the Weekly Rate for the immediately preceding week if the Weekly Rate for such immediately preceding week was determined by the Remarketing Agent or (2) if no Weekly Rate for the immediately preceding week was determined by the Remarketing Agent or if the Weekly Rate determined by the Remarketing Agent shall be held to be invalid or unenforceable by a court of law, then the Weekly Rate for such week shall be equal to 100% of the SIFMA Index, made available for the week preceding the date of determination, or if such index is no longer available, or no such index was made available for the week preceding the date of determination, 70% of the interest rate on 30-day high grade unsecured commercial paper notes sold through dealers by major corporations as reported in The Wall Street Journal or The Bond Buyer on the day such Weekly Rate would otherwise be determined as provided herein for such Weekly Rate Period as specified by the Commission to the Paying Agent. However, if there is no Remarketing Agent in place, or if there is no Liquidity Facility in place, the rate will be set at a Maximum Rate.

#### **Alternate Rates (SIFMA Index Rate Mode) (Section 4.8A)**

The following provisions shall apply in the event (i) the Calculation Agent fails or is unable to determine the SIFMA Index Rate for the 2007B Bonds, or (ii) the method by which the Calculation Agent determines the SIFMA Index Rate for the 2007B Bonds shall be held to be unenforceable by a court of law of competent jurisdiction. In the case of clause (i) these provisions shall continue to apply until such time as the Calculation Agent again makes such determinations. In the case of clause (ii) above, the Calculation Agent shall again make such determination at such time as there is delivered to the Calculation Agent and the Commission an opinion of Bond Counsel to the effect that there are no longer any legal prohibitions against such determinations. If the SIFMA Index cannot otherwise be determined hereby, the "SIFMA Index" shall be the prevailing rate as determined by the Calculation Agent, in consultation with the Commission and the applicable Purchaser, for tax-exempt state and local governmental bonds meeting the then-current Securities Industry and Financial Markets Association criteria for an interest period of, or most approximating, a weekly period (and the Applicable Spread shall be added consistent with the related Index Rate Agreement).

#### **Determination of the Auction Period Rate (Section 4.9).**

The Auction Period Rate and provisions relating to the 2007B Bonds while Outstanding in the ARS Mode, shall be determined as provided in Exhibit "C" to the Fourth Supplemental Indenture.

#### **Index Interest Rates (Section 4.9A)**

(a) During each SIFMA Index Interest Period, the 2007B Bonds of each sub-Series shall bear interest at the applicable SIFMA Index Rate. The Calculation Agent shall determine the SIFMA Index Rate on each Rate Determination Date (using the SIFMA Index as of the Computation Date immediately preceding such Rate Determination Date) during the SIFMA Index Rate Period, and such rate shall become effective for the applicable SIFMA Index Interest Period on the SIFMA Rate Reset Date next succeeding such Computation Date. The SIFMA Index Rate shall be rounded upward to the second decimal place.

(b) Excess Interest. Anything in the Fourth Supplemental Indenture to the contrary notwithstanding, if the rate of interest payable on the Series 2007B Bonds during a SIFMA Index Interest Rate Period or on Unremarketed Bonds shall exceed the Maximum Rate for any SIFMA Index Interest Period, then (i) such Bonds shall bear interest at the Maximum Rate during such SIFMA Index Interest Period and (ii) interest on such Bonds at the rate equal to the difference between (A) the rate of interest borne by such Bonds without regard to the Maximum Rate and (B) the Maximum Rate (the "Excess Interest") shall be deferred until such date as the rate of interest borne by such Bonds without regard to the Maximum Rate ceases to exceed the Maximum Rate, at which time such portion of the deferred Excess Interest shall be payable with respect to such Bonds as will cause the rate of interest then paid thereon to equal the Maximum Rate, which payments of deferred Excess Interest shall continue to apply until all deferred Excess Interest with respect to such Bonds is fully paid.

(c) Default Rate/Other Rates. From and after the occurrence of an Event of Default (under the applicable Index Rate Agreement), the applicable sub-Series of 2007B Bonds shall, for so long as such Event of Default continues, bear interest at the applicable Default Rate. From and after any Taxable Date, the interest rate on the applicable sub-Series of 2007B Bonds bearing interest at a SIFMA Index Rate shall be established at a rate at all times equal to the Taxable Rate. Upon notice to the Trustee and Calculation Agent (from the applicable Purchaser under the applicable Index Rate Agreement), to the effect that such Event of Default (or event causing a Taxable Rate to apply) no longer exists or has been cured or waived, interest on the applicable sub-Series of 2007B Bonds shall be set in accordance with the provisions of subparagraph (a) above in the same manner as prior to the occurrence of such Event of Default (or event causing a Taxable Rate to apply). In the circumstance where a Default Rate, Taxable Rate, Purchaser Rate and/or other rate may apply to a sub-Series of 2007B Bonds, the controlling rate, unless otherwise specified in the applicable Index Rate Agreement, and subject to the following sentence, shall be selected in the following order: first, the Default Rate shall apply to the exclusion of other rates, second, the Taxable Rate shall apply to the exclusion of other rates. However, this subparagraph (c) shall not prevent the application of the Maximum Rate should it otherwise apply pursuant to subparagraph (b) above.

(d) Consistency of Mode. If any 2007B Bond of a particular sub-Series is in the SIFMA Index Rate Mode (or shall be converted into the SIFMA Index Rate Mode), then all 2007B Bonds of such same sub-Series shall be in the SIFMA Index Rate Mode (or converted into the SIFMA Index Rate Mode).

(e) For the applicable Initial Periods, the sub-Series 2007B-1 Bonds and the sub-Series 2007B-2 Bonds shall be held through DTC. After the applicable Initial Period, the foregoing arrangements shall be maintained unless specified otherwise by a Commission Official in an instrument delivered to the Trustee and other Notice Parties.

(f) Notwithstanding anything in the Fourth Supplemental Indenture to the contrary, for so long as the 2007B Bonds of a sub-series bear interest at a SIFMA Index Rate and the Book-Entry System is not in effect, all amounts payable to the Purchaser with respect to any such 2007B Bonds held by the Purchaser shall be made by the Trustee to the Purchaser (without any presentment thereof, except upon the payment of the final installment of principal, and without any notation of such payment being made thereon), in such manner or at such address in the United States as may be designated by the Purchaser in writing to the Trustee (the "Bank Direct Payment Period"). During any Bank Direct Payment Period, (i) any payment made shall be accompanied by sufficient information to identify the source and proper application of such payment, (ii) the Purchaser shall notify the Trustee in writing of any failure to receive any payment of the principal of or interest on the 2007B Bonds when due, and the Trustee shall not be deemed to have any notice of such failure unless it has received such notice in writing, and (iii) if any 2007B Bonds are sold or transferred, the Purchaser shall notify the Trustee and the Commission in writing of the name and address of the transferee, and it will, prior to delivery of such 2007B Bonds, make a notation on such 2007B Bonds of the date to which interest has been paid thereon and of the amount of any prepayments made on account of the principal thereof.

#### **Changes in Mode (Section 4.10).**

Subject to the provisions of Section 4.10 of the Fourth Supplemental Indenture, the Commission may effect a change in Mode with respect to all or a portion of the 2007B Bonds by following the procedures set forth in Section 4.10 of the Fourth Supplemental Indenture. If a change in Mode will make the 2007B Bonds subject to Rule 15c2-12 promulgated under the Securities Act of 1934, as amended, it shall be a condition to the conversion that the Commission shall have executed a continuing disclosure undertaking satisfying the requirements of such Rule and shall cooperate with the Remarketing Agent, if any, the Broker-Dealers, if any, and any Underwriter (as defined in such Rule) in satisfying the requirements of such Rule. If the Mode is to be changed for a portion of the 2007B Bonds (and not all of the 2007B Bonds), the Commission and the Trustee shall take such actions as shall be necessary or desirable to distinguish the portion of the 2007B Bonds in one Mode from the portion of the 2007B Bonds in a different Mode, including assigning different designations to different portions of the 2007B Bonds or creating additional sub-series of 2007 Bonds.

(a) Changes to Modes Other Than to Fixed Rate Mode. All or a portion of the 2007B Bonds (other than 2007B Bonds in the Fixed Rate Mode) may be changed from one Mode to another Mode (other than from the Fixed Rate Mode and subject to Section 4.10(a)(iv) and (v) of the Fourth Supplemental Indenture which shall govern Mode changes to the SIFMA Index Rate Mode) as follows:

(i) Mode Change Notice; Notice to Owners. No later than a Business Day which is at least thirty (30) days (or such shorter time as may be agreed to by the Commission, the Trustee, the Tender Agent, the Remarketing Agent, the Auction Agent and the applicable Broker-Dealer for each sub-series of 2007B Bonds) preceding the proposed Mode Change Date, the Commission shall give written notice to the Notice Parties of its intention to effect a change in the Mode from the Mode then prevailing (for purposes of this Section, the "Current Mode") to another Mode (for purposes of Section 4.10 of the Fourth Supplemental Indenture, the "New Mode") specified in such written notice, and, if the change is to a Term Rate Mode, the length of the initial Interest Period as set by the Commission. In the case of a change to a Term Rate Mode or from one Term Rate Mode to another Term Rate Mode, such notice to the Notice Parties shall also include a statement as to whether there will be a Liquidity Facility and/or Credit Enhancement in effect with respect to the 2007B Bonds following such change and the identity of any provider of such Liquidity Facility and/or Credit Enhancement. Notice of the proposed change in Mode shall be given by the Tender Agent to the Owners of the 2007B Bonds not less than the fifteenth (15th) day next preceding the Mode Change Date provided that no notice need be given for a Mode Change Date

occurring on the first Business Day following the last day of a Commercial Paper Rate Period or Term Rate Mode or on a Substitution Date. Notice of early substitution of a Liquidity Facility and/or Credit Enhancement for 2007B Bonds in the Term Rate Mode shall be given no less than five (5) days prior to the expiration date of such Liquidity Facility and/or Credit Enhancement. Such notice shall state: (1) the Mode to which the conversion will be made and the Mode Change Date and in the case of a conversion to an ARS Mode, the length of the initial Auction Period; (2) that the 2007B Bonds will be subject to mandatory purchase on the Mode Change Date (regardless of whether all of the conditions to the change in the Mode are satisfied) and the Purchase Price of the 2007B Bonds; and (3) if the Book-Entry System is no longer in effect, information with respect to required delivery of 2007B Bond certificates and payment of Purchase Price. If the conversion is from an ARS Mode, such notice shall also state that such Owner is required to tender such Owner's 2007B Bonds for purchase on the Mode Change Date only if all of the conditions to the change in the Mode are satisfied and that, if such conditions are not satisfied, then the 2007B Bonds shall not be subject to mandatory tender, the Auction Agent will continue to implement the Auction Procedures on the Auction Dates with respect to the 2007B Bonds which otherwise would have been converted excluding, however, the Auction Date falling on the Business Day next preceding the failed Mode Change Date, and the interest rate will continue to be the Auction Period Rate; provided, however, that the interest rate borne by the 2007B Bonds during the Auction Period commencing on such failed Mode Change Date will be the Maximum Rate, and the Auction Period will be the seven-day Auction Period. In the case of 2007B Bonds being converted to the ARS Mode, the Tender Agent shall not mail such written notice if converting from a Commercial Paper Rate Period until it has received a written confirmation from the Remarketing Agent that no Interest Period for the 2007B Bonds in the CP Mode extends beyond the Mode Change Date.

(ii) Determination of Interest Rates. The New Mode shall commence on the Mode Change Date and the interest rate(s) (together, in the case of a change to the CP Mode, with the Interest Period(s)) shall be determined by the Remarketing Agent (or the Commission in the case of the Interest Period for the 2007B Bonds converted to the Term Rate Mode) in the manner provided in Sections 4.5, 4.6 and 4.7 of the Fourth Supplemental Indenture, as applicable. In the case of 2007B Bonds being converted to the ARS Mode, the length of the initial Auction Period shall be selected by the Commission and the interest rate for the Initial Period commencing on the Mode Change Date shall be the lowest rate which, in the judgment of the applicable Broker-Dealer and the Remarketing Agent, is necessary to enable the 2007B Bonds to be remarketed at a price equal to the principal amount thereof, plus accrued interest, if any, on the Mode Change Date. Such determination shall be conclusive and binding upon the Commission, the Trustee, the Auction Agent and the Owners of the 2007B Bonds to which such rate will be applicable. Not later than 5:00 p.m., New York City time, on the date of determination of the interest rate for the Initial Period, the Broker-Dealer shall notify the Trustee, the Commission and the Auction Agent of that rate by Electronic Means.

(iii) Conditions Precedent:

(A) The Mode Change Date shall be:

(1) in the case of a change from the CP Mode, the next Mandatory Purchase Date for all of the Commercial Paper Rate 2007B Bonds;

(2) in the case of a change from the Daily or Weekly Mode, any Business Day; provided that in the case of a change from the Daily or Weekly Mode to an ARS Mode, the Mode Change Date shall be a regularly scheduled Interest Payment Date for the Daily or Weekly Mode; and

(3) in the case of a change from the Term Rate Mode to another Mode, or from a Term Rate Period to a Term Rate Period of a different duration, the Mode Change Date shall be limited to any 2007B Interest Payment Date on which the 2007B Bonds are subject to optional redemption or to the last 2007B Interest Payment Date of the current Term Rate Period, as the case may be. Such 2007B Bonds shall be purchased on such Mode Change Date at a Purchase Price equal to 100% of the principal amount thereof, provided that if such 2007B Bonds are to be purchased on an 2007B Interest Payment



Date other than the last 2007B Interest Payment Date and would otherwise be subject to optional redemption on such Mode Change Date at a Redemption Price of more than 100% of the principal amount thereof, such 2007B Bonds shall be purchased at a Purchase Price equal to such Redemption Price. Any premium paid in excess of 100% of the principal amount of such 2007B Bonds purchased shall be paid by the Commission; and

(4) in the case of a change from the ARS Mode to another Mode, the Mode Change Date shall be a date occurring (x) on a 2007B Interest Payment Date following an Auction Period, and (y) no sooner than the fifteenth (15th) day following notice to Owners of 2007B Bonds of such change in Mode.

(5) in the case of a change from the SIFMA Index Rate Mode to another Mode, the Mode Change Date shall be a regularly scheduled 2007B Interest Payment Date.

(B) If the 2007B Bonds to be converted are in the CP Mode, no Interest Period set after delivery by the Commission to the Remarketing Agent of the notice of the intention to effect a change in Mode shall extend beyond the day preceding the proposed Mode Change Date.

(C) The following items shall have been delivered to the Trustee, the Paying Agent, the Remarketing Agent, if any, and each Broker-Dealer, if any, on or prior to the Mode Change Date:

(1) in the case of a change from a Short-Term Mode to a Long-Term Mode or from a Long-Term Mode to a Short-Term Mode or to or from the ARS Mode, a Favorable Opinion of Bond Counsel dated the Mode Change Date and addressed to the Notice Parties;

(2) if there is to be a Liquidity Facility or an Alternate Liquidity Facility or a Credit Enhancement or an Alternate Credit Enhancement delivered in connection with such change, the items required by Section 5.8(d) of the Fourth Supplemental Indenture; and

(3) a Rating Confirmation Notice, or if the Mode Change Date is a Mandatory Purchase Date, a notice from the Rating Agencies of the rating(s) to be assigned the 2007B Bonds on such Mode Change Date.

(D) No 2007B Bonds may be converted to the ARS Mode when the 2007 Bonds are not held by a depository in Book-Entry form.

(E) After any conversion of any sub series of the 2007B Bonds from an ARS Mode, there shall remain not less than \$10,000,000 in aggregate principal amount of the 2007B Bonds bearing interest at an Auction Period Rate unless otherwise consented to by the Brokers-Dealers.

(F) It is a condition to the conversion of the 2007B Bonds from an ARS Mode that all of the 2007B Bonds of such sub series being converted be remarketed on the Mode Change Date.

(G) It is a condition to the conversion of 2007B Bonds from a SIFMA Index Rate Mode that the Trustee shall have determined that any necessary qualifications with DTC or other securities depository are in place.

(iv) Conditions Precedent to Initial Conversion to SIFMA Index Rate Mode:

The initial conversion of 2007B Bonds to the SIFMA Index Rate Mode is subject to the following conditions:

(A) The conversion of a sub-Series of 2007B Bonds into the SIFMA Index Rate Mode shall occur no earlier than the Mandatory Purchase Date in connection with the Expiration Date of the related Dexia Credit Facility for such 2007B Bonds.

(B) A Favorable Opinion of Bond Counsel shall be delivered to the Trustee.

(C) An executed copy of each Index Rate Agreement, together with Purchaser payment instructions, shall be delivered to the Trustee.

(v) Provisions Related to Subsequent Conversions to SIFMA Index Rate Mode:

Any subsequent conversions of 2007B Bonds to the SIFMA Index Rate Mode (or to a new SIFMA Index Rate Period in the circumstance where 2007B Bonds are then presently in a SIFMA Index Rate Mode) are subject to the following provisions:

Subsequent Conversions to SIFMA Index Rate Period. The Commission may, from time to time, by written direction to the Notice Parties, elect that 2007B Bonds shall bear interest at a SIFMA Index Rate. The direction of the Commission shall specify (A) the proposed effective date of the SIFMA Index Rate Period, which shall be (1) in each case, a Business Day not earlier than the 10th day following the second Business Day after receipt by the Trustee of such direction, (2) in the case of a Conversion from a Term Rate Period, the day immediately following the last day of such Term Rate Period or a day on which the 2007B Bonds would otherwise be subject to optional redemption pursuant hereto if such Mode conversion did not occur and (3) in the case of a Mode conversion from an ARS Mode, an Interest Payment Date immediately following an Auction Period, (B) the Mandatory Purchase Date for the 2007B Bonds to be purchased, which shall be the proposed effective date of the SIFMA Index Rate Period, (C) the applicable Special Mandatory Purchase Date with respect to such SIFMA Index Rate Period, and (D) the Applicable Spread. Such direction shall also confirm the appointment of a Calculation Agent for the duration of the SIFMA Index Rate Period and a Market Agent in connection with the conversion to the new SIFMA Index Rate. The new Applicable Spread shall be determined by the Market Agent (based upon its examination of tax-exempt obligations comparable, in the judgment of the Market Agent, to the 2007B Bonds and known to the Market Agent to have been priced or traded under then prevailing market conditions) to provide for the minimum interest rate at which a Purchaser will agree to purchase such 2007B Bonds on the effective date of the SIFMA Index Rate Period at a price (without regard to accrued interest) equal to the principal amount thereof. In addition, the direction of the Commission shall be accompanied by a form of the notice to be mailed by the Trustee to the Holders of such 2007B Bonds. During each SIFMA Index Rate Period commencing on the date specified and ending on the day immediately preceding the effective date of the next succeeding Rate Period, each 2007B Bond shall bear interest at a SIFMA Index Rate.

Notice of Conversion to SIFMA Index Rate Period. The Bond Trustee shall give notice by first class mail of a conversion to a SIFMA Index Rate to the Holders of the 2007B Bonds not fewer than 10 days prior to the proposed effective date of such SIFMA Index Rate. Such notice shall state (A) the proposed effective date of the SIFMA Index Rate which shall be the conversion date; (B) that the 2007B Bonds are subject to mandatory tender for purchase on the proposed effective date of the SIFMA Index Rate and setting forth the applicable purchase price and the place of delivery for purchase of such 2007 Bonds; and (C) the information set forth in Section 5.2 of the Fourth Supplemental Indenture. In addition, if a SIFMA Index Rate is to be in effect immediately following such Mode Change Date, the Commission shall provide a copy of the conversion notice to the Calculation Agent contemporaneously with the Bond Trustee. In connection with any such conversion to the SIFMA Index Rate Mode, an initial interest rate that allows the applicable 2007B Bonds to be remarketed at par may be specified in the applicable Index Rate Agreement.

Delivery of Certain Documents. In connection with any such conversion to the SIFMA Index Rate Mode, a Favorable Opinion of Bond Counsel, an executed copy of the applicable Index Rate Agreement and Purchaser payment instructions shall be delivered to the Trustee.

Exchange of Bonds. Upon conversion to a SIFMA Index Rate Mode from a different Interest Rate Mode, the Commission shall execute at the written request of the Purchaser, and the Bond Trustee shall authenticate and deliver, new Bonds of like dates and denominations and in the applicable form attached to the Fourth Supplemental Indenture as Exhibit A-1 or A-2 with appropriate changes.

(b) Change to Fixed Rate Mode. At the option of the Commission, all or any portion of the 2007B Bonds bearing interest at an Auction Period Rate, a Daily Rate, a Weekly Rate, a SIFMA Index Rate, Commercial Paper Rates or Term Rates (in an amount which is a 2007B Authorized Denomination for the new Rate Period) may be changed to the Fixed Rate Mode, as provided in this Section 4.10(b) of the Fourth Supplemental Indenture. On any Business Day which is at least thirty (30) days (or such shorter time as may be agreed to by the Commission, the Trustee and the Remarketing Agent, the Auction Agent and each Broker-Dealer, but in any event not less than the fifteenth (15th) day next preceding the Mode Change Date) before the proposed Mode Change Date, the Commission shall give written notice to the Notice Parties stating that the Mode will be changed to the Fixed Rate Mode and setting forth the proposed Mode Change Date. Such notice shall also state whether or not there shall be Credit Enhancement with respect to the 2007B Bonds following such change and, if so, the identity of the Credit Provider. In addition, such notice shall state whether some or all of the 2007B Bonds to be converted shall be converted to Serial 2007B Bonds and, if so, the applicable Serial Maturity Dates and Serial Payments, all as determined pursuant to subsection (v) of this subsection (b). Any such change in Mode shall be made as follows:

(i) Mode Change Date. The Mode Change Date shall be:

(A) in the case of a change from the CP Mode, the next Mandatory Purchase Date for the Commercial Paper Rate Bonds;

(B) in the case of a change from the Daily or Weekly Mode, any Business Day; and

(C) in the case of a change from the Term Rate Mode, the Mode Change Date shall be limited to any Interest Payment Date on which the 2007B Bonds are subject to optional redemption or to the next Mandatory Purchase Date for the Term Rate 2007B Bonds, as the case may be. Such 2007B Bonds shall be purchased on such Mode Change Date at a Purchase Price equal to 100% of the principal amount thereof, provided that if such 2007B Bonds would otherwise be subject to optional redemption on such Mode Change Date at a Redemption Price of more than 100% of the principal amount thereof, such 2007B Bonds shall be purchased at a Purchase Price equal to such Redemption Price. Any premium paid in excess of 100% of the principal amount of such 2007B Bonds purchased shall be paid by the Commission; and

(D) in the case of a change from the ARS Mode, a date occurring on (x) a 2007B Interest Payment Date following an Auction Period, and (y) no sooner than the fifteenth (15th) day following notice to the Owners of the 2007B Bonds of such change in Mode.

(E) in the case of a change from the SIFMA Index Rate Mode, a regularly scheduled 2007B Interest Payment Date.

(ii) Notice to Owners. Not less than the fifteenth (15th) day next preceding the Mode Change Date, the Paying Agent shall mail, in the name of the Commission, a notice of such proposed change to the Owners of the 2007B Bonds stating that the Mode will be changed to the Fixed Rate Mode and the proposed Mode Change Date. If the conversion is from a Mode other than an ARS Mode, such notice shall also state that such Owner is required to tender such Owner's 2007B Bonds for purchase on such proposed Mode Change Date regardless of whether all of the conditions to the change to the Fixed Rate Mode are satisfied. If the conversion is from an ARS Mode, such notice shall also state that such Owner is required to tender such Owner's 2007B Bonds for purchase on the Mode Change Date only if all of the conditions to the change to the Fixed Rate Mode are satisfied and that, if such conditions are not satisfied, then the 2007B Bonds shall not be subject to mandatory tender, the Auction Agent will continue

to implement the Auction Procedures on the Auction Dates with respect to the 2007B Bonds which otherwise would have been converted excluding however, the Auction Date falling on the Business Day next preceding the failed Mode Change Date, and the interest rate will continue to be the Auction Period Rate; provided, however, that the interest rate borne by the 2007B Bonds during the Auction Period commencing on such failed Mode Change Date will be the Maximum Rate, and the Auction Period will be the seven-day Auction Period.

(iii) General Provisions Applying to Change to Fixed Rate Mode. The change to the Fixed Rate Mode shall not occur unless the following items shall have been delivered to the Commission, the Trustee, the Credit Provider, if any, the Remarketing Agent, if any, and each Broker-Dealer, if any, on or prior to the Mode Change Date:

(A) a Favorable Opinion of Bond Counsel dated the Mode Change Date and addressed to the Commission and the Trustee,

(B) if there is to be Credit Enhancement delivered in connection with such change, the items required by Section 5.08(d) of the Fourth Supplemental Indenture in connection with the delivery of an Alternate Credit Enhancement, and

(C) notice from the Rating Agencies of the rating(s) to be assigned the 2007B Bonds on such Mode Change Date.

(iv) Determination of Interest Rate. The Fixed Rate (or rates in the case of Serial 2007B Bonds) for the 2007B Bonds to be converted to the Fixed Rate Mode shall be established by the Remarketing Agent on the Rate Determination Date applicable thereto pursuant to the provisions of Section 4.7(b) of the Fourth Supplemental Indenture. Such Rate shall remain in effect until the Maturity Date of the 2007B Bonds.

Such determination shall be conclusive and binding upon the Commission, the Trustee, the Credit Provider, if any, and the Owners of the 2007B Bonds to which such rate will be applicable. Not later than 5:00 p.m., New York City time, on the date of determination of the Fixed Rate(s), the Remarketing Agent shall notify the Trustee, the Credit Provider and the Commission of such rate(s) by telephone.

(v) Serialization and Sinking Fund; Price. Upon conversion of the 2007B Bonds to the Fixed Rate Mode, the 2007B Bonds shall be remarketed at par, shall mature on the same Maturity Date(s) and be subject to the same mandatory sinking fund redemption, if any, and optional redemption provisions as set forth in the General Indenture and the Fourth Supplemental Indenture for any prior Mode; provided, however, that if the Commission shall deliver to the Trustee a Favorable Opinion of Bond Counsel, the Commission may elect to (1) have some of the 2007B Bonds be Serial 2007B Bonds and some subject to sinking fund redemption even if such 2007B Bonds were not Serial 2007B Bonds or subject to mandatory sinking fund redemption prior to such change, (2) change the optional redemption dates and/or premiums set forth in Section 5.3(b) of the Fourth Supplemental Indenture, and/or (3) sell some or all of the 2007B Bonds at a premium or a discount to par.

(c) Failure to Satisfy Conditions Precedent to a Mode Change. In the event the conditions described above in subsections (a) or (b), as applicable, of Section 4.10 of the Fourth Supplemental Indenture have not been satisfied by the applicable Mode Change Date, then the New Mode shall not take effect and, except in the case of a failed conversion from an ARS Mode or a SIFMA Index Rate Mode, any mandatory purchase shall be made on such date if notice has been sent to the Owners stating that the 2007B Bonds would be subject to mandatory purchase on such date). If the failed change in Mode was from the SIFMA Index Rate Mode, the 2007B Bonds shall remain in the SIFMA Index Rate Mode with interest rates and Interest Periods to be established by the Calculation Agent on the failed Mode Change Date in accordance with Section 4.9A of the Fourth Supplemental Indenture and the applicable Index Rate Agreement. If the failed change in Mode was from the CP Mode, the 2007B Bonds shall remain in the CP Mode with interest rates and Interest Periods to be established by the Remarketing Agent on the failed Mode Change Date in accordance with Section 4.5 of the Fourth Supplemental Indenture. If the failed change in Mode was from the Daily Mode, the 2007B Bonds shall remain in the Daily Mode, and if the failed change in Mode was from the Weekly Mode, the 2007 Bonds shall remain in the Weekly Mode, in each case with interest

rates established in accordance with the applicable provisions of Section 4.6 of the Fourth Supplemental Indenture on and as of the failed Mode Change Date. If the failed change in Mode was from the Term Rate Mode, then the 2007B Bonds shall stay in the Term Rate Mode for an Interest Period ending on the following Interest Payment Date for the 2007B Bonds in the Term Rate Mode and the interest rate shall be established by the Remarketing Agent on the failed Mode Change Date in accordance with Section 4.7(a) of the Fourth Supplemental Indenture. If the failed change in Mode was from the ARS Mode, then the 2007B Bonds shall not be subject to mandatory tender, the Auction Agent will continue to implement the Auction Procedures on the Auction Dates with respect to the 2007B Bonds which otherwise would have been converted excluding however, the Auction Date falling on the Business Day next preceding the failed Mode Change Date, and the interest rate will continue to be the Auction Period Rate; provided, however, that the interest rate borne by the 2007B Bonds during the Auction Period commencing on such failed Mode Change Date will be the Maximum Rate, and the Auction Period will be the seven-day Auction Period. The Trustee will give written notice by first class mail postage prepaid as soon as practicable and in any event not later than the next succeeding Business Day to the Bondholders, the Commission and the Credit Provider that such conversion has not occurred, that the 2007B Bonds will not be purchased on the failed Mode Change Date, that the Auction Agent will continue to implement the Auction Procedures on the Auction Dates with respect to the 2007B Bonds which otherwise would have been converted excluding however, the Auction Date falling on the Business Day next preceding the failed Mode Change Date, and that the interest rate will continue to be the Auction Period Rate; provided, however, that the interest rate borne by the 2007B Bonds during the Auction Period commencing on such failed Mode Change Date will be the Maximum Rate, and the Auction Period will be the seven-day Auction Period.

(d) Rescission of Election. Notwithstanding anything in the Fourth Supplemental Indenture to the contrary, the Commission may rescind any election by it to change a Mode as described above prior to the Mode Change Date by giving written notice thereof to the Notice Parties prior to such Mode Change Date; provided that in the case of a conversion to an ARS Mode such rescission must occur prior to the setting of the Auction Period Rate by the Broker-Dealer. If the Tender Agent receives notice of such rescission prior to the time the Tender Agent has given notice to the holders of the 2007B Bonds, then such notice of change in Mode shall be of no force and effect. If the Tender Agent receives notice from the Commission of rescission of a Mode change after the Tender Agent has given notice thereof to the holders of the 2007B Bonds, then if the proposed Mode Change Date would have been a Mandatory Purchase Date, such date shall continue to be a Mandatory Purchase Date except if the conversion is from the ARS Mode. If the proposed change in Mode was from the CP Mode, the 2007B Bonds shall remain in the CP Mode with interest rates and Interest Periods to be established by the Remarketing Agent on the proposed Mode Change Date in accordance with Section 4.5 of the Fourth Supplemental Indenture. If the proposed change in Mode was from the Daily Mode, the 2007B Bonds shall remain in the Daily Mode, and if the proposed change in Mode was from the Weekly Mode, the 2007B Bonds shall remain in the Weekly Mode, in each case with interest rates established in accordance with the applicable provisions of Section 4.6 of the Fourth Supplemental Indenture on and as of the proposed Mode Change Date. If the proposed change in Mode was from the Term Rate Mode, then the 2007B Bonds shall stay in the Term Rate Mode for an Interest Period ending on the following Interest Payment Date for the 2007B Bonds in the Term Rate Mode and the interest rate shall be established by the Remarketing Agent on the proposed Mode Change Date in accordance with Section 4.7(a) of the Fourth Supplemental Indenture. If the Remarketing Agent is unable to determine the interest rate on the proposed Mode Change Date, the provisions of Section 4.8 of the Fourth Supplemental Indenture shall apply in effect at the beginning of each such Interest Period. If the proposed change was from the ARS Mode, then an Auction for the 2007B Bonds will be held on the Business Day immediately preceding the proposed Mode Change Date as though no notice of conversion had ever been given. If the proposed change was from the SIFMA Index Rate Mode, then the 2007B Bonds shall remain in the SIFMA Index Rate Mode with interest rates and Interest Periods to be established by the Calculation Agent on the rescinded Mode Change Date in accordance with Section 4.9A of the Fourth Supplemental Indenture and the applicable Index Rate Agreement.

#### **Optional Tenders of 2007B Bonds in the Daily Mode or the Weekly Mode (Section 5.1).**

Subject to Section 5.6 of the Fourth Supplemental Indenture, the Beneficial Owners of 2007B Bonds in a Daily Mode or a Weekly Mode may elect to have their 2007B Bonds (or portions of those 2007B Bonds in amounts equal to a 2007B Authorized Denominations) purchased on any Business Day at a price equal to the Purchase Price, upon delivery of a Tender Notice to the Tender Agent by the Tender Notice Deadline. Immediately upon receipt of a Tender Notice, the Tender Agent shall notify the Remarketing Agent and provide the Remarketing Agent with a copy of such Tender Notice.

### **Mandatory Purchase on Mandatory Purchase Date (Section 5.2).**

The 2007B Bonds shall be subject to mandatory purchase on each Mandatory Purchase Date. With respect to a Mandatory Purchase Date described in clauses (ii), (iii), (iv), (v), (viii), and (x) of the definition thereof, the Tender Agent shall give notice of such mandatory purchase by mail to the Owners of the 2007B Bonds subject to mandatory purchase no less than fifteen (15) days prior to the Mandatory Purchase Date; and with respect to a Mandatory Purchase Date described in clause (vi), (vii) and (ix) of the definition thereof, the Tender Agent shall give notice of such mandatory purchase to the Owners at least one (1) Business Day prior to the Mandatory Purchase Date. No notice shall be given of the Mandatory Purchase Date at the end of each Interest Period for Commercial Paper Rate Bonds. Any notice shall state the Mandatory Purchase Date, the Purchase Price, the numbers of the 2007B Bonds to be purchased if less than all of the 2007B Bonds owned by such Owner are to be purchased, and that interest on 2007B Bonds subject to mandatory purchase shall cease to accrue from and after the Mandatory Purchase Date (provided, however, that in the case of 2007B Bonds in a SIFMA Index Rate Mode, such Mandatory Purchase Date shall not affect the accrual of interest on any such 2007B Bonds which become Unremarketed Bonds which 2007B Bonds shall then have their interest rates governed in accordance with the provisions of the Indenture and applicable Index Rate Agreement related to such Unremarketed Bonds). The failure to mail such notice with respect to any 2007 Bond shall not affect the validity of the mandatory purchase of any other 2007 Bond with respect to which notice was so mailed. Any notice mailed will be conclusively presumed to have been given, whether or not actually received by any Owner or Beneficial Owner.

### **Remarketing of 2007B Bonds; Notices (Section 5.3).**

(a) Remarketing of 2007B Bonds. The Remarketing Agent shall use its best efforts to offer for sale 2007B Bonds described in clauses (i), (ii) and (iii) below; provided, however, the Remarketing Agent shall not remarket 2007B Bonds at less than the par amount thereof:

(i) all 2007B Bonds or portions thereof as to which notice of tender pursuant to Section 5.1 of the Fourth Supplemental Indenture has been given; and

(ii) all 2007B Bonds required to be purchased on a Mandatory Purchase Date described in clauses (i), (ii), (iii) or (iv) of the definition thereof;

(iii) any Liquidity Provider Bonds (A) purchased on a Purchase Date described in clause (i) or (ii) above, (B) with respect to which the Liquidity Provider has provided notice to the Trustee and the Remarketing Agent that it is ready to reinstate the Available Amount, (C) with respect to which an Alternate Liquidity Facility and Alternate Credit Enhancement is in effect (if such funds were secured by a Credit Enhancement prior to becoming Liquidity Provider Bonds which Credit Enhancement is no longer in effect), or (D) which are being marketed as Fixed Rate Bonds. The Remarketing Agent will not remarket 2007B Bonds to the Commission or its affiliates. In connection with the remarketing of any 2007B Bonds with respect to which notice of redemption or notice of mandatory purchase has been given, the Remarketing Agent will notify each person to which such 2007B Bonds are remarketed of such notice of redemption or notice of mandatory purchase.

(b) Notice of Remarketing; Registration Instructions; New 2007B Bonds. On each date on which a 2007B Bond is to be purchased:

(i) the Remarketing Agent shall notify the Tender Agent and the Liquidity Facility Provider by Electronic Means by 11:30 A.M. of the principal amount of tendered 2007B Bonds it has remarketed;

(ii) the Remarketing Agent shall cause the proceeds of the remarketing by such Remarketing Agent of tendered 2007B Bonds to be paid to the Tender Agent in immediately available funds not later than 12:00 P.M. on the Purchase Date for such 2007B Bonds;

(iii) the Remarketing Agent shall notify the Tender Agent by Electronic Means not later than 1:00 P.M. of such information as may be necessary to register and deliver 2007B Bonds remarketed with respect thereto;

(iv) if the 2007B Bonds are no longer in the Book-Entry System, the Tender Agent shall authenticate new 2007B Bonds for the respective purchasers thereof which shall be available for pick-up by the Remarketing Agent not later than 2:45 P.M.

(c) Draw on Liquidity Facility. On each date on which a 2007B Bond is to be purchased, the Tender Agent shall direct the Trustee (if the two are separate entities) to draw on the Liquidity Facility by 12:15 p.m. in accordance with the terms thereof so as to receive thereunder with respect to 2007B Bonds covered by the Credit Enhancement by 2:15 P.M. on such Purchase Date, an amount, in immediately available funds, equal to the Purchase Price payable on such 2007B Bonds which have not been successfully remarketed on such Purchase Date (or if no Liquidity Facility is in effect, request funds from the Commission). If the Tender Agent has not provided the Trustee the proceeds of remarketing by 12:15 p.m., such draw shall be in the full amount necessary to pay the Purchase Price of all tendered 2007B Bonds. The funds from such draw shall be deposited by the Trustee in the Liquidity Facility Account. If a Liquidity Facility is in effect, the Trustee shall also give the Commission notice by 2:15 p.m. on the Purchase Date if it does not have funds in the Remarketing Proceeds Account and the Liquidity Facility Purchase Account sufficient to pay the Purchase Price of 2007B Bonds tendered on such Purchase Date.

#### **Source of Funds for Purchase of 2007B Bonds (Section 5.4).**

By 2:45 P.M. on the date on which a 2007B Bond is to be purchased, and except as set forth in Section 5.6(b)(ii) of the Fourth Supplemental Indenture, the Tender Agent shall purchase tendered 2007B Bonds from the tendering Owners at the applicable Purchase Price by wire transfer in immediately available funds. Funds for the payment of such Purchase Price shall be derived solely from the following sources in the order of priority indicated and none of the Tender Agent, the Trustee nor the Remarketing Agent shall be obligated to provide funds from any other source:

- (a) immediately available funds on deposit in the Remarketing Proceeds Account;
- (b) immediately available funds on deposit in the Liquidity Facility Purchase Account; and
- (c) moneys of the Commission on deposit in the Commission Purchase Account.

If no Liquidity Facility is in effect, then the Commission shall be obligated to deposit amounts into the Commission Purchase Account sufficient to pay the Purchase Price to the extent that amounts on deposit in the Remarketing Proceeds Account are insufficient therefor. If a Liquidity Facility is in effect, then the Commission may, but shall be not obligated to, deposit amounts in the Commission Purchase Account sufficient to pay the Purchase Price to the extent that amounts on deposit in the Remarketing Proceeds Account and the Liquidity Facility Purchase Account are insufficient therefor.

If the Tender Agent does not receive the required funds from the provider of an applicable Letter of Credit as a result of a draw thereon or receives a notice of default, repudiation or dishonor of the Letter of Credit, the Tender Agent shall forthwith make a written demand to the Commission for payment of such funds which shall be provided to the Tender Agent not later than 2:00 p.m. on the date on which a 2007B Bond is to be purchased.

Any proceeds received from a Purchaser in connection with the conversion of 2007B Bonds to a SIFMA Index Rate Mode shall be treated as remarketing proceeds and first applied to pay the purchase price (and any accrued interest) due to tendering owners of the 2007B Bonds and then applied to the reimbursement of any Credit Facility Provider for any draws on the related Credit Facility. Any such Purchaser may be reimbursed immediately for its payment of the accrued interest related to such purchase of the 2007B Bonds. Such reimbursement may be made from the Interest Account of the Debt Service Fund.

#### **Delivery of 2007B Bonds (Section 5.5).**

On each date on which a 2007B Bond is to be purchased, such 2007B Bond shall be delivered as follows:

(a) 2007B Bonds sold by the Remarketing Agent and described in Section 5.4(a) of the Fourth Supplemental Indenture shall be delivered by the Remarketing Agent to the purchasers of such 2007B Bonds by 3:00 P.M.; and

(b) 2007B Bonds purchased by the Tender Agent with moneys described in Section 5.4(b) of the Fourth Supplemental Indenture shall be registered immediately in the name of the Liquidity Provider or its nominee (which may be DTC) on or before 3:00 P.M.; and

(c) 2007B Bonds purchased by the Commission with moneys described in Section 5.4(c) of the Fourth Supplemental Indenture shall be registered, immediately in the name of the Commission or its nominee on or before 3:00 P.M. 2007B Bonds so owned by the Commission shall continue to be Outstanding under the terms of the General Indenture and the Fourth Supplemental Indenture and be subject to all of the terms and conditions of the General Indenture and the Fourth Supplemental Indenture and shall be subject to remarketing by the Remarketing Agent.

#### **Book-Entry Tenders (Section 5.6).**

(a) Notwithstanding any other provision of Article V of the Fourth Supplemental Indenture to the contrary, all tenders for purchase during any period in which the 2007B Bonds are registered in the name of Cede & Co. (or the nominee of any successor to DTC) shall be subject to the terms and conditions set forth in the Representations Letter and to any regulations promulgated by DTC (or any successor DTC). For so long as the 2007B Bonds are registered in the name of Cede & Co., as nominee for DTC, the tender option rights of Holders of 2007B Bonds may be exercised only by DTC by giving notice of its election to tender 2007B Bonds or portions thereof at the times and in the manner described above. Beneficial Owners will not have any rights to tender 2007B Bonds directly to the Tender Agent. Procedures under which a Beneficial Owner may direct a Direct Participant or DTC, or an Indirect Participant of DTC acting through a Director Participant of DTC, to exercise a tender option right in respect of 2007B Bonds or portions thereof in an amount equal to all or a portion of such Beneficial Owner's beneficial ownership interest therein shall be governed by standing instructions and customary practices determined by such Direct Participant or Indirect Participant. For so long as the 2007B Bonds are registered in the name of Cede & Co., as nominee for DTC, delivery of 2007B Bonds required to be tendered for purchase shall be effected by the transfer on the applicable Purchase Date of a book-entry credit to the account of the Tender Agent of a beneficial interest in such 2007B Bonds.

(b) Notwithstanding anything expressed or implied in the Fourth Supplemental Indenture to the contrary, so long as the Book-Entry System for the 2007B Bonds is maintained by the Commission:

(i) there shall be no requirement of physical delivery to or by the Tender Agent, the Remarketing Agent or the Trustee of:

(A) any 2007B Bonds subject to mandatory or optional purchase as a condition to the payment of the Purchase Price therefor;

(B) any 2007B Bonds that have become Liquidity Provider Bonds; or

(C) any remarketing proceeds of such 2007B Bonds or Liquidity Provider Bonds;  
and

(ii) except as provided in (iii) below, none of the Trustee, the Tender Agent nor the Paying Agent shall have any responsibility for paying the Purchase Price of any tendered 2007B Bond or for remitting remarketing proceeds to any person; and

(iii) the Tender Agent's sole responsibilities in connection with the purchase and remarketing of a tendered 2007B Bond shall be to:

(A) draw upon the Liquidity Facility in the event the Remarketing Agent notifies the Tender Agent as provided herein that such Bond has not been remarketed on or before the



Purchase Date therefor, which draw shall be in an amount equal to the difference between such Purchase Price and any remarketing proceeds received by Remarketing Agent in connection with a partial remarketing of such 2007B Bond, and to remit the amount so drawn to or upon the order of DTC for the benefit of the tendering Beneficial Owners; and

(B) remit any proceeds derived from the remarketing of a Liquidity Provider 2007 Bond to the Liquidity Provider.

#### **No Book-Entry System (Section 5.7).**

If at any time the 2007B Bonds shall no longer be in the Book-Entry System, the following procedures shall be followed:

(a) 2007B Bonds shall be delivered (with all necessary endorsements) at or before 12:00 noon on the Purchase Date at the office of the Paying Agent in New York, New York; provided, however, that payment of the Purchase Price shall be made pursuant to this Section only if the Bond so delivered to the Paying Agent conforms in all respects to the description thereof in the notice described in this Section. Payment of the Purchase Price with respect to purchases under Section 5.7 of the Fourth Supplemental Indenture shall be made to the Owners of tendered 2007B Bonds by wire transfer in immediately available funds by the Paying Agent by 3:00 P.M. on the Purchase Date.

(b) If a 2007B Bond to be purchased is not delivered by the Owner to the Paying Agent by 12:00 noon on the date in which such 2007B Bond is to be purchased, the Paying Agent shall hold any funds received for the purchase of those 2007B Bonds in the Purchase Fund in trust and shall pay such funds to the former Owners of the 2007B Bonds upon presentation of the 2007B Bonds. Such undelivered 2007B Bonds shall cease to accrue interest as to the former Owners on such purchase date and moneys representing the Purchase Price shall be available against delivery of those 2007B Bonds at the Principal Office of the Paying Agent; provided, however, that any funds which shall be so held by the Paying Agent and which remain unclaimed by the former Owner of a 2007B Bond not presented for purchase for a period of two (2) years after delivery of such funds to the Paying Agent, shall, to the extent permitted by law, upon request in writing by the Commission and the furnishing of security or indemnity to the Paying Agent's satisfaction, be paid to the Commission free of any trust or lien and thereafter the former Owner of such 2007B Bond shall look only to the Commission and then only to the extent of the amounts so received by the Commission without any interest thereon and the Paying Agent shall have no further responsibility with respect to such moneys or payment of the purchase price of such 2007B Bonds. The Paying Agent shall authenticate a replacement 2007B Bond for any undelivered 2007B Bond which may then be remarketed by the Remarketing Agent.

(c) The Paying Agent shall hold all 2007B Bonds properly tendered to it for purchase hereunder as agent and bailee of, and in escrow for the benefit of, the respective Owners of the 2007B Bonds which shall have so tendered such 2007B Bonds until moneys representing the Purchase Price of such 2007B Bonds shall have been delivered to or for the account of or to the order of such Owners.

#### **Credit Enhancement and Liquidity Facility (Section 5.8).**

(a) While Credit Enhancement in the form of a Letter of Credit is in effect with respect to any 2007B Bonds, the Trustee shall, on the Business Day preceding each 2007B Interest Payment Date and 2007B Principal Payment Date, before 4:00 P.M. on such day, draw on the Credit Enhancement in accordance with the terms thereof so as to receive thereunder with respect to 2007B Bonds covered by the Credit Enhancement by 1:00 P.M. on said Interest Payment Date and Principal Payment Date, an amount, in immediately available funds, equal to the amount of interest and principal payable on such 2007B Bonds on such 2007B Interest Payment Date and 2007B Principal Payment Date. The proceeds of such draws shall be deposited in the Letter of Credit Account of the Debt Service Fund which is hereby created. Moneys in the Letter of Credit Account shall be held uninvested and separate and apart from all other funds and accounts.

(b) If a Liquidity Facility is in effect, on each date on which a 2007B Bond is to be purchased, the Tender Agent (if it is the beneficiary of the Liquidity Facility) or the Trustee (if it is the beneficiary of the Liquidity Facility) at the direction of the Tender Agent as provided in Section 6.3(c) of the Fourth Supplemental Indenture, by

demand given by Electronic Means before 12:30 P.M., shall draw on the Liquidity Facility in accordance with the terms thereof so as to receive thereunder by 2:30 P.M. on such date an amount, in immediately available funds, sufficient, together with the proceeds of the remarketing of 2007B Bonds on such date, to enable the Tender Agent to pay the Purchase Price in connection therewith. The proceeds of such draw shall be paid to the Tender Agent, who shall deposit said proceeds in the Liquidity Facility Purchase Account pursuant to Section 5.9(b) of the Fourth Supplemental Indenture.

(c) Notwithstanding the foregoing paragraphs of Section 5.8 of the Fourth Supplemental Indenture, if the Credit Provider and the Liquidity Provider are the same entity, the Trustee shall not draw on the Credit Enhancement with respect to any payments due or made in connection with Liquidity Provider Bonds. In no event shall the Trustee draw on the Credit Enhancement with respect to any payments made or made in connection with 2007 Bonds not covered by the Credit Enhancement or 2007B Bonds owned by the Commission.

(d) The Commission may provide an Alternate Credit Enhancement or Alternate Liquidity Facility on any Business Day not later than the fifth (5th) Business Day prior to the Expiration Date of the Credit Enhancement or Liquidity Facility then in effect. The Commission shall give the Notice Parties written notice of the proposed substitution of an Alternate Credit Enhancement or Alternate Liquidity Facility no less than two (2) Business Days prior to the date on which the Trustee is required to provide notice of the proposed substitution to the Beneficial Owners of the 2007B Bonds. The Trustee shall give notice of such Substitution Date in accordance with Section 6.2 of the Fourth Supplemental Indenture. On or before the Substitution Date there shall be delivered to the Trustee or the Tender Agent, as applicable (i) the Alternate Credit Enhancement or the Alternate Liquidity Facility in substitution for the Credit Enhancement or Liquidity Facility then in effect, (ii) a Favorable Opinion of Bond Counsel, (iii) a written Opinion of Counsel for the provider of the Alternate Credit Enhancement or Alternate Liquidity Facility, as applicable, to the effect that such Alternate Credit Enhancement or Alternate Liquidity Facility is a valid, legal and binding obligation of the provider thereof, and (iv) unless waived by such entity, written evidence satisfactory to the Credit Provider and the Liquidity Provider of the provision for purchase from the Liquidity Provider of all Liquidity Provider Bonds, at a price equal to the principal amount thereof plus accrued and unpaid interest, and payment of all amounts due to the Credit Provider and the Liquidity Provider under the Reimbursement Agreement(s) on or before the effective date of such Alternate Letter of Credit or Alternate Liquidity Facility. Upon the satisfaction of the conditions described in the preceding sentence, the Trustee shall accept such Alternate Credit Enhancement or Alternate Liquidity Facility on the close of business the Substitution Date and shall surrender the Credit Enhancement or Liquidity Facility then in effect to the provider thereof on the Substitution Date. If any condition to the substitution is not satisfied, the substitution shall not occur but the 2007B Bonds shall remain subject to mandatory purchase on the proposed Substitution Date.

(e) In the event of an extension of the Expiration Date, the Commission shall give to the Notice Parties, a written notice of the new Expiration Date at least sixteen (16) days prior to the Expiration Date in effect prior to such extension.

(f) The references to Liquidity Facility and Liquidity Provider shall be disregarded during any period during which a Liquidity Facility is not required to be in effect.

#### **Purchase Fund (Section 5.9).**

There is established under the Fourth Supplemental Indenture and there shall be maintained with the Tender Agent, as agent for the Trustee, a separate fund designated the "Purchase Fund." The Tender Agent shall further establish separate accounts within the Purchase Fund to be designated the "Liquidity Facility Purchase Account", the "Remarketing Proceeds Account" and the "Commission Purchase Account," respectively.

(a) Remarketing Proceeds Account. Upon receipt of the proceeds of a remarketing of a 2007B Bond on the date such 2007B Bond is to be purchased, the Tender Agent shall deposit such proceeds in the Remarketing Proceeds Account for application to the Purchase Price of the 2007B Bonds. Notwithstanding the foregoing, upon the receipt of the proceeds of a remarketing of Liquidity Provider Bonds, the Tender Agent shall immediately pay such proceeds to the Liquidity Provider to the extent of any amount owing to the Liquidity Provider.

(b) Liquidity Facility Purchase Account. Upon receipt from the Trustee of the immediately available funds transferred to the Tender Agent pursuant to Section 5.4(b) of the Fourth Supplemental Indenture, the Tender

Agent shall deposit such money in the Liquidity Facility Purchase Account for application to the Purchase Price of the 2007B Bonds to the extent that the moneys on deposit in the Remarketing Proceeds Account shall not be sufficient. Any amounts deposited in the Liquidity Facility Purchase Account and not needed with respect to the Purchase Price for any 2007B Bonds shall be immediately returned to the Liquidity Provider.

(c) Commission Purchase Account. Upon receipt of Funds from the Commission pursuant to Section 5.4(c) of the Fourth Supplemental Indenture, the Tender Agent shall deposit such Funds in the Commission Purchase Account for application to the Purchase Price of the 2007B Bonds. Any amounts deposited in the Commission Purchase Account and not needed with respect to the Purchase Price for any 2007B Bonds shall be immediately refunded to the Commission.

(d) No Investment of Liquidity Facility Purchase Account and Remarketing Proceeds Account. Amounts held in the Liquidity Facility Purchase Account and the Remarketing Proceeds Account by the Paying Agent shall be held uninvested and separate and apart from all other funds and accounts.

#### **Insufficient Funds for Tenders (Section 5.10).**

(a) If moneys sufficient to pay the Purchase Price of all Tendered 2007B Bonds to be purchased on any Purchase Date are not available (1) no purchase shall be consummated on such Purchase Date; (2) all Tendered 2007B Bonds shall be returned to the Holders thereof; and (3) all remarketing proceeds shall be returned to the Remarketing Agent for return to the Persons providing such moneys.

(b) All 2007B Bonds shall bear interest at the Alternate Rate plus 3% during the period of time from and including the applicable Purchase Date to (but not including) the date that all such Tendered 2007B Bonds are successfully remarketed (the "Delayed Remarketing Period"). The first Rate Determination Date for purposes of determining the Alternate Rate shall be the Purchase Date.

(c) The Commission may direct the conversion of the Tendered 2007 Bonds to a different Mode during the Delayed Remarketing Period in accordance with Section 2.10 hereof; provided that the Commission shall not be required to comply with the notice requirements described in Section 2.10.

(d) The Remarketing Agent shall continue to use its best efforts to remarket the Tendered 2007B Bonds. Once the Remarketing Agent has advised the Trustee and the Tender Agent that it has a good faith belief that it is able to remarket all of the Tendered 2007B Bonds, the Trustee will give notice by mail to the Holders of such Tendered 2007B Bonds not later than five Business Days prior to the Purchase Date, which notice will state (1) the Mode applicable to such Tendered 2007B Bonds from and after the Purchase Date; (2) that such Tendered 2007B Bonds will be subject to mandatory tender for purchase on the Purchase Date; (3) the procedures for such mandatory tender; (4) the Purchase Price of such Tendered 2007B Bonds; and (5) the consequences of a failed remarketing.

(e) During the Delayed Remarketing Period, the Trustee may, upon direction of the Commission, apply amounts on deposit in the Redemption Fund to the redemption of such Tendered 2007B Bonds, as a whole or in part on any Business Day during the Delayed Remarketing Period, at a redemption price equal to the principal amount thereof, together with interest accrued thereon to the date fixed for redemption, without premium. Notwithstanding anything in the Fourth Supplemental Indenture to the contrary, the Trustee shall give five (5) Business Days' notice of such redemption to the Holders of the 2007B Bonds to be redeemed.

(f) During the Delayed Remarketing Period, interest on such Tendered 2007B Bonds shall be paid to the Holders thereof (i) the first Business Day of each calendar month occurring during the Delayed Remarketing Period and (ii) on the last day of the Delayed Remarketing Period.

(g) Notwithstanding any contrary provision above in Section 5.10 of the Fourth Supplemental Indenture, in the circumstance where insufficient funds are available to remarket, purchase or redeem 2007B Bonds in a SIFMA Index Rate Mode on a Special Mandatory Purchase Date, (1) no purchase shall be consummated on such Special Mandatory Purchase Date, (2) all tendered 2007B Bonds shall be returned to the Holders thereof, (3) any remarketing proceeds shall be returned to the applicable parties proffering the same, and (4) such 2007B Bonds shall be treated as Unremarketed Bonds and governed in accordance with the provisions hereof and the related Index

Rate Agreement for Unremarketed Bonds. This provision, however, shall not be deemed to restrict the ability to then subsequently remarket, purchase or redeem such 2007B Bonds consistent with the provisions hereof and the related Index Rate Agreement.

**Optional Redemption of Commercial Paper Rate Bonds (Section 6.2).**

2007B Bonds in the CP Mode are not subject to optional redemption prior to their respective Purchase Dates. The 2007B Bonds in the CP Mode shall be subject to redemption at the option of the Commission in whole or in part on their respective Purchase Dates at a redemption price equal to the principal amount thereof.

**Optional Redemption of 2007B Bonds in the Daily Mode or the Weekly Mode (Section 6.3).**

2007B Bonds in the Daily Mode or the Weekly Mode are subject to optional redemption by the Commission, in whole or in part, in 2007B Authorized Denominations on any Business Day, at a redemption price equal to the principal amount thereof, plus, accrued interest, if any, to the Redemption Date.

**Optional Redemption of 2007B Bonds in the SIFMA Index Rate Mode (Section 6.3A).**

To the extent permitted by the terms of the applicable Index Rate Agreement, 2007B Bonds of a sub-series in the SIFMA Index Rate Mode are subject to optional redemption by the Commission in whole or on part, in 2007B Authorized Denominations, on any Business Day, at a redemption equal to the, principal amount thereof, plus, accrued interest, if any, to the redemption date.

**Optional Redemption of 2007B Bonds in the Term Rate Mode or the Fixed Rate Mode (Section 6.4).**

(a) 2007B Bonds in a Term Rate Mode shall be subject to redemption, in whole or in part, on their individual Mandatory Purchase Dates, at the option of the Commission at a redemption price equal to the principal amount thereof.

(b) 2007B Bonds in the Term Rate Mode or Fixed Rate Mode are subject to redemption in whole on any date or in part on any 2007B Interest Payment Date (and if in part, in such order of maturity as the Commission shall specify and within a maturity or sub-series by lot or by such other method as the Paying Agent determines to be fair and reasonable and in 2007B Authorized Denominations) commencing on the 2007B Interest Payment Date next following the tenth anniversary of the change to the Term Rate Mode or Fixed Mode at a redemption price of 100% of the principal amount of 2007B Bonds being redeemed, together with accrued interest, if any, to the redemption date. If the length of the Term Rate Period or Fixed Rate Period is less than ten years, then the 2007B Bonds shall not be subject to redemption during such Term Rate Period or Fixed Rate Period.

(c) The Commission, in connection with a change to a Long-Term Mode, may waive or otherwise alter its rights to direct the redemption of any such 2007B Bonds so changed to a Long-Term Mode at any time without premium; provided that notice describing the waiver or alteration shall be submitted to the Paying Agent, the Trustee and the Remarketing Agent, together with a Favorable Opinion of Bond Counsel, addressed to them.

(d) If a Credit Enhancement is then in effect and the 2007B Redemption Price includes any premium, the right of the Commission to direct an optional redemption is subject to the condition that the Trustee has received, prior to the date on which notice of redemption is required to be given to Owners, either Available Moneys of the Commission or written confirmation from the Credit Provider (other than a Credit Provider providing bond insurance) that it can draw under the Credit Enhancement on the proposed redemption date in an aggregate amount sufficient to cover the principal of and premium and interest due on the 2007B Redemption Date. Such Available Moneys of the Commission shall, at the direction of the Commission, be invested in Defeasance Securities approved in writing by the Credit Provider or held uninvested pending application to the optional redemption of 2007B Bonds.

(e) If no Credit Enhancement is then in effect and the 2007B Redemption Price includes any premium, the Commission shall pay such premium.

### **Optional Redemption of 2007B Bonds in the ARS Mode (Section 6.5).**

2007B Bonds in the ARS Mode shall be subject to redemption at the option of the Commission, in whole or in part (and if in part, in 2007B Authorized Denominations, provided that no 2007B Bonds of a sub-series may be redeemed in part if the principal amount of 2007B Bonds of a sub-series to be Outstanding following such partial redemption is not a 2007B Authorized Denomination), at a redemption price equal to 100% of the principal amount thereof, plus accrued interest, if any, to the 2007B Redemption Date, on the 2007B Interest Payment Date immediately following the end of an Auction Period; provided that after any optional redemption in part of a sub-series of 2007B Bonds there shall be not less than \$10,000,000 in aggregate principal amount of the sub-series of 2007B Bonds Outstanding in the ARS Mode unless otherwise consented to by the Broker-Dealers.

### **Notice of Redemption on Mandatory Purchase Date (Section 6.6).**

Notwithstanding anything in the Fourth Supplemental Indenture or in the General Indenture to the contrary, no notice of redemption is required to be given for a redemption occurring on a Mandatory Purchase Date for a 2007B Bond.

### **Mandatory Sinking Fund Redemption of 2007B Bonds in the ARS Mode (Section 6.7).**

During an ARS Mode, if a scheduled sinking fund redemption date is not a 2007B Interest Payment Date, the 2007B Bonds will be redeemed on the 2007B Interest Payment Date immediately preceding the scheduled sinking fund redemption date. 2007B Bonds in a Flexible Auction Period may be redeemed prior to the end of the Flexible Auction Period pursuant to the sinking fund redemption schedule.

### **Investment of Funds (Section 7.6)**

Moneys on deposit with respect to the 2007A Bonds in funds or accounts established pursuant to Article VII of the Fourth Supplemental Indenture shall be invested solely in Permitted Investments, to the extent permitted by applicable law.

Notwithstanding the foregoing, all funds or accounts, in which letter of credit proceeds or remarketing proceeds are deposited and maintained, shall be held in separate accounts and shall be invested in Eligible Accounts. This includes, without limitation, the Letter of Credit Account of the Debt Service Fund and the Liquidity Facility Purchase Account of the Purchase Fund.

### **Accounts and Funds Designations and Benefits (Section 7.7)**

All funds, accounts and subaccounts established under the Fourth Supplemental Indenture shall be held in the name of the Trustee or Tender Agent and all such funds, accounts and subaccounts, other than the 2007 Rebate Account, shall be for the benefit of Bondholders.

### **Each Purchaser is a Secured Owner of Bonds (Section 10B.1).**

Effective upon the conversion of the 2007B Bonds from the Weekly Mode to the SIFMA Index Rate Mode, for all purposes of the Indenture, each Purchaser is a Secured Owner of Bonds for all purposes of the Indenture.

### **Other Obligations Owed Pursuant to an Index Rate Agreement (Section 10B.2).**

Those obligations owed by the Commission to a Purchaser under an Index Rate Agreement, other than payments pursuant to the terms of the applicable sub-series of 2007B Bonds, shall also constitute "Parity Obligations" for purposes of the Indenture consistent with such definition set forth in Section 101 of the General Indenture.

**Tendered 2007B Bonds not Purchased (Section 10B.3).**

Notwithstanding anything in the Indenture to the contrary, Unremarketed Bonds shall bear interest at the rates (including the Purchaser Rate, if applicable, pursuant to the related Index Rate Agreement) and be payable at the times and by such means as provided in the applicable Index Rate Agreement.

**Amendments to Indenture (Section 10B.4).**

As and to the extent any provision of the Indenture is inconsistent with the terms of an Index Rate Agreement, the terms of said Index Rate Agreement are deemed controlling.

**Defeasance (Section 10B.5).**

Notwithstanding anything in the Indenture to the contrary, Unremarketed Bonds shall remain Outstanding and continue to be due and owing until all amounts payable to the applicable Purchaser under the applicable Index Rate Agreement and such 2007B Bonds shall have been paid in full.

**Special Mandatory Redemption (Section 10B.7).**

Unremarketed Bonds shall be subject to special mandatory redemption ("Term-Out Redemption") on the terms and as further provided in the applicable Index Rate Agreement. Notwithstanding any other provision in the Fourth Supplemental Indenture, such 2007B Bonds subject to Term-Out Redemption shall be redeemed prior to any other mandatory or optional redemption of 2007B Bonds provided in the Fourth Supplemental Indenture.

**Provisions related to Optional Redemption (Section 10B.8).**

The Commission will not optionally redeem any 2007B Bonds under Section 6.3A of the Fourth Supplemental Indenture unless any applicable conditions of the applicable Index Rate Agreement are satisfied or waived.

**Third Party Beneficiary (Section 10B.9).**

So long as an Index Rate Agreement is in effect and the Purchaser is not in default thereunder, such Purchaser shall be a third party beneficiary of the Indenture.

## **APPENDIX D**

### **FORMS OF OPINIONS OF CO-BOND COUNSEL**

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March \_\_, 2017

Delaware River Joint Toll Bridge Commission  
2492 River Road  
New Hope, Pennsylvania

**RE: \$430,250,000 DELAWARE RIVER JOINT TOLL BRIDGE COMMISSION,  
BRIDGE SYSTEM REVENUE BONDS, SERIES 2017**

Ladies and Gentlemen:

We have acted as Co-Bond Counsel to the Delaware River Joint Toll Bridge Commission ("Commission"), a body corporate and politic, created and existing under and by virtue of an agreement entitled, "Agreement Between the State of New Jersey and the Commonwealth of Pennsylvania Creating the Delaware River Joint Toll Bridge Commission as a Body Corporate and Politic and Defining Its Powers and Duties," dated December 19, 1934, as amended and supplemented (as amended and supplemented to date, the "Compact"), in connection with the issuance of its \$430,250,000 Bridge System Revenue Bonds, Series 2017 (the "2017 Bonds").

The 2017 Bonds are issued under and pursuant to: (i) the Compact; (ii) a Resolution adopted by the Commission on January 30, 2017 (the "Resolution"); and (iii) a Tenth Supplemental Trust Indenture, dated as of February 1, 2017 (the "Tenth Supplemental Trust Indenture") between the Commission and TD Bank, National Association, as successor trustee to Commerce Bank/Pennsylvania, N.A. (the "Trustee"). The Tenth Supplemental Trust Indenture supplements the Trust Indenture, dated as of January 1, 2003 between the Commission and the Trustee (the "General Indenture"), as heretofore supplemented by nine supplemental indentures (the General Indenture, as supplemented by nine supplemental indentures and as further supplemented by the Tenth Supplemental Trust Indenture, the "Indenture"). Capitalized terms used in this opinion and not otherwise defined shall have the meanings ascribed to such terms in the Indenture.

The 2017 Bonds are dated the date of delivery thereof and mature on the dates and in the amounts specified in the Tenth Supplemental Trust Indenture. The Series 2017 Bonds are subject to redemption prior to their stated maturities in the manner specified in the Tenth Supplemental Trust Indenture.

The 2017 Bonds will be initially issued in fully registered book-entry form in the form of one certificate for each principal maturity of each series of the 2017 Bonds registered in the name of and held by Cede & Co., as nominee of The Depository Trust Company, New York, New York ("DTC"), which will act as securities depository for the 2017 Bonds. DTC will be responsible for maintaining the book-entry system for recording the interests of its participants or the transfers of such interests among such participants.

The 2017 Bonds are being issued to provide funds to finance: (i) a portion of the cost of the 2017 Capital Project; (ii) a deposit into the Debt Service Reserve Fund necessary to satisfy the Debt Service Reserve Fund Requirement; (iii) a deposit to the Series 2017 Capitalized Interest Account to pay capitalized interest for the Series 2017 Bonds; and (iv) costs of issuance of the 2017 Bonds.

The Internal Revenue Code of 1986, as amended ("Code"), imposes certain requirements which must be met on a continuing basis subsequent to the issuance of the 2017 Bonds in order to assure that interest on the 2017 Bonds will be excluded from gross income for federal income tax purposes under Section 103 of the Code. The Commission has covenanted to comply with the provisions of the Code applicable to the 2017 Bonds and has covenanted not to take any action or fail to take any action that would cause the interest on the 2017 Bonds to lose the exclusion from gross income for federal income tax purposes under Section 103 of the Code. With your permission, we have assumed continuing compliance by the Commission with the above covenants in rendering our opinion with respect to the exclusion of interest on the 2017 Bonds from gross income for federal income tax purposes. Failure to comply with these covenants could cause interest on the 2017 Bonds to be includable in gross income retroactively to the date of the issuance of the 2017 Bonds regardless of when such non-compliance occurs.

In our capacity as Co-Bond Counsel and as a basis for the opinions set forth below, we have examined the proceedings relating to the authorization and issuance of the 2017 Bonds, including: (i) a copy of the Compact; (ii) a certified copy of the Resolution; (iii) original counterparts or certified copies of the executed Indenture; (iv) such matters of law as we have deemed necessary, including, *inter alia*, the Code; and (v) such other agreements, proceedings, certificates, records, approvals, resolutions and documents as to various matters with respect to the issuance of the 2017 Bonds as we have deemed necessary. We have further assumed and relied upon the genuineness, accuracy and completeness of all of the documents and other instruments which we have examined. As to questions of fact material to our opinion, we have relied upon the proceedings and other certifications of public officials executed and furnished to us without undertaking to verify the same by independent investigation.

Based upon and subject to the foregoing, we are of the opinion that:

1. The Commission is authorized under the Compact to enter into the Tenth Supplemental Trust Indenture and to issue the 2017 Bonds.
2. The Tenth Supplemental Trust Indenture has been duly authorized, executed and delivered by the Commission, and no other authorization for the Tenth Supplemental Trust Indenture is required. The Indenture constitutes a legal, valid and binding obligation of the Commission enforceable against the Commission in accordance with its terms.
3. The Indenture creates the valid pledge it purports to create of the moneys, funds and securities and other amounts held or established under the Indenture.
4. The 2017 Bonds have been duly and validly authorized and issued by the Commission, constitute valid and binding obligations of the Commission as provided in the Indenture and are entitled to the benefits of the Indenture and the Compact, and are enforceable

against the Commission in accordance with their terms and the terms of the Indenture and the Compact.

5. Under the laws of the Commonwealth, as enacted and construed on the date hereof, the 2017 Bonds are exempt from Pennsylvania personal property taxes, and the interest on the 2017 Bonds is exempt from Pennsylvania personal income tax and Pennsylvania corporate net income tax and any profits, gains or income derived from the sale or transfer of the Series 2017 Bonds shall be free from taxation in the Commonwealth.

6. Assuming continuing compliance by the Commission with the provisions of the Code applicable to the 2017 Bonds, interest on the 2017 Bonds (including interest in the form of original issue discount properly allocated to a holder thereof) is excludable from the gross income of the holders of the 2017 Bonds for purposes of federal income taxation under existing statutes, regulations, rulings and court decisions. Interest on the 2017 Bonds will not be treated as an item of tax preference for purposes of determining either individual or corporate alternative minimum tax; however, with respect to corporations (as defined for federal income tax purposes), interest on the 2017 Bonds is taken into account in determining "adjusted current earnings" for the purpose of computing the alternative minimum tax imposed on such corporations.

Purchasers of the 2017 Bonds should consult their own tax advisors as to collateral federal income tax consequences. We express no opinion regarding federal or state tax consequences arising with respect to the 2017 Bonds other than as expressly set forth in paragraphs 5 and 6 hereof.

In rendering this opinion, we have assumed compliance by the Commission with the representations and covenants of the Commission contained in the Indenture and the Tax Regulatory Certificate executed in connection with the issuance of the 2017 Bonds that are intended to comply with the provisions of the Code relating to actions to be taken by the Commission in respect of the 2017 Bonds after the issuance thereof to the extent necessary to effect or maintain the federal tax-exempt status of the interest on the 2017 Bonds. These covenants, representations and certifications relate to, inter alia, the use of proceeds of the 2017 Bonds and the rebating to the United States Treasury of specified arbitrage earnings, if required.

Our opinions set forth above as to the enforceability of the 2017 Bonds and the Tenth Supplemental Trust Indenture are subject to applicable bankruptcy, reorganization, moratorium, insolvency or other laws affecting creditors' rights or remedies generally (including, without limitation, laws relating to fraudulent conveyances or transfers) and are subject to general principles of equity (regardless of whether such enforceability is considered in a proceeding in equity or at law), and the phrase "enforceable in accordance with their terms" shall not mean that specific performance would necessarily be available as a remedy in every situation.

We call to your attention that the 2017 Bonds and the interest thereon do not create or constitute any indebtedness, liability or obligation of the Commonwealth of Pennsylvania ("Commonwealth") or of any political subdivision of the Commonwealth and do not constitute a pledge of the full faith and credit of the Commonwealth or any such political subdivision.

The opinions expressed herein are based upon the laws and judicial decisions of the Commonwealth and of the United States as of the date hereof and are subject to any amendment, repeal or other modification of the applicable laws or judicial decisions that served as the basis for our opinions, or laws or judicial decisions hereafter enacted or rendered. The opinions set forth herein are given solely as of the date hereof, and we do not undertake to update or supplement this opinion to reflect any facts or circumstances that may hereafter come to our attention or any changes in law that may hereafter occur. We express no opinion as to any matter not set forth in the numbered paragraphs above.

This is only an opinion letter and is not a warranty or guaranty of the matters discussed above.

We express no opinion herein as to the adequacy or accuracy of any official statement, private placement memorandum or other offering material pertaining to the offering of the 2017 Bonds. We call your attention to the fact that: (i) the Commission's obligation to make payments in respect of the 2017 Bonds is limited to moneys pledged therefor under the Indenture; (ii) the 2017 Bonds do not pledge the faith and credit of the Commission (except to the limited extent provided in the Indenture); and (iii) the Commission has no taxing power.

This letter is being provided solely for the benefit of the Commission and may not be relied upon by any person, party, firm or organization except the Commission and the purchasers of the 2017 Bonds without our prior written consent.

Very truly yours,

March \_\_, 2017

Delaware River Joint Toll Bridge Commission  
2492 River Road  
New Hope, Pennsylvania

**RE: \$430,250,000 DELAWARE RIVER JOINT TOLL BRIDGE COMMISSION,  
BRIDGE SYSTEM REVENUE BONDS, SERIES 2017**

Ladies and Gentlemen:

We have acted as Co-Bond Counsel to the Delaware River Joint Toll Bridge Commission ("Commission"), a body corporate and politic, created and existing under and by virtue of an agreement entitled, "Agreement Between the State of New Jersey and the Commonwealth of Pennsylvania Creating the Delaware River Joint Toll Bridge Commission as a Body Corporate and Politic and Defining Its Powers and Duties," dated December 19, 1934, as amended and supplemented (as amended and supplemented to date, the "Compact"), in connection with the issuance of its \$430,250,000 Bridge System Revenue Bonds, Series 2017 (the "2017 Bonds").

The 2017 Bonds are issued under and pursuant to: (i) the Compact; (ii) a Resolution adopted by the Commission on January 30, 2017 (the "Resolution"); and (iii) a Tenth Supplemental Trust Indenture, dated as of February 1, 2017 (the "Tenth Supplemental Trust Indenture") between the Commission and TD Bank, National Association, as successor trustee to Commerce Bank/Pennsylvania, N.A. (the "Trustee"). The Tenth Supplemental Trust Indenture supplements the Trust Indenture, dated as of January 1, 2003 between the Commission and the Trustee (the "General Indenture"), as heretofore supplemented by nine supplemental indentures (the General Indenture, as supplemented by nine supplemental indentures and as further supplemented by the Tenth Supplemental Trust Indenture, the "Indenture"). Capitalized terms used in this opinion and not otherwise defined shall have the meanings ascribed to such terms in the Indenture.

The 2017 Bonds are dated the date of delivery thereof and mature on the dates and in the amounts specified in the Tenth Supplemental Trust Indenture. The Series 2017 Bonds are subject to redemption prior to their stated maturities in the manner specified in the Tenth Supplemental Trust Indenture.

The 2017 Bonds will be initially issued in fully registered book-entry form in the form of one certificate for each principal maturity of each series of the 2017 Bonds registered in the name of and held by Cede & Co., as nominee of The Depository Trust Company, New York, New York ("DTC"), which will act as securities depository for the 2017 Bonds. DTC will be responsible for maintaining the book-entry system for recording the interests of its participants or the transfers of such interests among such participants.

The 2017 Bonds are being issued to provide funds to finance: (i) a portion of the cost of the 2017 Capital Project; (ii) a deposit into the Debt Service Reserve Fund necessary to satisfy the Debt Service Reserve Fund Requirement; (iii) a deposit to the Series 2017 Capitalized Interest Account to pay capitalized interest for the Series 2017 Bonds; and (iv) costs of issuance of the 2017 Bonds.

The Internal Revenue Code of 1986, as amended ("Code"), imposes certain requirements which must be met on a continuing basis subsequent to the issuance of the 2017 Bonds in order to assure that interest on the 2017 Bonds will be excluded from gross income for federal income tax purposes under Section 103 of the Code. The Commission has covenanted to comply with the provisions of the Code applicable to the 2017 Bonds and has covenanted not to take any action or fail to take any action that would cause the interest on the 2017 Bonds to lose the exclusion from gross income for federal income tax purposes under Section 103 of the Code. With your permission, we have assumed continuing compliance by the Commission with the above covenants in rendering our opinion with respect to the exclusion of interest on the 2017 Bonds from gross income for federal income tax purposes. Failure to comply with these covenants could cause interest on the 2017 Bonds to be includable in gross income retroactively to the date of the issuance of the 2017 Bonds regardless of when such non-compliance occurs.

In our capacity as Co-Bond Counsel and as a basis for the opinions set forth below, we have examined the proceedings relating to the authorization and issuance of the 2017 Bonds, including: (i) a copy of the Compact; (ii) a certified copy of the Resolution; (iii) original counterparts or certified copies of the executed Indenture; (iv) such matters of law as we have deemed necessary, including, *inter alia*, the Code; and (v) such other agreements, proceedings, certificates, records, approvals, resolutions and documents as to various matters with respect to the issuance of the 2017 Bonds as we have deemed necessary. We have further assumed and relied upon the genuineness, accuracy and completeness of all of the documents and other instruments which we have examined. As to questions of fact material to our opinion, we have relied upon the proceedings and other certifications of public officials executed and furnished to us without undertaking to verify the same by independent investigation.

Based upon and subject to the foregoing, we are of the opinion that:

1. The Commission is authorized under the Compact to enter into the Tenth Supplemental Trust Indenture and to issue the 2017 Bonds.
2. The Tenth Supplemental Trust Indenture has been duly authorized, executed and delivered by the Commission and no other authorization for the Tenth Supplemental Trust Indenture is required. The Indenture constitutes a legal, valid and binding obligation of the Commission enforceable against the Commission in accordance with its terms.
3. The Indenture creates the valid pledge it purports to create of the moneys, funds and securities and other amounts held or established under the Indenture.
4. The 2017 Bonds have been duly and validly authorized and issued by the Commission, constitute valid and binding obligations of the Commission as provided in the Indenture and are entitled to the benefits of the Indenture and the Compact, and are enforceable

against the Commission in accordance with their terms and the terms of the Indenture and the Compact.

5. Under existing law of the State of New Jersey (the "State"), interest on the 2017 Bonds and net gains from the sale of the 2017 Bonds are exempt from the tax imposed by the New Jersey Gross Income Tax Act.

6. Assuming continuing compliance by the Commission with the provisions of the Code applicable to the 2017 Bonds, interest on the 2017 Bonds (including interest in the form of original issue discount properly allocated to a holder thereof) is excludable from the gross income of the holders of the 2017 Bonds for purposes of federal income taxation under existing statutes, regulations, rulings and court decisions. Interest on the 2017 Bonds will not be treated as an item of tax preference for purposes of determining either individual or corporate alternative minimum tax; however, with respect to corporations (as defined for federal income tax purposes), interest on the 2017 Bonds is taken into account in determining "adjusted current earnings" for the purpose of computing the alternative minimum tax imposed on such corporations.

Purchasers of the 2017 Bonds should consult their own tax advisors as to collateral federal income tax consequences. We express no opinion regarding federal or state tax consequences arising with respect to the 2017 Bonds other than as expressly set forth in paragraphs 5 and 6 hereof.

In rendering this opinion, we have assumed compliance by the Commission with the representations and covenants of the Commission contained in the Indenture and the Tax Regulatory Certificate executed in connection with the issuance of the 2017 Bonds that are intended to comply with the provisions of the Code relating to actions to be taken by the Commission in respect of the 2017 Bonds after the issuance thereof to the extent necessary to effect or maintain the federal tax-exempt status of the interest on the 2017 Bonds. These covenants, representations and certifications relate to, inter alia, the use of proceeds of the 2017 Bonds and the rebating to the United States Treasury of specified arbitrage earnings, if required.

Our opinions set forth above as to the enforceability of the 2017 Bonds and the Tenth Supplemental Trust Indenture are subject to applicable bankruptcy, reorganization, moratorium, insolvency or other laws affecting creditors' rights or remedies generally (including, without limitation, laws relating to fraudulent conveyances or transfers) and are subject to general principles of equity (regardless of whether such enforceability is considered in a proceeding in equity or at law), and the phrase "enforceable in accordance with their terms" shall not mean that specific performance would necessarily be available as a remedy in every situation.

We call to your attention that the 2017 Bonds and the interest thereon do not create or constitute any indebtedness, liability or obligation of the State or of any political subdivision of the State and do not constitute a pledge of the full faith and credit of the State or any such political subdivision.

The opinions expressed herein are based upon the laws and judicial decisions of the State and of the United States as of the date hereof and are subject to any amendment, repeal or other

modification of the applicable laws or judicial decisions that served as the basis for our opinions, or laws or judicial decisions hereafter enacted or rendered. The opinions set forth herein are given solely as of the date hereof, and we do not undertake to update or supplement this opinion to reflect any facts or circumstances that may hereafter come to our attention or any changes in law that may hereafter occur. We express no opinion as to any matter not set forth in the numbered paragraphs above.

This is only an opinion letter and is not a warranty or guaranty of the matters discussed above.

We express no opinion herein as to the adequacy or accuracy of any official statement, private placement memorandum or other offering material pertaining to the offering of the 2017 Bonds. We call your attention to the fact that: (i) the Commission's obligation to make payments in respect of the 2017 Bonds is limited to moneys pledged therefor under the Indenture; (ii) the 2017 Bonds do not pledge the faith and credit of the Commission (except to the limited extent provided in the Indenture); and (iii) the Commission has no taxing power.

This letter is being provided solely for the benefit of the Commission and may not be relied upon by any person, party, firm or organization except the Commission and the purchasers of the 2017 Bonds without our prior written consent.

Very truly yours,



## **APPENDIX E**

### **FORM OF CONTINUING DISCLOSURE AGREEMENT**

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**CONTINUING DISCLOSURE AGREEMENT**

**BY AND BETWEEN**

**DELAWARE RIVER JOINT TOLL BRIDGE COMMISSION**

**AND**

**DIGITAL ASSURANCE CERTIFICATION, L.L.C.,  
AS DISSEMINATION AGENT**

**DATED MARCH 1, 2017**

Entered into with respect to:

\$430,250,000 Delaware River Joint Toll Bridge Commission  
Bridge System Revenue Bonds, Series 2017

## CONTINUING DISCLOSURE AGREEMENT

**THIS CONTINUING DISCLOSURE AGREEMENT** (the "*Agreement*"), made and entered into March 1, 2017, by and between the **DELAWARE RIVER JOINT TOLL BRIDGE COMMISSION**, a body corporate and politic created by compact between the State of New Jersey and the Commonwealth of Pennsylvania (the "*Commission*"), and **DIGITAL ASSURANCE CERTIFICATION, L.L.C.**, a limited liability company duly organized and validly existing under the laws of the State of Florida (the "*Dissemination Agent*").

### W I T N E S S E T H:

**WHEREAS**, on the date hereof, the Commission is issuing its Bridge System Revenue Bonds, Series 2017, dated the date hereof, in the aggregate principal amount of \$430,250,000 (the "*Bonds*"); and

**WHEREAS**, the Bonds are being issued in accordance with the "Agreement Between the State of New Jersey and the Commonwealth of Pennsylvania Creating the Delaware River Joint Toll Bridge Commission as a Body Corporate and Politic and Defining its Powers and Duties", dated December 19, 1934, executed by the Governor of the State of New Jersey and the Governor of the Commonwealth of Pennsylvania, and consented to by the Congress of the United States of America, as said Agreement has thereafter been amended and supplemented, and pursuant to a resolution adopted by the Commission on January 30, 2017 and a Trust Indenture, dated as of January 1, 2003 (the "*Original Indenture*"), between the Commission and the TD Bank, National Association (as successor to Commerce Bank, National Association), as trustee (the "*Trustee*"), as heretofore amended and supplemented, including by a Tenth Supplemental Trust Indenture, dated as of February 1, 2017 (the "*Tenth Supplement*"; and together with the Original Indenture, the "*Indenture*"); and

**WHEREAS**, the Trustee has duly accepted the trusts imposed upon it by the Indenture as Trustee for the holders from time to time of the Bonds; and

**WHEREAS**, the Securities and Exchange Commission (the "*SEC*") pursuant to the Securities Exchange Act of 1934, as amended and supplemented (codified as of the date hereof at 15 U.S.C. §77 *et seq.*), has adopted amendments effective July 3, 1995 to its Rule 15c2-12 (codified at 17 C.F.R. §240.15c2-12) ("*Rule 15c2-12*") that generally prohibit a broker, dealer or municipal securities dealer from purchasing or selling municipal securities, such as the Bonds, unless such broker, dealer or municipal securities dealer has reasonably determined that an issuer of municipal securities or an obligated person has undertaken in a written agreement or contract for the benefit of the holders of such securities to provide certain annual financial information and operating data, notices of the occurrence of certain material events and notices of the failure to make a submission required by a continuing disclosure agreement to various information repositories; and

**WHEREAS**, the Commission is an "obligated person" with respect to the Bonds within the meaning of Rule 15c2-12 and, in order to enable a "participating underwriter" within the meaning of Rule 15c2-12 to purchase the Bonds, is therefore required to cause the delivery of the information described in this Agreement in the manner and for the period of time specified in this Agreement; and

**WHEREAS**, the SEC has adopted amendments, effective July 1, 2009, to Rule 15c2-12 requiring that the annual financial information and operating data, notices of the occurrence of certain material events and notices of the failure to make a submission required by a continuing disclosure agreement be provided to the Municipal Securities Rulemaking Board (the "*MSRB*") and not to the various information repositories, and requiring that such information be provided in an electronic format and accompanied by identifying information as prescribed by the MSRB; and

**WHEREAS**, the SEC has adopted amendments, effective December 1, 2010, to Rule 15c2-12 revising the list of events notice of the occurrence of which must be provided to the MSRB and revising the time for the filing of notices of the occurrence of these events; and

**WHEREAS**, on February 14, 2017, the Commission entered into a Bond Purchase Agreement with Merrill Lynch, Pierce, Fenner & Smith Incorporated, as representative, on behalf of itself and the other underwriters named therein (collectively, the "*Underwriters*"), for the purchase of the Bonds; and

**WHEREAS**, the execution and delivery of this Agreement have been duly authorized by the Commission and the Dissemination Agent, respectively, and all conditions, acts and things necessary and required to exist, to have happened or to have been performed precedent to and in the execution and delivery of this Agreement, do exist, have happened and have been performed in regular form, time and manner; and

**WHEREAS**, the Commission and the Dissemination Agent are entering into this Agreement for the benefit of the holders of the Bonds.

**NOW, THEREFORE**, for and in consideration of the promises and of the mutual representations, covenants and agreements herein set forth, the Commission and the Dissemination Agent, each binding itself, its successors and assigns, do mutually promise, covenant and agree as follows:

## ARTICLE 1

### DEFINITIONS

Section 1.1. Terms Defined in Recitals. All capitalized terms defined in the preambles hereof shall have the meanings set forth therein for all purposes of this Agreement.

Section 1.2. Additional Definitions. The following additional terms shall have the meanings specified below:

*"Annual Filing Date"* means the date set forth in Section 2.1(a) hereof.

*"Annual Financial Information"* means the financial information or operating data listed in **Exhibit A** attached hereto, with respect to the Commission, for each fiscal year of the Commission, beginning with the fiscal year commencing January 1, 2016, and the Annual Financial Statements, if available, or unaudited financial statements.

*"Annual Financial Statements"* means annual financial statements of the Commission prepared by a firm of certified public accountants in accordance with generally accepted accounting principles, consistently applied, as in effect from time to time; *provided, however*, that the Commission reserves the right to change the basis upon which its financial statements are prepared at any time and from time to time. Should the Commission exercise this right at any time, it shall provide an explanation of any such material modification within the first Annual Financial Statements for which such change shall apply, which explanation shall include a reference to the specific federal or state law or regulation requiring or permitting such accounting change and a description of such change.

*"Bondholder"* means any person who shall be the registered owner of any Outstanding Bond, including holders of beneficial interests in the Bonds.

*"Business Day"* means any day other than (a) a Saturday or Sunday, (b) a day on which commercial banks in New York, New York, the State of New Jersey, the Commonwealth of Pennsylvania or the city or cities in which the designated corporate trust office of the Dissemination Agent is located are authorized or required by law to close, or (c) a day on which the New York Stock Exchange is closed.

*"Disclosure Event"* means any event described in Section 2.2 hereof.

*"Disclosure Event Notice"* means the notice to the MSRB as provided in Section 2.2 hereof.

*"Dissemination Agent"* means an entity acting in its capacity as Dissemination Agent under this Agreement, or any successor Dissemination Agent designated in writing by the Commission and that has filed a written acceptance of such designation.

*"EMMA"* means the MSRB's Electronic Municipal Markets Access system maintained by the MSRB, which currently serves as the sole nationally recognized municipal securities information repository under Rule 15c2-12.

"*Final Official Statement*" means the final Official Statement of the Commission, dated February 14, 2017, pertaining to the Bonds.

Section 1.3. Capitalized Terms Not Defined Herein. Capitalized terms used but not defined herein shall have the meanings assigned to them in the Indenture.

Section 1.4. Interpretation. Words of the masculine gender include correlative words of the feminine and neuter genders. Unless the context shall otherwise indicate, words importing persons include corporations, associations, partnerships (including limited partnerships), trusts, firms and other legal entities, including public bodies, as well as natural persons. Articles and Sections referred to by number mean the corresponding Articles and Sections of this Agreement. The terms "hereby", "hereof", "hereto", "herein", "hereunder" and any similar terms, as used in this Agreement, refer to this Agreement as a whole unless otherwise expressly stated.

As the context shall require, all words importing the singular number shall include the plural number. The disjunctive term "or" shall be interpreted conjunctively as required to insure that the Commission performs any obligations mentioned in the passage in which such term appears.

## **ARTICLE 2**

### **CONTINUING DISCLOSURE COVENANTS AND REPRESENTATIONS**

Section 2.1. Provision of Annual Financial Information. (a) Not later than the June 30th following the end of each fiscal year of the Commission (the "*Annual Filing Date*"), the Commission shall provide Annual Financial Information to the MSRB through EMMA.

(b) In a timely manner, the Commission shall provide notice to the MSRB in the event the Commission fails to provide Annual Financial Information on or before the Annual Filing Date.

(c) In the event that the Commission does not provide Annual Financial Statements as part of its Annual Financial Information filing by the Annual Filing Date, the Commission shall provide unaudited financial statements, and thereafter shall provide audited financial statements when and if available.

(d) Any or all of the items that must be included in the Annual Financial Information may be incorporated by reference from other documents, including official statements delivered in connection with other financings issued by or on behalf of the Commission or related public entities that are available to the public on the MSRB's Internet website or filed with the SEC. If the document incorporated by reference is a final official statement, it must be available from the MSRB through EMMA. The Commission shall clearly identify each such other document so incorporated by reference in the Annual Financial Information.

Section 2.2. Reporting of Disclosure Events. The Commission shall provide in a timely manner not in excess of ten (10) Business Days after the occurrence of the event, to the MSRB through EMMA, notice of any of the following "*Disclosure Events*" with respect to the Bonds:

- (i) principal and interest payment delinquencies;
- (ii) non-payment related defaults, if material;
- (iii) unscheduled draws on debt service reserves reflecting financial difficulties;
- (iv) unscheduled draws on credit enhancements reflecting financial difficulties;
- (v) substitution of credit or liquidity providers or their failure to perform;
- (vi) adverse tax opinions, the issuance by the Internal Revenue Service of proposed or final determinations of taxability, Notices of Proposed Issue (IRS Form 5701-TEB) or other material notices or determinations with respect to the tax status of the Bonds, or other material events affecting the tax-exempt status of the Bonds;



- (vii) modifications to the rights of Bondholders, if material;
- (viii) Bond calls, if material, and tender offers;
- (ix) defeasances;
- (x) release, substitution or sale of property securing repayment of the Bonds, if material;
- (xi) rating changes;
- (xii) bankruptcy, insolvency, receivership or similar events of the Commission, which shall be considered to occur when any of the following occur: the appointment of a receiver, fiscal agent or similar officer for the Commission in a proceeding under the U.S. Bankruptcy Code or in any other proceeding under state or federal law in which a court or governmental authority has assumed jurisdiction over substantially all of the assets or business of the Commission, or if such jurisdiction has been assumed by leaving the existing governing body and officials or officers in possession but subject to the supervision and orders of a court or governmental authority, or the entry of an order confirming a plan of reorganization, arrangement or liquidation by a court or governmental authority having supervision or jurisdiction over substantially all of the assets or business of the Commission;
- (xiii) the consummation of a merger, consolidation or acquisition involving the Commission or the sale of all or substantially all of the assets of the Commission, other than in the ordinary course of business, the entry into a definitive agreement to undertake such an action or the termination of a definitive agreement relating to any such actions, other than pursuant to its terms, if material; or
- (xiv) appointment of a successor or additional trustee or the change of name of a trustee, if material.

The foregoing Disclosure Events are quoted from Rule 15c2-12; some of such Disclosure Events may not be applicable to the Bonds.

Section 2.3. Documents to Be Provided in Electronic Format and Accompanied by Identifying Information. The Commission agrees that the Annual Financial Information, each Disclosure Event Notice and each notice pursuant to Sections 2.1 and 2.2 hereof shall be provided to the MSRB in an electronic format as prescribed by the MSRB, and that all documents provided to the MSRB shall be accompanied by identifying information as prescribed by the MSRB.

Section 2.4. Responsibilities, Duties, Immunities and Liabilities of Dissemination Agent. (a) If the Commission has determined it necessary to report the occurrence of a Disclosure Event, the Commission or the Dissemination Agent (if it has received notice from the Commission of a Disclosure Event) shall in a timely manner not in excess of ten (10) Business Days after the occurrence of the Disclosure Event, file a Disclosure Event Notice of such occurrence with the MSRB in an electronic format as prescribed by the MSRB. The obligations of the Commission or the Dissemination Agent to provide the notices to the MSRB under this Agreement are in addition to, and not in substitution of, any of the obligations of the Trustee to provide notices of events of default to Bondholders under the Indenture. The Commission or the Dissemination Agent, as applicable, shall file a copy of each Disclosure Event Notice with the Commission and the Trustee for informational purposes only.

(b) If the Annual Financial Information or Disclosure Event Notice is received by it, the Dissemination Agent shall file a written report with the Commission certifying that the Annual Financial Information or Disclosure Event Notice has been provided to the MSRB pursuant to this Agreement and stating the date it was provided to the MSRB.

Section 2.5. Appointment, Removal and Resignation of Dissemination Agent. (a) The Commission may, from time to time, appoint or engage a Dissemination Agent to assist it in carrying out its obligations under this Agreement, and may discharge any such Dissemination Agent and appoint a successor Dissemination Agent, such discharge to be effective on the date of the appointment of a successor Dissemination Agent. The Commission hereby appoints Digital Assurance Certification, L.L.C. as the initial Dissemination Agent, and Digital Assurance Certification, L.L.C. hereby accepts such appointment.

(b) The Dissemination Agent shall have only such duties as are specifically set forth in this Agreement.

(c) The Dissemination Agent may resign at any time by giving at least ninety (90) days' prior written notice thereof to the Commission. The Dissemination Agent may be removed for good cause at any time by written notice to the Dissemination Agent from the Commission; *provided*, that such removal shall not become effective until a successor dissemination agent has been appointed by the Commission under this Agreement.

Section 2.6. Responsibilities, Duties, Immunities and Liabilities of Dissemination Agent. (a) The Dissemination Agent agrees to perform such duties, but only such duties, as are specifically set forth in this Agreement, and no implied duties or obligations of any kind shall be read into this Agreement with respect to the Dissemination Agent. The Dissemination Agent's obligation to deliver the information at the times and with the contents described in this Agreement shall be limited to the extent the Commission has provided such information to the Dissemination Agent as required by this Agreement. The Dissemination Agent may conclusively rely, as to the truth, accuracy and completeness of the statements set forth therein, upon all notices, reports or other materials furnished to the Dissemination Agent pursuant to this Agreement, and in the case of notices, reports and financial statements required to be furnished to the Dissemination Agent pursuant to this Agreement, the Dissemination Agent shall have no duty whatsoever to examine or verify the same to determine whether they conform to the requirements of this Agreement. The Dissemination Agent shall have no responsibility for the

Commission's failure to report to the Dissemination Agent a Disclosure Event or a duty to determine the materiality thereof. The Dissemination Agent shall have no duty to determine or liability for failing to determine whether the Commission has complied with this Agreement.

(b) The Dissemination Agent shall not be deemed to be acting in any fiduciary capacity for the Commission, any Bondholders, the Underwriters or any other party. The Dissemination Agent shall not be liable for any error of judgment made in good faith by a responsible officer or officers of the Dissemination Agent unless it shall be proven that the Dissemination Agent engaged in negligent conduct or willful misconduct in ascertaining the pertinent facts related thereto. The Dissemination Agent shall perform its rights and duties under this Agreement using the same standard of care as a prudent person would exercise under the circumstances, and the Dissemination Agent shall not be liable for any action taken or failure to act in good faith under this Agreement unless it shall be proven that the Dissemination Agent was negligent or engaged in willful misconduct.

(c) The Dissemination Agent may perform any of its duties hereunder by or through attorneys or agents selected by it with reasonable care, it shall be entitled to the advice of counsel concerning all matters arising hereunder, and it may in all cases pay such reasonable compensation as it may deem proper to all such attorneys and agents. The Dissemination Agent shall be responsible for the acts or negligence of any such attorneys, agents or counsel.

(d) None of the provisions of this Agreement or any notice or other document delivered in connection herewith shall require the Dissemination Agent to advance, expend or risk its own funds or otherwise incur financial liability in the performance of any of the Dissemination Agent's duties or rights under this Agreement.

(e) Except as expressly provided herein, the Dissemination Agent shall not be required to monitor the compliance of the Commission with the provisions of this Agreement or to exercise any remedy, institute any suit or take any action of any kind without indemnification satisfactory to the Dissemination Agent.

### **ARTICLE 3**

#### **DEFAULTS AND REMEDIES**

Section 3.1. Disclosure Default. The occurrence and continuation of a failure by the Commission to observe, perform or comply with any covenant, condition or agreement on its part to be observed or performed in this Agreement, and such failure shall remain uncured for a period of thirty (30) days after written notice thereof has been given to the Commission by the Dissemination Agent or any Bondholder, shall constitute a disclosure default hereunder.

Section 3.2. Remedies on Default. (a) The Dissemination Agent (at the request of the Underwriters or the holders of at least twenty-five percent (25%) in aggregate principal amount of Outstanding Bonds, and after provision of indemnity in accordance with the Indenture) shall, or any Bondholder, for the equal benefit and protection of all Bondholders similarly situated, may, take whatever action at law or in equity against the Commission and any of the officers, agents and employees of the Commission that is necessary or desirable to enforce the specific performance and observance of any obligation, agreement or covenant of the Commission under this Agreement and may compel the Commission or any such officers, agents or employees, except for the Dissemination Agent, to perform and carry out their duties under this Agreement; *provided*, that no person or entity shall be entitled to recover monetary damages hereunder under any circumstances.

(b) In case the Dissemination Agent or any Bondholder shall have proceeded to enforce its rights under this Agreement and such proceedings shall have been discontinued or abandoned for any reason or shall have been determined adversely to the Dissemination Agent or any Bondholder, as the case may be, then and in every such case the Commission, the Dissemination Agent and any Bondholder, as the case may be, shall be restored respectively to their several positions and rights hereunder, and all rights, remedies and powers of the Commission, the Dissemination Agent and any Bondholder shall continue as though no such proceeding had been taken.

(c) A default under this Agreement shall not be deemed an event of default under the Indenture, and the sole remedy under this Agreement in the event of any failure by the Commission to comply with this Agreement shall be as set forth in Section 3.2(a) hereof.

## **ARTICLE 4**

### **MISCELLANEOUS**

Section 4.1. Purposes of this Agreement. This Agreement is being executed and delivered by the Commission and the Dissemination Agent for the benefit of the Bondholders and in order to assist the Underwriters in complying with clause (b)(5) of Rule 15c2-12.

Section 4.2. Third-Party Beneficiaries. Each Bondholder is hereby recognized as being a third-party beneficiary hereunder and each may enforce, for the equal benefit and protection of all Bondholders similarly situated, any such right, remedy or claim conferred, given or granted hereunder in favor of the Dissemination Agent.

Section 4.3. Additional Information. Nothing in this Agreement shall be deemed to prevent the Commission from (a) disseminating any other information, using the means of dissemination set forth in this Agreement or any other means of communication, or (b) including any other information in the Annual Financial Information or any Disclosure Event Notice, in addition to that which is required by this Agreement. If the Commission chooses to include any information in any Annual Financial Information or any Disclosure Event Notice in addition to that which is specifically required by this Agreement, the Commission shall have no obligation under this Agreement to update such information or to include it in any future Annual Financial Information or any future Disclosure Event Notice. The Commission shall reimburse the Dissemination Agent for any expenses incurred by the Dissemination Agent in providing such additional information pursuant to this Section 4.3.

Section 4.4. Notices. All notices required to be given or authorized to be given by either party pursuant to this Agreement shall be in writing and shall be sent by registered or certified mail (as well as by electronic mail, in the case of the Dissemination Agent) to:

In the case of the Commission:

Delaware River Joint Toll Bridge Commission  
2492 River Road  
New Hope, Pennsylvania 18938  
Attention: Executive Director

In the case of the Dissemination Agent:

Digital Assurance Certification, L.L.C.  
315 East Robinson Street – Suite 300  
Orlando, Florida 32801  
E-Mail: [support@dacbond.com](mailto:support@dacbond.com)

Section 4.5. Assignments. This Agreement may not be assigned by either party without the written consent of the other and, as a condition to any such assignment, only upon the assumption in writing of all of the obligations imposed upon such party by this Agreement.

Section 4.6. Severability. If any provision of this Agreement shall be held or deemed to be or shall, in fact, be illegal, inoperative or unenforceable, the same shall not affect any other provision or provisions herein contained or render the same invalid, inoperative or unenforceable to any extent whatsoever.

Section 4.7. Execution of Counterparts. This Agreement may be simultaneously executed in several counterparts, each of which shall be an original and all of which shall constitute but one and the same instrument. Both parties hereto may sign the same counterpart or each party hereto may sign a separate counterpart.

Section 4.8. Amendments, Changes and Modifications. (a) Except as otherwise provided in this Agreement, subsequent to the initial issuance of the Bonds and prior to their payment in full (or provision for payment thereof having been made in accordance with the provisions of the Indenture), this Agreement may not be effectively amended, changed, modified, altered or terminated without the written consent of a majority of the Bondholders.

(b) Without the written consent of a majority of the Bondholders, the Commission and the Dissemination Agent at any time and from time to time may enter into any amendments or modifications to this Agreement for any of the following purposes:

(i) to add to the covenants and agreements of the Commission hereunder for the benefit of the Bondholders, or to surrender any right or power conferred upon the Commission by this Agreement;

(ii) to modify the contents, presentation and format of the Annual Financial Information from time to time to conform to changes in accounting or disclosure principles or practices and legal requirements followed by or applicable to the Commission or to reflect changes in the identity, nature or status of the Commission or in the business, structure or operations of the Commission or any mergers, consolidations, acquisitions or dispositions made by or affecting the Commission; *provided*, that any such modification shall comply with the requirements of Rule 15c2-12 as then in effect at the time of such modification; or

(iii) to cure any ambiguity, to correct or supplement any provision hereof that may be inconsistent with any other provision hereof or to include any other provisions with respect to matters or questions arising under this Agreement that, in each case, comply with Rule 15c2-12 as then in effect at the time of such modification; *provided, however*, that prior to approving any such amendment or modification, the Commission determines that such amendment or modification does not adversely affect the interests of the Bondholders in any material respect.

(c) Upon entering into any amendment or modification required or permitted by this Agreement, the Commission shall provide, or cause the Dissemination Agent to provide, to the MSRB through EMMA, notice of any such amendment or modification.

(d) The Commission and the Dissemination Agent shall be entitled to rely exclusively upon an opinion of counsel nationally recognized as an expert in federal securities law acceptable to the Commission to the effect that such amendments or modifications comply with the conditions and provisions of this Section 4.8.

Section 4.9. Amendments Required by Rule 15c2-12. The Commission and the Dissemination Agent each recognize that the provisions of this Agreement are intended to enable the Underwriters to comply with Rule 15c2-12. If, as a result of a change in Rule 15c2-12 or in the interpretation thereof, a change in this Agreement shall be permitted or necessary to assure continued compliance with Rule 15c2-12 and upon delivery by the Underwriters of an opinion of counsel nationally recognized as an expert in federal securities law acceptable to the Commission to the effect that such amendment shall be permitted or necessary to assure continued compliance by the Underwriters with Rule 15c2-12 as so amended or interpreted, then the Commission and the Dissemination Agent shall amend this Agreement to comply with and be bound by any such amendment to this Agreement to the extent necessary or desirable to assure compliance with the provisions of Rule 15c2-12 and shall provide the written notice of such amendment as required by Section 4.8(c) hereof. Any amendment to this Agreement made pursuant to this Section 4.9 shall not require the written consent of a majority of the Bondholders.

Section 4.10. Governing Law. This Agreement shall be governed exclusively by and construed in accordance with the applicable laws of the State of New Jersey and the Commonwealth of Pennsylvania and the federal laws of the United States of America, as applicable.

Section 4.11. Termination of Commission's Continuing Disclosure Obligations. The continuing obligation of the Commission under Sections 2.1 and 2.2 hereof to provide the Annual Financial Information and any Disclosure Event Notice and to comply with the other requirements of this Agreement shall terminate if and when either (a) the Bonds are no longer Outstanding in accordance with the terms of the Indenture or (b) the Commission no longer remains an "obligated person" (as defined in Rule 15c2-12(f)(10)) with respect to the Bonds. This Agreement shall be in full force and effect from the date hereof and shall continue in effect so long as any Bonds are Outstanding.

Section 4.12. Binding Effect. This Agreement shall inure to the benefit of and shall be binding upon the Commission and the Dissemination Agent and their respective successors and assigns.

Section 4.13. No Personal Recourse. No personal recourse shall be had for any claim based on this Agreement against any member, officer or employee of the Commission, past, present or future, or of any successor body, as such, either directly or through the Commission or any successor body, under any constitutional provision, statute or rule of law or by enforcement of any assessment or penalty or otherwise.

Section 4.14. Headings for Convenience Only. The descriptive headings in this Agreement are inserted for convenience only and shall not control or affect the meaning or construction of any of the provisions hereof.

Section 4.15. Entire Agreement. This Agreement sets forth the entire understanding and agreement of the Commission and the Dissemination Agent with respect to the matters herein contemplated, and no modification or amendment of or supplement to this Agreement shall be valid or effective unless the same is in writing and signed by the parties hereto.

**[SIGNATURE PAGE FOLLOWS]**



**IN WITNESS WHEREOF**, the Commission and the Dissemination Agent have each caused this Agreement to be executed in their respective names by their duly authorized officers, all as of the date first above written.

**DELAWARE RIVER JOINT TOLL  
BRIDGE COMMISSION**

**By:** \_\_\_\_\_

**James M. Petrino  
Chief Financial Officer**

**DIGITAL ASSURANCE CERTIFICATION,  
L.L.C., as Dissemination Agent**

**By:** \_\_\_\_\_

**Name:  
Title:**

## **EXHIBIT A**

Annual Financial Information shall include the following financial information and operating data as set forth in the Final Official Statement:

- (i) information in the table entitled "Commission Bridges" set forth in the section entitled "THE BRIDGE SYSTEM – General";
- (ii) information set forth in the section entitled "THE BRIDGE SYSTEM – The Toll Bridges";
- (iii) information set forth in the section entitled "THE BRIDGE SYSTEM – The Toll-Supported Bridges";
- (iv) information in the table entitled "Toll Rates by Vehicle Class" set forth in the section entitled "TOLL RATES, TRAFFIC AND REVENUE – Toll Rates";
- (v) information in the table entitled "One-Way Toll Comparisons" set forth in the section entitled "TOLL RATES, TRAFFIC AND REVENUE – Toll Rates";
- (vi) information in the table entitled "Summary of Toll Traffic Volume" set forth in the section entitled "TOLL RATES, TRAFFIC AND REVENUE – Historical Traffic and Revenue";
- (vii) information in the table entitled "Summary of Toll Revenues" set forth in the section entitled "TOLL RATES, TRAFFIC AND REVENUE – Historical Traffic and Revenue";
- (viii) information in the table entitled "Historical Toll Revenue Collected" set forth in the section entitled "RESULTS OF OPERATIONS AND ADDITIONAL COMMISSION INFORMATION – Five Year Financial History";
- (ix) information in the table entitled "Historical Results of Operations" set forth in the section entitled "RESULTS OF OPERATIONS AND ADDITIONAL COMMISSION INFORMATION – Five Year Financial History";
- (x) information set forth in the section entitled "RESULTS OF OPERATIONS AND ADDITIONAL COMMISSION INFORMATION – Personnel and Labor Relations"; and
- (xi) information set forth in the section entitled "RESULTS OF OPERATIONS AND ADDITIONAL COMMISSION INFORMATION – Retirement Plan and Other Post-Employment Benefit Liabilities".

## APPENDIX F

### BOOK-ENTRY ONLY SYSTEM AND THE DEPOSITORY TRUST COMPANY

*The information in this section concerning DTC and DTC's book-entry system has been obtained from sources that the Commission believes to be reliable. Neither the Commission, the Trustee, the Paying Agent nor the Underwriters make any representation as to the completeness or the accuracy of such information or the absence of material adverse changes in such information subsequent to the date hereof.*

DTC will act as securities depository for the Series 2017 Bonds. The Series 2017 Bonds will be issued as fully-registered securities registered in the name of Cede & Co. (DTC's partnership nominee) or in such other name as may be requested by an authorized representative of DTC. One fully-registered certificate for the Series 2017 Bonds of each maturity will be issued in the principal amount equal to the aggregate principal amount of such maturity and will be deposited with DTC.

DTC, the world's largest securities depository, is a limited-purpose trust company organized under the New York Banking Law, a "banking organization" within the meaning of the New York Banking Law, a member of the Federal Reserve System, a "clearing corporation" within the meaning of the New York Uniform Commercial Code, and a "clearing agency" registered pursuant to the provisions of Section 17A of the Securities Exchange Act of 1934. DTC holds and provides asset servicing for over 3.5 million issues of U.S. and non-U.S. equity issues, corporate and municipal debt issues, and money market instruments (from over 100 countries) that DTC's participants ("Direct Participants") deposit with DTC. DTC also facilitates the post-trade settlement among Direct Participants of sales and other securities transactions in deposited securities, through electronic computerized book-entry transfers and pledges between Direct Participants' accounts. This eliminates the need for physical movement of securities certificates. Direct Participants include both U.S. and non-U.S. securities brokers and dealers, banks, trust companies, clearing corporations, and certain other organizations. DTC is a wholly-owned subsidiary of The Depository Trust & Clearing Corporation ("DTCC"). DTCC is the holding company for DTC, National Securities Clearing Corporation and Fixed Income Clearing Corporation, all of which are registered clearing agencies. DTCC is owned by the users of its regulated subsidiaries. Access to the DTC system is also available to others such as both U.S. and non-U.S. securities brokers and dealers, banks, trust companies, and clearing corporations that clear through or maintain a custodial relationship with a Direct Participant, either directly or indirectly ("Indirect Participants"). DTC has Standard & Poor's rating of AA+. The DTC Rules applicable to its Participants are on file with the Securities and Exchange Commission. More information about DTC can be found at [www.dtcc.com](http://www.dtcc.com) and [www.dtc.org](http://www.dtc.org).

Purchases of Series 2017 Bonds under the DTC system must be made by or through Direct Participants, which will receive a credit for the Series 2017 Bonds on DTC's records. The ownership interest of each actual purchaser of each Series 2017 Bond ("Beneficial Owner") is in turn to be recorded on the Direct and Indirect Participants' records. Beneficial Owners will not receive written confirmation from DTC of their purchase. Beneficial Owners are, however, expected to receive written confirmations providing details of the transaction, as well as periodic statements of their holdings, from the Direct or Indirect Participant through which the Beneficial Owners entered into the transaction. Transfers of ownership interests in the Series 2017 Bonds are to be accomplished by entries made on the books of Direct and Indirect Participants acting on behalf of the Beneficial Owners. Beneficial Owners will not receive certificates representing their ownership interests in the Series 2017 Bonds, except in the event that use of the book-entry system for the Series 2017 Bonds is discontinued.

To facilitate subsequent transfers, all Series 2017 Bonds deposited by Direct Participants with DTC are registered in the name of DTC's partnership nominee, Cede & Co., or such other name as may be requested by an authorized representative of DTC. The deposit of Series 2017 Bonds with DTC and their registration in the name of Cede & Co. or such other DTC nominee do not affect any change in beneficial ownership. DTC has no knowledge of the actual Beneficial Owners of the Series 2017 Bonds; DTC's records reflect only the identity of the Direct Participants to whose accounts such Series 2017 Bonds are credited, which may or may not be the Beneficial Owners. The Direct and Indirect Participants will remain responsible for keeping account of their holdings on behalf of their customers.

Conveyance of notices and other communications by DTC to Direct Participants, by Direct Participants to Indirect Participants, and by Direct Participants and Indirect Participants to Beneficial Owners will be governed by arrangements among them, subject to any statutory or regulatory requirements as may be in effect from time to time. Beneficial Owners of Series 2017 Bonds may wish to take certain steps to augment the transmission to them of notices of significant events with respect to the Series 2017 Bonds, such as redemptions, tenders, defaults, and proposed amendments to the security documents. For example, Beneficial Owners of Series 2017 Bonds may wish to ascertain that the nominee holding the Series 2017 Bonds for their benefit has agreed to obtain and transmit notices to Beneficial Owners. In the alternative, Beneficial Owners may wish to provide their names and addresses to the Trustee and request that copies of the notices be provided directly to them. Redemption notices shall be sent to DTC. If less than all of the Series 2017 Bonds within a maturity are being redeemed, DTC's practice is to determine by lot the amount of interest of each Direct Participant in each maturity to be redeemed.

Neither DTC nor Cede & Co. (nor such other DTC nominee) will consent or vote with respect to Series 2017 Bonds unless authorized by a Direct Participant in accordance with DTC's MMI Procedures. Under its usual procedures, DTC mails an Omnibus Proxy to the Commission as soon as possible after the record date. The Omnibus Proxy assigns Cede & Co.'s consenting or voting rights to those Direct Participants to whose accounts Series 2017 Bonds are credited on the record date (identified in a listing attached to the Omnibus Proxy).

So long as the Series 2017 Bonds are held by DTC under a book-entry system, payments of the principal of and interest on the Series 2017 Bonds will be made to Cede & Co., or such other nominee as may be requested by an authorized representative of DTC. DTC's practice is to credit Direct Participants' accounts upon DTC's receipt of funds and corresponding detail information from the Commission or the Paying Agent, on the payable date, in accordance with their respective holdings shown on DTC's records. Payments by Participants to Beneficial Owners will be governed by standing instructions and customary practices, as is the case with securities held for the accounts of customers in bearer form or registered in "street name," and will be the responsibility of such Participants and not of DTC, the Paying Agent, or the Commission, subject to any statutory or regulatory requirements as may be in effect from time to time. Payment of the principal of and interest on the Series 2017 Bonds and, if applicable, any premium payable upon the redemption thereof to Cede & Co. (or such other nominee as may be requested by an authorized representative of DTC) is the responsibility of the Commission or the Paying Agent, disbursement of such payments to Direct Participants will be the responsibility of DTC, and disbursement of such payments to the Beneficial Owners will be the responsibility of Direct and Indirect Participants.

DTC may discontinue providing its services as a securities depository for the Series 2017 Bonds at any time by giving reasonable notice to the Commission or the Paying Agent. Under such circumstances, in the event that a successor securities depository is not obtained, Series 2017 Bond certificates are required to be printed and delivered.

The Commission may decide to discontinue use of the system of book-entry-only transfers through DTC (or a successor securities depository). In that event, Series 2017 Bond certificates will be printed and delivered.

**NEITHER THE COMMISSION, THE TRUSTEE NOR THE PAYING AGENT WILL HAVE ANY RESPONSIBILITY OR OBLIGATION TO ANY DIRECT PARTICIPANT, INDIRECT PARTICIPANT OR ANY BENEFICIAL OWNER WITH RESPECT TO THE ACCURACY OF ANY RECORDS MAINTAINED BY DTC OR ANY DIRECT PARTICIPANT OR INDIRECT PARTICIPANT, THE PAYMENT BY DTC OR ANY DIRECT PARTICIPANT OR INDIRECT PARTICIPANT OF ANY AMOUNT DUE TO ANY BENEFICIAL OWNER, THE DELIVERY BY DTC OR ANY DIRECT PARTICIPANT OR INDIRECT PARTICIPANT TO ANY BENEFICIAL OWNER OF ANY NOTICE WHICH IS REQUIRED OR PERMITTED UNDER THE TERMS OF THE INDENTURE TO BE GIVEN TO OWNERS OF THE SERIES 2017 BONDS, OR ANY OTHER ACTION TAKEN BY DTC OR CEDE & CO. AS REGISTERED OWNER OF THE SERIES 2017 BONDS. THE CURRENT "RULES" APPLICABLE TO DTC ARE ON FILE WITH THE SECURITIES AND EXCHANGE COMMISSION, AND THE CURRENT "PROCEDURES" OF DTC TO BE FOLLOWED IN DEALING WITH DTC PARTICIPANTS ARE ON FILE WITH DTC.**

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# Delaware River Joint Toll Bridge Commission



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