

**NEW ISSUE – BOOK ENTRY ONLY****Ratings: S&P: “AA+”  
Moody’s: “Aa1”**

*In the opinion of Bond Counsel, interest on the 2019 Bonds (as defined hereafter) is not includable in gross income for purposes of federal income taxation under existing statutes, regulations, rulings and court decisions, subject to the condition described in “TAX MATTERS” herein and interest on the 2019 Bonds is not treated as an item of tax preference under Section 57 of the Internal Revenue Code of 1986, as amended (the “Code”) for purposes of the federal alternative minimum taxes. Under existing law, the 2019 Bonds, interest on the 2019 Bonds and their transfer shall be exempt from taxation by the State of Delaware and its political subdivisions except for estate, inheritance or gift taxes imposed by the State of Delaware. For a more complete discussion, see “TAX MATTERS” herein.*

**DELAWARE TRANSPORTATION AUTHORITY****\$137,135,000****Transportation System Senior Revenue Bonds, Series 2019****Dated: Date of Issuance****Due: July 1, as shown below**

The Transportation System Senior Revenue Bonds, Series 2019 (the “2019 Bonds” or “Bonds”) will be issued in book-entry only form. Beneficial owners of 2019 Bonds will not receive physical delivery of Bond certificates. Principal and interest payments on the 2019 Bonds are to be made to The Depository Trust Company (“DTC”) or its nominee as record owner of the 2019 Bonds. Interest will be payable July 1, 2020 and thereafter semi-annually on each January 1 and July 1.

The 2019 Bonds maturing on and after July 1, 2030 are subject to optional redemption prior to maturity, at the option of the Delaware Transportation Authority (the “Authority”), in whole or in part at any time on or after July 1, 2029, in any order of maturity selected by the Authority (and within a maturity and interest rate by lot), at a redemption price equal to 100% of the principal amount of the 2019 Bonds to be redeemed plus interest accrued and unpaid to the redemption date.

**MATURITY DATES, PRINCIPAL AMOUNTS, INTEREST RATES AND PRICES**

<b>Due (July 1)</b>	<b>Principal Amount (\$)</b>	<b>Interest Rate (%)</b>	<b>Price</b>	<b>Yield (%)</b>	<b>CUSIP (246428)</b>	<b>Due (July 1)</b>	<b>Principal Amount (\$)</b>	<b>Interest Rate (%)</b>	<b>Price</b>	<b>Yield (%)</b>	<b>CUSIP (246428)</b>
2020	1,625,000	5.000	103.186	1.030	F84	2030	7,115,000	5.000	133.749*	1.320	H25
2021	4,535,000	5.000	107.130	1.010	F92	2031	7,480,000	5.000	133.207*	1.370	H33
2022	4,770,000	5.000	111.048	1.000	G26	2032	7,860,000	5.000	132.668*	1.420	H41
2023	5,015,000	5.000	114.908	1.000	G34	2033	8,180,000	3.000	108.864*	2.000	H58
2024	5,270,000	5.000	118.627	1.020	G42	2034	8,430,000	3.000	108.122*	2.080	H66
2025	5,540,000	5.000	122.262	1.040	G59	2035	8,690,000	3.000	107.570*	2.140	H74
2026	5,825,000	5.000	125.662	1.080	G67	2036	8,950,000	3.000	107.021*	2.200	H82
2027	6,125,000	5.000	128.843	1.130	G75	2037	9,225,000	3.000	106.113*	2.300	H90
2028	6,435,000	5.000	131.769	1.190	G83	2038	9,505,000	3.000	105.752*	2.340	J23
2029	6,765,000	5.000	134.403	1.260	G91	2039	9,795,000	3.000	105.392*	2.380	J31

\* Priced to the first call date of July 1, 2029

The 2019 Bonds are limited obligations of the Authority, payable solely from and secured by a pledge and assignment of Pledged Revenue (as defined hereafter). See “SECURITY FOR THE BONDS.” The 2019 Bonds are secured on a parity with other Transportation System Senior Revenue Bonds which have been issued by the Authority and remain outstanding. The Authority may issue additional bonds which are secured on a parity with all such Senior Bonds. THE 2019 BONDS DO NOT CONSTITUTE A DEBT OF THE STATE OF DELAWARE OR OF ANY POLITICAL SUBDIVISION, AGENCY OR INSTRUMENTALITY THEREOF, OTHER THAN THE AUTHORITY, OR A PLEDGE OF THE GENERAL TAXING POWER OR THE FAITH AND CREDIT OF THE STATE OF DELAWARE OR ANY SUCH POLITICAL SUBDIVISION, AGENCY OR INSTRUMENTALITY.

*The 2019 Bonds are offered when, as and if issued and received by the Underwriters, subject to the issuance of a legal opinion as to validity by Bond Counsel, Saul Ewing Arnstein & Lehr LLP, Wilmington, Delaware, Bond Counsel to the Authority, and certain other conditions. It is anticipated that the 2019 Bonds will be available for delivery through the book-entry facilities of DTC on or about September 10, 2019.*

Dated: August 28, 2019

No dealer, salesman or any other person has been authorized by the Delaware Transportation Authority (the "Authority") or the Underwriters of the 2019 Bonds (the "Underwriters") to give any information or to make any representations, 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 the Authority or the Underwriters.

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 2019 Bonds by a person in any jurisdiction in which it is unlawful for such person to make such an offer, solicitation or sale. This Official Statement is not to be construed as a contract with the purchasers of the 2019 Bonds. Neither the delivery of this Official Statement nor the sale of any of the 2019 Bonds implies that the information herein is correct as of any time subsequent to the date hereof. The information and expressions of opinion herein are subject to change without notice, and neither the delivery of this Official Statement nor any sale made hereunder shall, under any circumstances, create the implication that there has been no change in the matters described herein since the date hereof. This Official Statement is submitted in connection with the sale of securities referred to herein and may not be reproduced or be used, as a whole or in part, for any other purpose.

The information set forth herein has been obtained from the Authority and other sources believed to be reliable. The information and expressions of opinions herein are subject to change without notice and neither delivery of the Official Statement nor any sale made hereunder shall, under any circumstances, create any implication that there has been no change in the affairs of the Authority since the date hereof. All summaries contained herein of the Indenture (as defined herein) or other documents are made subject to the provisions of such documents and do not purport to be complete statements of any or all of such provisions. All statements made herein are made as of the date of this document by the Authority except statistical information or other statements where some other date is indicated in the text.

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 CONNECTION WITH THIS OFFERING, THE UNDERWRITERS MAY OVERALLOT OR EFFECT TRANSACTIONS WHICH STABILIZE OR MAINTAIN THE MARKET PRICE OF THE 2019 BONDS AT A LEVEL ABOVE THAT WHICH MIGHT OTHERWISE PREVAIL ON THE OPEN MARKET. SUCH STABILIZING, IF COMMENCED, MAY BE DISCONTINUED AT ANY TIME. THE UNDERWRITERS MAY OFFER AND SELL THE 2019 BONDS TO CERTAIN DEALERS AND OTHERS AT PRICES LOWER THAN THE PUBLIC OFFERING PRICES STATED ON THE INSIDE COVER PAGE HEREOF AND SUCH PUBLIC OFFERING PRICES MAY BE CHANGED FROM TIME TO TIME BY THE UNDERWRITERS.

#### **FORWARD-LOOKING STATEMENTS**

Certain statements included or incorporated by reference in this Official Statement constitute forward-looking statements. Such statements are generally identifiable by the terminology used such as "plan," "expect," "estimate," "project," "budget," "forecast," "assume" and other similar words. The achievement of certain results or other expectations contained in such forward-looking statements involve known and unknown risks, uncertainties, assumptions and other factors which may cause actual results, performance or achievements described to be materially different from any future results, performance or achievements expressed or implied by such forward-looking statements. No assurance is given that actual results will meet the forecasts of the Authority in any way, regardless of the level of optimism communicated in the information. The Authority is not obligated to issue any updates or revisions to the forward-looking statements if or when its expectations, or events, conditions or circumstances on which such statements are based do or do not occur.

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**OFFICIAL STATEMENT**  
**Delaware Transportation Authority**

**\$137,135,000**  
**Transportation System Senior Revenue Bonds, Series 2019**

**INTRODUCTION**

This Official Statement (including the cover page, graphs and the appendices hereto, the “Official Statement”) sets forth information in connection with the issuance of \$137,135,000 aggregate principal amount of Transportation System Senior Revenue Bonds, Series 2019 (the “2019 Bonds”) by the Delaware Transportation Authority (the “Authority”), a body corporate and politic constituting a public instrumentality of The State of Delaware (the “State”). The 2019 Bonds, together with the Authority’s other Transportation System Senior Revenue Bonds which have been or may be issued in the future on a parity with the 2019 Bonds, and remain outstanding from time to time, are herein referred to collectively as the “Senior Bonds”. The Authority also has the power to issue Transportation System Junior Revenue Bonds (the “Junior Bonds”) and subordinated indebtedness (“Subordinate Indebtedness”). As hereinafter more fully described, the Junior Bonds would have a lien on the Pledged Revenue, subordinate to the lien of the Senior Bonds, and Subordinate Indebtedness would have a lien on the Pledged Revenue, subordinate to the lien of the Senior Bonds and the Junior Bonds. There are no Junior Bonds outstanding. In December 2015, the Authority issued its Sr. 301 Bonds (as defined herein) in an aggregate principal amount of \$212,535,000 and its TIFIA 301 Bond (as defined herein) in a principal amount up to \$211,350,000. Both the Sr. 301 Bonds and the TIFIA 301 Bond are Subordinate Indebtedness under the Agreement (as defined herein). See “TRANSPORTATION CAPITAL PROJECTS AND FINANCING PLANS – U.S. 301 Project.”

The 2019 Bonds are being issued pursuant to the Delaware Transportation Authority Act, Chapter 13, Title 2, Delaware Code, as amended, and the Transportation Trust Fund Act, Chapter 14, Title 2, Delaware Code, as amended (collectively, the “Act”) and a Trust Agreement, dated as of August 1, 1988, by and between the Authority and Wilmington Trust Company, Wilmington, Delaware (“WTC”) (WTC, not in its individual capacity but solely as trustee, the “Trustee”), as supplemented and amended (the Trust Agreement as so supplemented and amended is hereinafter referred to as the “Agreement”).

This Official Statement contains, among other topics, a description of the current Capital Transportation Program and the sources of funding therefor; the security for the 2019 Bonds; the terms of the 2019 Bonds; and the powers, responsibilities, membership and projected operations of the Authority and the Delaware Department of Transportation (referred to herein as either the “Department” or “DelDOT”).

Capitalized words and terms used in this Official Statement and not defined herein, if defined in the Agreement, shall have the same meanings herein as are ascribed to such words and terms in the Agreement. See APPENDIX A, “Definitions”. References herein to the Agreement, the Act and the Bonds do not purport to be complete. Copies of the Agreement are available upon request to the Authority.

**DELAWARE TRANSPORTATION AUTHORITY**

**General; Relation to the Department of Transportation**

The Authority is a body corporate and politic constituting an instrumentality of the State which has been established and is authorized to create an economical, efficient and unified system of air, water, vehicular, public and specialized transportation in the State. The Act, however, specifically excludes the following from the jurisdiction of the Authority: the New Castle County Airport, the Sussex County Airport, the Port of Wilmington and the Wilmington Parking Authority facilities. Actions by the Authority, including the issuance of debt, are taken by resolution of the Secretary of the Department, the Director of

Finance of the Department and the Transportation Trust Fund Administrator. The Department has overall responsibility for coordinating and developing comprehensive, multi-modal transportation planning and policy for the State. The Department is headed by the Secretary of Transportation who is appointed by the Governor, subject to confirmation by the State Senate.

### **Powers and Responsibilities of the Authority**

The Act gives the Authority broad powers in order to effectuate its statutory purposes of creating a unified transportation system for the State. It has the power to make and enforce rules and regulations; and to establish, fix and revise, and charge and collect charges, fares, fees, rates, rentals and tolls for the use of any transportation facility it operates. The Authority is empowered to create subsidiaries to perform its duties and functions. The Authority also has the power to issue bonds, with the approval of the State, and the State's Bond Issuing Officers (the Governor, the Secretary of Finance, the Secretary of State and the State Treasurer) (the "Bond Issuing Officers"), to finance improvements to the State's transportation systems. Approval by the General Assembly of the State (the "General Assembly") is not required for the Authority to issue bonds to refund any of its bonds provided that a present value debt service savings is achieved in such refunding. The Authority also has the power to pledge its revenue to secure its obligations. To assist the Authority in carrying out its responsibilities, the State has created the Transportation Trust Fund ("TTF"), which the Authority administers. See "THE TRANSPORTATION TRUST FUND".

Acting pursuant to its powers, the Authority owns the Delaware Turnpike, an 11.3 mile limited access highway, which is part of Interstate 95. The Authority also owns the Route 1 Toll Road, which consists of a 41-mile fully controlled access highway extending from a connection with the southern terminus of the new Route 1 freeway just south of Wilmington to points south of Dover on U.S. Routes 13 and 113. Commencing in January 2016, the Authority began the construction and equipping of a new U.S. 301 toll road, which consists of a new 14-mile long, access controlled toll highway with two lanes in each direction that connects existing U.S. 301 at the Maryland/Delaware State Line with SR 1, south of the Roth Bridge, over the Chesapeake and Delaware (C&D) Canal in southern New Castle County, Delaware. The U.S. 301 toll road was substantially completed in December 2018. See "SOURCES OF REVENUE FOR THE TRUST FUND - Toll Revenue," "THE TRANSPORTATION TRUST FUND," and "TRANSPORTATION CAPITAL PROJECTS AND FINANCING PLANS – U.S. 301 Project."

In addition, the Authority, through its subsidiary, the Delaware Transit Corporation, owns, operates and subsidizes numerous transportation services and facilities throughout the State, including a public bus system which operates primarily in and around Wilmington, the State's largest city; a public bus system in and around Dover, the State's capital; a public bus system which operates on a seasonal basis in Eastern Sussex County during the summer resort season; statewide specialized transportation services for the elderly and handicapped; passenger rail service between Newark and Philadelphia; freight rail and aviation and various statewide and local transit services.

### **Management of the Department and the Authority**

The following persons fill key management positions in the Department and the Authority:

JENNIFER COHAN was appointed in January 2015 to lead the Delaware Department of Transportation (DelDOT), becoming the third woman to serve in this role in the department's 100 year history. Prior to her appointment, Jennifer served as the Director of the Delaware Division of Motor Vehicles for eight years, and her state public service career has spanned more than 28 years. Her previous work includes serving as the Financial/Program Manager at the Delaware Department of Natural Resources and Environmental Control (DNREC) managing the state's Clean Water Program, and working with the Delaware State Legislature within the Office of the Controller General. Ms. Cohan has also held an array of leadership positions within DelDOT in the areas of planning, finance, and Motor Carrier Safety. Jennifer graduated summa cum laude from Wilmington University with a Bachelor of Science in Business Management and a Master of Science in Public Administration and also attended the Fels Institute of

Government at the University of Pennsylvania. She remains involved with Wilmington University as an adjunct professor teaching leadership and public policy in the master's program.

Secretary Cohan currently serves as the Vice President of the Northeast Association of State Transportation Officials (NASTO), Vice-Chair of ITS America Board of Directors, Chair of the I-95 Corridor Coalition's Executive Board, Chair of the Committee on Transportation System Operations (CTSO) and Co-Chair of Cooperative Automated Transportation (CAT). In addition, she is also a member of:

- The American Association of State Highway Transportation Officials (AASHTO) Board of Directors
- The Northeast Corridor Commission
- The National Operations Center of Excellence (NOCOe) Board of Directors and Vehicle to Infrastructure Deployment Coalition.

Beyond her professional duties, Jennifer is an active board member of the Greater Dover Boys and Girls Club and serves as Chair of the Southern Delaware American Heart Association Board of Directors. In 2016, Jennifer was honored with the Kent Distinguished Citizen Award by the Del-Mar-Va Council of the Boy Scouts of America for her commitment to public service.

LANIE THORNTON was named Director of Finance for the Department in February, 2019. Ms. Thornton joined the Department in August of 2007 and had previously served as the Assistant Director of Finance overseeing the development and implementation of both the Operating and Capital budgets for the Department with an annual budget of \$1 Billion dollars, and is the key financial liaison for the Regulatory Agencies (Federal Highway Administration and Federal Transit Administration). Ms. Thornton has 20 years of financial management experience in both the private and public sectors, working with, and advising executive leadership on accounting, finance planning, and strategy to meet the mission and objectives of the organization. She has expert knowledge of Federal DOT Apportionments and Appropriations for both the Federal Highway Administration and the Federal Transit Administration, and the full utilization of the funding to meet key department objectives. Ms. Thornton holds a Bachelor of Science degree in Accounting and a Master's in Business Administration from the Wilmington University.

SHANTE HASTINGS was named Chief Engineer and Director of Transportation Solutions for the Department as of July 1, 2019. Ms. Hastings has been with the Department since 2000 and has managed many programs involving the delivery of the Department's capital program during her career. She has a broad background in civil engineering including planning, roadway design, utility coordination, environmental compliance and project management. Ms. Hastings holds a Bachelor of Civil Engineering from the University of Delaware and is a registered Professional Engineer in the State.

BRIAN G. MOTYL, Assistant Director of Finance and Transportation Trust Fund and Policy Advisor, joined the Department in May 2006. Prior to coming to the Department, Mr. Motyl was a Fiscal Management Analyst with the Department of Natural Resources and Environmental Control where he was responsible for the financial management of the Water Pollution Control State Revolving Fund, the Wastewater Management Account and various loan/grant portfolios. He has experience working on and managing several of the Authority's issuances of senior revenue bonds, Build America Bonds, GARVEE Bonds, TIFIA Financing and Toll Revenue Bonds. Mr. Motyl holds a Bachelor of Science degree in Business/Public Management from the State University of New York, College of Technology at Utica/Rome.

JANA SIMPLER joined the Department of Transportation as the Director of the Division of Motor Vehicles in September 2018. Prior to serving as the DMV Director, Jana served as the Director of the Office of Highway Safety of the Department of Safety and Homeland Security for eight years. She joined that office in 1997, was promoted to the Deputy Director position in 2000, and served a variety of roles prior

to being named Director in 2010. As Director of DMV, Jana is responsible for the direction, management, and administration of the operations and programs of the Division of Motor Vehicles and Toll Operations in accordance with Federal and state laws, rules, and regulations. She is responsible for a staff of over 600 employees statewide and is dedicated to providing excellent customer service and implementing innovative initiatives to ensure customer's needs are met. Jana received her Master of Science in Public Administration from Wilmington University in 1997 and her Bachelor of Science in Criminal Justice from the University of Delaware in 1993.

## **Role of the State**

### *General*

The annual budgets for capital and operating expenditures of the Department (including the Authority) are subject to review and approval by the State. The Act provides that if the Authority's proposed annual operating budget is not approved by July 1 for the year the budget is submitted, the budget as submitted is deemed to have been adopted by the Authority until such time as the annual budget is approved by the State. The Act also provides that any obligations incurred by the Authority after July 1 pursuant to an annual operating budget so adopted by the Authority and prior to its approval by the State are binding, even if the annual operating budget is subsequently revised by the State.

The Act provides that, in approving the annual operating budget of the Authority, the State (1) may not approve an amount for debt service or for debt service reserve purposes which is less than the amount required to be provided pursuant to any resolution or trust indenture of the Authority pursuant to which any bonds are issued and (2) may not approve an amount for operating expenses of the Delaware Turnpike that is less than the amount incurred for the preceding fiscal year of the Authority plus an inflation factor based on the U.S. Consumer Price Index, unless the Authority requests a lesser amount. Although the State has the right to approve the Authority's annual budget, THE GENERAL ASSEMBLY DOES NOT HAVE TO APPROVE THE TOLLS AND OTHER CHARGES THE AUTHORITY IMPOSES FOR USE OF THE DELAWARE TURNPIKE, THE ROUTE 1 TOLL ROAD OR THE U.S. 301 TOLL ROAD.

Bi-annually, the Department revises a six-year Capital Transportation Program for the State's transportation system. The first year of the Capital Transportation Program is reflected in the Department's annual capital budget (which includes Delaware Transit Corporation's annual capital budget) and is submitted to the State for review and approval. This annual capital budget represents the Department's work program. The Authority cannot undertake, or commit to, capital projects in excess of the amounts specifically authorized by the State. See "TRANSPORTATION CAPITAL PROJECTS AND FINANCING PLANS - Capital Improvements Planning and Budgeting."

The issuance of Authority debt obligations is subject to (i) approval by the State's Bond Issuing Officers and (ii) one provision of the State's statutory debt limitations designed to control total indebtedness of the State and the Authority. The applicable debt limitation (the "15% Test") states that no "tax-supported debt obligation" of the State and no "Transportation Trust Fund debt obligation" of the Authority may be incurred if the aggregate maximum annual payments on all such outstanding obligations (plus certain lease obligations) will exceed 15% of the estimated aggregate General Fund revenue from all sources, plus Transportation Trust Fund revenue. Estimated revenue figures are for the fiscal year following the fiscal year in which such obligation is incurred, as determined by the most recent projections made by the Delaware Economic and Financial Advisory Council. Such estimated revenue figures are adjusted, if appropriate, by the fiscal impact of subsequently enacted legislation as certified by the Secretary of Finance. After the issuance of the 2019 Bonds, the applicable debt service under the 15% Test will be approximately 6.1% of the applicable revenue in fiscal 2021. The State and the Authority expect that the Bonds projected to be issued in the current Capital Transportation Program can be issued within the limits of the 15% Test.



### *Delaware Economic and Financial Advisory Council*

Delaware Economic and Financial Advisory Council (“DEFAC”), created in 1977, is comprised currently of 31 members appointed by the Governor. DEFAC was established by Executive Order to provide to the General Assembly General Fund revenue forecasts and Transportation Trust Fund revenue forecasts six times each fiscal year in September, December, March, April, May and June for the current fiscal year and the succeeding two fiscal years. A forecast for the current fiscal year and the succeeding four fiscal years is generated once each year, not later than October 1. A seven-year forecast is generated for the Transportation Trust Fund. General Fund and Transportation Trust Fund expenditure forecasts are generated for the current fiscal year in September, December, March, April, May and June. These forecasts are used in the State budget process to assist State compliance with the State's constitutional limits on spending and statutory debt limitations.

### *Cash Management Policy Board*

The Cash Management Policy Board was created by State law to establish policies for and the terms, conditions and other matters relating to, the investment of all money belonging to the State, including funds in the Transportation Trust Fund (except money in any State pension fund and money held for individuals under the State deferred compensation program). The Board is composed of nine members including the Secretary of Finance, the Secretary of State, the State Treasurer, the Controller General (serving ex officio), and five members from the private sector appointed by the Governor and confirmed by the State Senate.

## **THE TRANSPORTATION TRUST FUND**

### **General**

To facilitate the Authority's development of a unified transportation system in the State and to take advantage of the Authority's broad financing powers, in 1987 the Transportation Trust Fund (the “TTF”) was created by law. The TTF was created to consolidate and dedicate transportation related revenue to transportation projects and to provide a flexible mechanism to handle increasing funding requirements over time for all transportation projects in the State. The TTF is the State's financing vehicle for transportation capital expenditures. Funding for such expenditures is derived from Bond proceeds, excess TTF revenue, and cash balances.

In addition, the Trust Fund has assumed the responsibility for the operating expenses of the Authority (including the Delaware Transit Corporation), the Delaware Turnpike and the Route 1 Toll Road and all of the other divisions of the Department.

### **Initial Funding**

The TTF was initially funded in fiscal 1988 with existing cash balances of \$22.5 million, a special one-time appropriation from the General Fund of \$27.8 million plus the dedication of revenue streams (including investment earnings) then aggregating approximately \$76.2 million per year. Since establishing the TTF, the State has increased fee and tax rates for existing dedicated revenue streams and has assigned to the TTF certain additional sources of transportation related revenue, as well as certain additional transportation related expenses. As a result, revenues to the TTF have increased substantially since fiscal 1988 and totaled \$560.4 million in fiscal 2018 (of which \$485.9 million is derived from Pledged Revenue). Revenues are estimated to reach \$588.3 million in fiscal 2020 (of which \$517.4 million is anticipated from Pledged Revenue).

## Summary of Revenue Dedicated to the Trust Fund

The following table and chart summarizes the revenue which is currently dedicated to the Trust Fund and identify that revenue which is pledged to secure the Bonds:

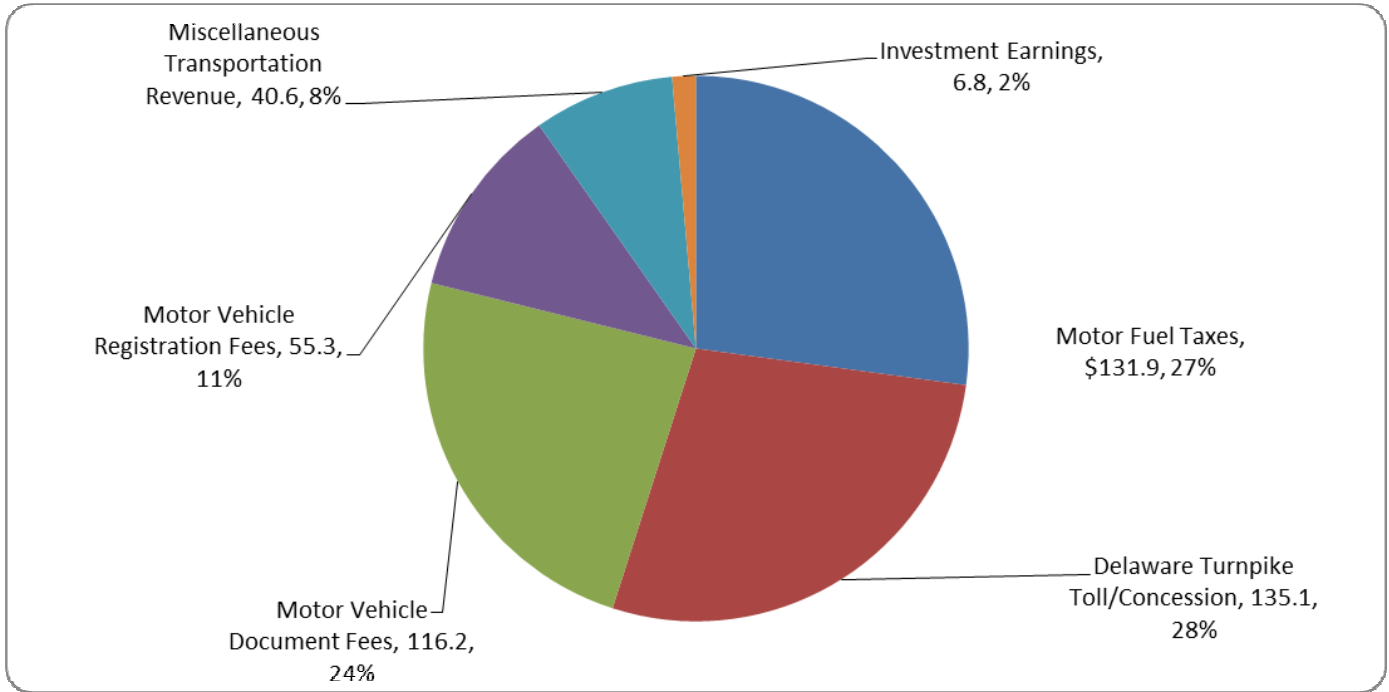
	Fiscal Year 2018 <u>(in \$ millions)</u>	Percentage of Total Fiscal 2018 <u>Pledged Revenue</u>
<u>Pledged to the Bonds:</u>		
Motor Fuel Taxes	\$131.9	27.1%
Delaware Turnpike Toll/Concession	135.1	27.8
Motor Vehicle Document Fees	116.2	23.9
Motor Vehicle Registration Fees	55.3	(1) 11.4
Miscellaneous Transportation Revenue	40.6	(2) 8.4
Investment Earnings	<u>6.8</u>	<u>1.4</u>
Total Pledged Revenue	\$485.9	100.0%
<u>Not Pledged to the Bonds:</u>		
Route 1 Toll Road Revenue	62.0	
Non-pledged Miscellaneous Revenue	<u>12.5</u>	(3)
Total Non-Pledged Revenue	74.5	
Total TTF Revenues	\$560.4	

(1) Net of refunds to other states under the International Registration Plan (\$0.24 million).

(2) Net refunds to other jurisdiction under the International Motor Fuel Tax Agreement (\$0.7 million).

(3) Traffic violation surcharge revenue, general fund transfers including motor vehicle dealer handling fee, motor vehicle dealer annual licensing fee, development plan review fees, motor vehicle use tax on vehicle lease payments, real estate lease fees, and property sales.

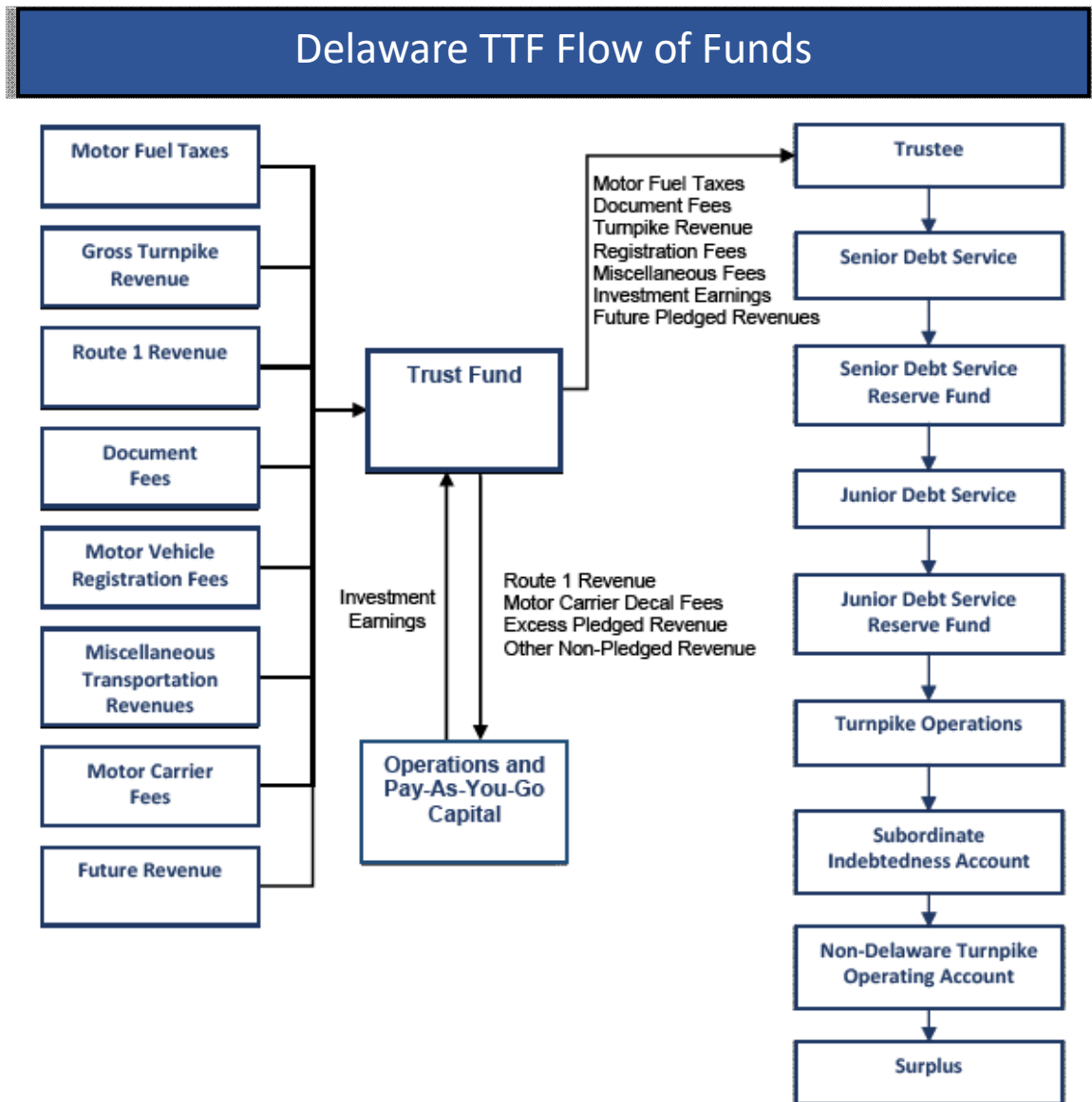
## Sources of Pledged Revenue Transportation Trust Fund - Fiscal 2018



## Uses of Funds in the Transportation Trust Fund

Funds in the TTF are applied to meet the funding requirements of the Agreement including debt service on the Bonds, operating expenses of the Authority and the Department, debt service on existing State general obligation bonds issued for transportation projects and the costs of capital projects of the Authority and the Department.

The flow of funds to the TTF and under the Agreement is summarized in the following diagram:



See “APPENDIX B – SUMMARY OF CERTAIN PROVISIONS OF THE AGREEMENT – Flow of Funds” for a discussion regarding the payment of the Sr. 301 Bonds and the TIFIA 301 Bond from the Subordinate Indebtedness Account in the event of any deficiency in certain funds and accounts under the Master Indenture (defined herein).

### Sources and Uses of Funds for Fiscal Years 2014, 2015, 2016, 2017 and 2018

The following summary of the results of the Sources and Uses of Funds are for fiscal years ended June 30, 2014, 2015, 2016, 2017 and 2018. The summary reflects the flow of funds required by the Agreement as illustrated in the Flow of Funds diagram above.

**Summary Results for the Fiscal Years Ended**  
(dollars in thousands)

<b><u>SOURCES OF FUNDS:</u></b>	<b><u>2014</u></b>	<b><u>2015</u></b>	<b><u>2016</u></b>	<b><u>2017</u></b>	<b><u>2018</u></b>
<b><u>Existing Pledged Revenue</u></b>					
I-95 Tolls & Concessions <sup>(1)</sup>	122,404	120,364	132,517	136,159	135,048
Motor Fuel Tax Admin. <sup>(2)</sup>	116,928	119,663	126,521	129,645	132,894
DMV Fees	160,333	170,978	198,131	213,473	211,135
Interest Income	<u>2,257</u>	<u>1,845</u>	<u>5,036</u>	<u>285</u>	<u>6,784</u>
<b>Total Pledged Revenue</b>	<b><u>401,922</u></b>	<b><u>412,850</u></b>	<b><u>462,205</u></b>	<b><u>479,562</u></b>	<b><u>485,861</u></b>
<b><u>Non-Pledged Revenues</u></b>					
SR 1 Tolls	47,562	55,767	59,814	61,344	61,975
Continuing General Fund Support	45,100	0	0	0	0
IRIB Settlement	5,250	0	0	0	0
ERLSP AR	0	0	-3,088	0	-6,594
DE Transit (Farebox, FTA, & Other)	19,388	19,080	24,065	26,390	26,838
Port of Wilmington - Refinancing	1,628	1,628	960	999	814
Build America Bond Subsidy	1,173	1,206	605	1,823	606
Other Miscellaneous Revenue	<u>11,577</u>	<u>9,571</u>	<u>7,026</u>	<u>10,858</u>	<u>12,470</u>
<b>Total Non-Pledged Revenue</b>	<b><u>131,678</u></b>	<b><u>87,252</u></b>	<b><u>89,382</u></b>	<b><u>101,414</u></b>	<b><u>96,109</u></b>
<b>Total Revenue</b>	<b><u>533,600</u></b>	<b><u>500,102</u></b>	<b><u>551,587</u></b>	<b><u>580,976</u></b>	<b><u>581,970</u></b>
Borrowing <sup>(3)</sup>	<u>0</u>	<u>0</u>	<u>0</u>	<u>75,000</u>	<u>0</u>
<b>TOTAL SOURCES</b>	<b><u>533,600</u></b>	<b><u>500,102</u></b>	<b><u>551,587</u></b>	<b><u>655,976</u></b>	<b><u>581,970</u></b>
<b><u>USES OF FUNDS:</u></b>					
<b><u>Debt Service</u></b>					
DTA Bonds & Notes	110,175	103,668	97,447	91,760	96,795
Refunding Savings	0	0	-1,321	0	0
State G.O. Bonds	<u>153</u>	<u>108</u>	<u>0</u>	<u>0</u>	<u>0</u>
<b>Total Debt Service</b>	<b><u>110,328</u></b>	<b><u>103,776</u></b>	<b><u>96,126</u></b>	<b><u>91,760</u></b>	<b><u>96,795</u></b>
<b><u>Operations</u></b>					
Department Operations	157,033	157,900	148,163	153,749	155,700
Delaware Transit Corp. Operations	<u>103,266</u>	<u>104,663</u>	<u>109,486</u>	<u>114,218</u>	<u>116,600</u>
<b>Total Operations</b>	<b><u>260,299</u></b>	<b><u>262,563</u></b>	<b><u>257,649</u></b>	<b><u>267,967</u></b>	<b><u>272,300</u></b>
State Capital Spending	<b><u>171,144</u></b>	<b><u>136,624</u></b>	<b><u>196,844</u></b>	<b><u>217,435</u></b>	<b><u>233,936</u></b>
<b>TOTAL USES</b>	<b><u>541,771</u></b>	<b><u>502,963</u></b>	<b><u>550,619</u></b>	<b><u>577,162</u></b>	<b><u>603,031</u></b>
Additional Senior Bonds Test	3.63	3.98	4.81	5.21	4.95

(1) Includes toll, concession and other revenue on the Delaware Turnpike.

(2) Includes motor carrier fees.

(3) Based on the assumption that July 1 payments are made on the previous June 30.

## **Constitutional Amendment**

On May 18, 2019, the Delaware House of Representatives adopted legislation which amended the Delaware Constitution by adding Section 12 to Article VIII (the “Constitutional Amendment”) which reads as follows:

### **§ 12. The Transportation Trust Fund; use and restrictions.**

(a) The State irrevocably pledges and assigns and continuously appropriates the proceeds derived from a motor vehicle registration fee, a motor vehicle document fee, a motor fuel tax, a motor carrier road use tax and registration fee, and the operation of the Delaware Turnpike to a special fund know and the Transportation Trust Fund.

(b) The moneys in the Transportation Trust Fund may be appropriated and used for the following purposes:

(1) Capital expenditures on the public transportation system, including the road system, grants and allocations for investments in transportation, the transit system and the support systems for public transportation.

(2) Payment of the interest and principal on all indebtedness incurred before or after the effective date of this Act, including the payment of all other obligations incurred pursuant to any trust agreement related to such indebtedness, and secured by moneys in the Transportation Trust Fund.

(3) Other transportation-related purposes, including operating expenses, to which moneys in the Transportation Trust Fund are authorized on the effective date of this Act.

(c) No moneys in the Transportation Trust Fund may be appropriated for a purpose not listed in subsection (b) of this section except by an act of the General Assembly adopted with the concurrence of three-fourths of all members of each House and separate from an annual budget act, bond and capital improvement act, or grants-in-aid act.

(d) If moneys in the Transportation Trust Fund cease to be appropriated for a purpose under paragraph (b)(3) of this section, the moneys may not again be appropriated for a purpose under paragraph (b)(3) of this section except by an act of the General Assembly adopted with the concurrence of three-fourths of all members of each House and separate from an annual budget act, bond and capital improvement act, or grants-in-aid act.

The Constitutional Amendment creates a “lock box” on the TTF that limits the ability of the General Assembly to appropriate TTF funds to a purpose other than those described in Section 12(b)(1)-(3) of the Constitutional Amendment except by an act of the General Assembly adopted with the concurrence of three-fourths of all members of each House and separate from an annual budget act, bond and capital improvement act, or grants-in-aid act.

## ESTIMATED SOURCES AND USES OF FUNDS

The following table summarizes the estimated sources and uses of money which the Authority estimates will be available to pay the costs of Capital Projects and to pay costs of issuance of the 2019 Bonds.

### SOURCES OF FUNDS

Principal amount of 2019 Bonds .....	\$ 137,135,000.00
Original Issue Premium.....	23,285,445.15
Total .....	<u>\$ 160,420,445.15</u>

### USES OF FUNDS

Capital Projects .....	\$ 160,000,000.00
Financing and Other Expenses	
Underwriting discount.....	123,421.50
Other financing expenses .....	<u>297,023.65</u>
Total .....	<u>\$ 160,420,445.15</u>

## DESCRIPTION OF THE 2019 BONDS

The 2019 Bonds are to be issued in the total aggregate principal amount of \$137,135,000. The 2019 Bonds are dated and bear interest from their date of delivery payable commencing July 1, 2020, and thereafter semi-annually on each January 1 and July 1 (each an “Interest Payment Date”) at the rate or rates per annum and shall mature, all as set forth on the cover page of this Official Statement.

The 2019 Bonds will be payable as to principal upon presentation and surrender thereof to the Trustee at the principal office of Wilmington Trust Company, Wilmington, Delaware. The 2019 Bonds will be issued as fully registered bonds, and when issued, will be registered in the name of and held by Cede & Co., as nominee for The Depository Trust Company (“DTC”). Purchases of beneficial interests in the 2019 Bonds will be made in book-entry form (without certificates) in the denomination of \$1,000 or any whole multiple thereof. Under certain limited circumstances described herein, the Authority may determine to forego immobilization of the 2019 Bonds at DTC, or another securities depository, in which case, such beneficial interests are expected to become exchangeable for one or more fully registered bonds of like principal, series, maturity and interest rate in the denomination of \$1,000 or any whole multiple thereof.

Principal of and premium, if any, and interest on the 2019 Bonds will be paid by the Trustee. Principal is payable upon presentation of the 2019 Bonds by the holders thereof as the 2019 Bonds become due and payable. Except as otherwise provided in the Agreement, interest on the 2019 Bonds will be payable on each Interest Payment Date by the Trustee by check mailed on the date on which interest is due to the holders of the 2019 Bonds at the close of business on the Record Date (as described below) in respect of such Interest Payment Date to the registered addresses of such holders as they appear on the registration books maintained by the Trustee. The Record Date with respect to any Interest Payment Date for the 2019 Bonds is the fifteenth (15th) day (whether or not a business day) of the calendar month immediately preceding such Interest Payment Date. Notwithstanding the foregoing, so long as DTC or its nominee, Cede & Co., is the registered owner of the 2019 Bonds, payments of the principal of and interest on the 2019 Bonds are to be made by the Trustee directly to Cede & Co. Distribution of such payments to DTC participants is the responsibility of DTC and disbursement of such payments to owners of beneficial interests in the 2019 Bonds is the responsibility of the DTC participants. See “BOOK-ENTRY ONLY SYSTEM.”

## Redemption

### *Optional Redemption*

The 2019 Bonds maturing on or after July 1, 2030 are subject to redemption, at the option of the Authority, in whole or in part at any time on or after July 1, 2029, in any order of maturity selected by the Authority (and within a maturity and interest rate by lot), at a redemption price equal to 100% of the principal amount of the 2019 Bonds to be redeemed plus interest accrued and unpaid to the redemption date.

### Notice of Redemption

The Agreement provides that at least 30 days but not more than 60 days before the redemption date of any of the 2019 Bonds, the Trustee shall mail notice of such redemption to all owners of 2019 Bonds or portions thereof to be redeemed at their addresses as they appear on the registration books held by the Trustee. Each such notice will set forth the 2019 Bonds or portions thereof to be redeemed, the date for such redemption, the redemption price to be paid, and if less than all of the 2019 Bonds within a maturity and interest rate will be called for redemption, the maturities and interest rates of such 2019 Bonds to be redeemed. So long as DTC is the registered owner of the 2019 Bonds, this notice is required to be mailed by the Trustee to DTC only. Any failure of DTC to mail such notice to any participant will not affect the validity of the redemption of the 2019 Bonds.

Any notice of redemption of the 2019 Bonds may state that it is conditioned upon there being available on the redemption date an amount of money sufficient to pay the redemption price, consisting of par and the applicable redemption premium, if any, plus interest accrued and unpaid to the redemption date (the "Redemption Price"), and any conditional notice so given may be rescinded at any time to and including the redemption date if such condition so specified is not satisfied. If a redemption does not occur after a conditional notice is given due to an insufficient amount of funds on deposit with the Trustee to pay the Redemption Price, the corresponding notice of redemption will be deemed to have been revoked.

## SECURITY FOR THE BONDS

### Pledge and Assignment of Revenue and Funds

The Bonds are limited obligations of the Authority payable solely from and secured by a pledge and assignment of motor fuel tax revenue, motor vehicle document fees, motor vehicle registration fees, certain miscellaneous transportation related fees ("Pledged Miscellaneous Transportation Revenue"), revenue of the Delaware Turnpike, certain funds held by the Trustee under the Agreement and investment earnings on all funds of the Authority, all as more fully described below (the "Pledged Revenue").

#### *Tax and Fee Revenue*

The State has pledged and assigned to the TTF, for the use of the Authority, (i) all motor fuel tax revenue imposed and collected by the State, (ii) all motor vehicle document fees imposed and collected by the State, (iii) all motor vehicle registration fees imposed and collected by the State, (iv) the Pledged Miscellaneous Transportation Revenue plus certain other miscellaneous transportation revenue and reimbursement which have not been pledged as security for the Bonds and (v) certain escheat revenues, which escheat revenues have not been pledged as security for the Bonds. Since 1999, escheat revenues have been appropriated by the General Assembly on a year-by-year basis and transferred to the TTF. Those appropriations have ranged from \$0 to \$40,000,000. No escheat transfers have been made since fiscal 2014 and no additional transfers are anticipated in the future. The Department has decided for planning purposes, it will assume that all future escheat payments will be discontinued. The Authority and the Department emphasize that the appropriation of the escheat monies to the TTF each year is subject to the discretion of the General Assembly and cannot be considered a reliable source of funds. In the Agreement the Authority



has, in turn, pledged and assigned motor fuel tax revenue, motor vehicle document fees, motor vehicle registration fees, investment earnings and the Pledged Miscellaneous Transportation Revenue to secure the Bonds. The Pledged Miscellaneous Transportation Revenue and the Non-Pledged Miscellaneous Transportation Revenue (hereinafter defined) are hereafter collectively referred to as the “Miscellaneous Transportation Revenue”.

The State has covenanted in the Act that it will not repeal or reduce the motor fuel taxes, the motor vehicle document fees, the motor vehicle registration fees or the fees constituting Pledged Miscellaneous Transportation Revenue, which are pledged to secure the Bonds, below the levels in effect on the date of issuance of the 2019 Bonds until such Bonds are paid or provision for their payment is made. The State, however, has not authorized nor does it have any obligation to increase the rates of those taxes or fees to generate revenue to meet debt service on the 2019 Bonds. The above covenant does not apply to the Non-Pledged Miscellaneous Transportation Revenue, or other non-pledged revenue.

#### *Delaware Turnpike Revenue*

All revenue received by the Authority from the operation of the Delaware Turnpike (including toll and concession revenue) is pledged by the Authority in the Agreement to secure the Bonds.

The Authority covenants in the Agreement that it will fix and revise from time to time, and charge and collect charges, fares, fees, rentals and tolls for the use of the Delaware Turnpike and that it will not reduce the tolls on the Delaware Turnpike below the level in effect on the date of issuance of the 2019 Bonds, except as provided in the Agreement. The Authority may increase tolls, reduce tolls and make certain other adjustments or reclassifications of toll rates or establish special toll rates for the Delaware Turnpike as provided in the Agreement.

#### *Bond Proceeds*

All proceeds of Bonds which are deposited in the Capital Fund under the Agreement to be applied to pay for improvements to the State's transportation system are pledged by the Authority in the Agreement to secure the Bonds.

#### *Debt Service Fund; Stabilization Fund*

Under the Agreement there is established a Debt Service Fund and within that fund there is a separate Principal and Interest Account, and Redemption Account, for the Senior Bonds and the Junior Bonds. All funds held by the Trustee in such Senior Bonds accounts are pledged to secure only the Senior Bonds, and all funds held by the Trustee in such Junior Bonds accounts are pledged to secure only the Junior Bonds, all as hereinafter more fully described. See “Flow of Funds” and APPENDIX A, “Flow of Funds” and “Events of Default and Remedies; Respective Rights of Senior and Junior Bondholders.” All funds held by the Trustee in the Debt Service Stabilization Fund (the “Stabilization Fund”) are also pledged to secure the Bonds. The Authority is required to fund the Stabilization Fund (in such amount as the Authority determines at the time of the funding of the Stabilization Fund) if it determines that Test Revenue (hereinafter defined) based on the applicable historical test for issuing additional Bonds (hereinafter described) is less than 3.5 times the maximum Principal and Interest Requirements on Senior Bonds, including any Senior Bonds proposed to be issued. In the event sufficient funds are not otherwise available in the Debt Service Fund when required to pay debt service, the Trustee is required to draw upon the Stabilization Fund to pay debt service, first on the Senior Bonds and next on the Junior Bonds. See APPENDIX A, “Flow of Funds.”

#### *Debt Service Reserve Fund*

Under the Agreement there is established a Debt Service Reserve Fund and within that fund there is a separate Debt Service Reserve Account for the Senior Bonds and the Junior Bonds. All funds held by the

Trustee in the Debt Service Reserve Fund are pledged to secure the Senior Bonds and the Junior Bonds, as the case may be, as hereinafter more fully described. If there are insufficient funds otherwise available in the Senior Bonds or Junior Bonds debt service account, or in the Stabilization Fund, as applicable, when required to pay debt service on the Bonds, the Trustee is required to draw on the applicable Debt Service Reserve Account to make up the deficiency. The Authority is required to maintain funds in the Debt Service Reserve Fund at least equal to the Senior and Junior Bonds Debt Service Reserve Account Requirements.

The Debt Service Reserve Account Requirements with respect to the Senior and Junior Bonds are one half of the maximum Principal and Interest Requirements with respect to Senior and Junior Bonds, respectively. The Senior Bonds Debt Service Reserve Account Requirement is subject to increase as described below.

Two months prior to each July 1 (as of a date during such two-month period), the Authority must prepare the certificate required to be prepared in connection with the issuance of additional Bonds. In the event that the certificate shows that Test Revenues do not cover maximum Principal and Interest Requirements of the Senior Bonds Outstanding by 2.00 times, then the Authority will file the certificate with the Trustee and (i) the Senior Bonds Debt Service Reserve Account Requirement shall become an amount equal to the maximum Principal and Interest Requirements on Senior Bonds Outstanding and (ii) the Authority shall commence to make deposits to the Senior Bonds Debt Service Reserve Account on at least an equal monthly basis to fund fully the Senior Bonds Debt Service Reserve Account Requirement on or by the second anniversary of the date of calculation. On any subsequent July 1, if such coverage exceeds 2.25 times, the Senior Bonds Debt Service Reserve Account Requirement may be reduced to an amount equal to one-half maximum Principal and Interest Requirements on Senior Bonds Outstanding, subject to increase as provided above.

Two months prior to each October 1 (as of a date during such two-month period) unless the Authority has filed with the Trustee the certificate described above during the two-month period prior to the next preceding July 1, the Authority shall prepare such certificate. In the event that the certificate shows that Test Revenues do not cover maximum Principal and Interest Requirements of the Senior Bonds Outstanding by 2.00 times, then the Authority will file the certificate with the Trustee and (i) the Senior Bonds Debt Service Reserve Account Requirement shall become an amount equal to the maximum Principal and Interest Requirements on Senior Bonds Outstanding and (ii) the Authority shall commence to make deposits to the Senior Bonds Debt Service Reserve Account on at least an equal monthly basis to fund fully the Senior Bonds Debt Service Reserve Account Requirement on or by the second anniversary of the date of calculation. On any subsequent July 1, if such coverage exceeds 2.25 times, the Senior Bonds Debt Service Reserve Account Requirement may be reduced to an amount equal to one-half maximum Principal and Interest Requirements on Senior Bonds Outstanding, subject to increase as provided above. The foregoing certificate shall also be filed by the Authority with the Trustee at the time of issuance of additional Bonds.

The Debt Service Reserve Account Requirements may be satisfied by the acquisition of a Credit Facility as provided in the Agreement. See APPENDIX A, "Additional Bonds; Debt Service Reserve Fund".

#### *Investment Earnings*

All investment earnings on the Revenue Fund, the Capital Fund, the Debt Service Fund, the Stabilization Fund and the Debt Service Reserve Fund, net of any amounts required to be paid to the Internal Revenue Service in order to preserve the tax-exempt status of the 2019 Bonds, are to be retained in or deposited by the Trustee in the Revenue Fund and are pledged by the Authority in the Agreement to secure the 2019 Bonds. The Authority is also required to cause the investment earnings on all of its other funds not held by the Trustee, including particularly the TTF, to be paid to the Trustee for deposit in the Revenue Fund at least once a year (the "TTF Investment Earnings"). These investment earnings are also pledged by the Authority in the Agreement to secure the Bonds; however, such earnings shall not be treated as Additional Revenue for purposes of satisfying the coverage test which must be met as a condition of issuing

additional bonds under the Agreement (See “SECURITY FOR THE BONDS - Additional Senior Bonds” and “SECURITY FOR THE BONDS - Additional Junior Bonds”).

### **Non-Pledged Revenue**

The Authority has not pledged to secure the Bonds (i) the toll revenue from the Route 1 Toll Road (the “Route 1 Toll Revenue”), (ii) the federal subsidy payments the Authority receives from bonds issued as “Build America Bonds,” and (iii) certain other miscellaneous transportation revenue and reimbursements which includes various amounts which may not be transferred in future fiscal years. Since 1999, escheat revenues have been appropriated by the General Assembly on a year-by-year basis and transferred to the TTF. Those appropriations have ranged from \$0 to \$40,000,000. No escheat transfers have been made since fiscal 2014 and no additional transfers are anticipated in the future. The Department has decided for planning purposes that it will assume that all future escheat payments will be discontinued. In fiscal 2016, fiscal 2017, fiscal 2018 and fiscal 2019, the General Assembly transferred \$5,000,000 in each fiscal year to the TTF based on a task force recommendation to gradually revert Department operations to the State’s General Fund. Any future transfer from the General Fund for purposes of supporting Department operations will be reviewed annually, and as such, the Department again emphasizes that future appropriations to the TTF are subject to the discretion of the General Assembly and cannot be considered a reliable source of funds. The revenue described in clause (ii) and (iii) above, together with any escheat revenues or General Fund support for Department operations, are hereinafter sometimes referred to as “Non-Pledged Miscellaneous Transportation Revenues”. Certain components of the Non-Pledged Miscellaneous Transportation Revenue are not projected to be recurring in future fiscal years. See “SOURCES OF REVENUE FOR THE TRUST FUND -- Miscellaneous Transportation Revenue - Non-Pledged Miscellaneous Transportation Revenues” for a discussion of revenue sources transferred to the TTF but which have not been pledged by the Authority to secure the Bonds.

### **Flow of Funds**

The State is required to transfer all motor fuel tax revenue, motor vehicle document fees, motor vehicle registration fees and Miscellaneous Transportation Revenue to the TTF from where such revenue is required to be immediately transferred to the Trustee for deposit in the Revenue Fund to the extent that such revenues constitute “Revenues and Receipts of the Authority”. The Agreement requires the Authority to collect tolls and other charges, fares, fees, and concessions for use of the Delaware Turnpike and its facilities and to deposit this revenue, upon receipt, in the Revenue Fund. On or before the fifteenth day of each month, the Trustee is required under the Agreement to withdraw all funds from the Revenue Fund on deposit on the tenth day of that month and to deposit these funds in the following order of priority:

- (i) to fund debt service and debt service reserve requirements with respect to all Senior Bonds;
- (ii) to fund debt service and debt service reserve requirements with respect to all Junior Bonds;
- (iii) to pay Operating Expenses of the Delaware Turnpike;
- (iv) to make up any deficiency in the Operating Reserve Fund;
- (v) to make up any deficiency in the Stabilization Fund;
- (vi) to pay debt service requirements with respect to all Subordinate Indebtedness;
- (vii) to pay Non-Delaware Turnpike Operating Expenses; and

- (viii) the remainder to be transferred to the TTF, free of the lien of the Agreement, subject to an obligation to transfer investment income on the TTF, if any, to the Revenue Fund.

See APPENDIX A, “Flow of Funds” and the flow of funds diagram under “THE TRANSPORTATION TRUST FUND -- Uses of Funds in the Transportation Trust Fund”.

### **Senior Lien for Senior Bonds**

The lien of the Junior Bonds against the Pledged Revenue, with certain limited exceptions, is subordinate to the lien of the Senior Bonds. If there is an event of default resulting from a failure in payment of debt service on the Senior Bonds or from an insolvency of the Authority or if there is an event of default which the Trustee attempts to remedy by acceleration, no payment of debt service may be made on the Junior Bonds except from certain Junior Bonds Priority Funds -- funds already on deposit in the Junior Bonds Principal and Interest Account, the Junior Bonds Redemption Account (but not any funds held for optional redemption) or the Junior Bonds Debt Service Reserve Account -- until the default with respect to the Senior Bonds is cured.

### **Credit of the State Not Pledged; Certain Covenants of the State**

**THE BONDS ARE LIMITED OBLIGATIONS OF THE AUTHORITY SECURED ONLY BY THE PLEDGED REVENUE OF THE AUTHORITY AS DESCRIBED ABOVE UNDER “PLEDGE AND ASSIGNMENT OF REVENUE AND FUNDS”. THE BONDS DO NOT CONSTITUTE A DEBT OF THE STATE OR OF ANY POLITICAL SUBDIVISION THEREOF, NOR A PLEDGE OF THE GENERAL TAXING POWER OR THE FAITH AND CREDIT OF THE STATE OR OF ANY SUCH POLITICAL SUBDIVISION.**

The State has covenanted in the Act that it will not repeal or reduce the motor fuel taxes, the motor vehicle document fees, the motor vehicle registration fees or the fees constituting Pledged Miscellaneous Transportation Revenue, which are pledged to secure the Bonds, below the levels in effect on the date of issuance of the 2019 Bonds until such Bonds are paid or provision for their payment is made. The State has not, however, authorized nor does it have any obligation to increase the rates of those taxes or fees to generate revenue to meet debt service on the 2019 Bonds.

The State has also covenanted in the Act that it will not (i) limit or alter the rights or powers vested in the Authority by the Act in any way that would jeopardize the interest of the holders of the Bonds or inhibit or prevent performance or fulfillment by the Authority of the terms of any agreement made with the holders or (ii) prevent the Authority from obtaining revenue which, together with other available funds, shall be sufficient to meet all expenses of the Authority and fulfill the terms of any agreement made with the holders of Bonds and all costs and expenses in connection with any action or proceedings by or on behalf of the holders, or (iii) prevent the Authority from receiving payment of funds as provided in any agreement, until the Bonds together with interest and premium, if any, thereon are fully met and discharged or provided for.

The State has also covenanted in the Act that it will not limit or restrict the rights granted to the Authority by the Act to construct, reconstruct, improve, extend, alter, modernize, repair, operate and maintain any transportation facilities, or to establish and collect such charges, fares, fees, rates, rentals and tolls as may be convenient or necessary to produce sufficient revenue to meet the expenses of maintenance and operation thereof and to fulfill the terms of any agreements made with the holders of bonds authorized by the Act or in any way impair the rights or remedies of the holders of such bonds until all of such bonds are fully paid or discharged.

## **Additional Senior Bonds**

The Agreement and the Act permit the Authority to issue additional Senior Bonds (or to convert outstanding Junior Bonds to Senior Bonds) secured on a parity with the other Senior Bonds issued and outstanding under the Agreement for any purpose permitted under the Act, provided that there is satisfied the Senior Bonds Historical Test (described in (i)(A) below) and the Junior Bonds Historical Test (described in (i)(B) below) or the Senior Bonds Alternate Test (described in (ii)(A) below) and the Junior Bonds Alternate Test (described in (ii)(B) below).

(i)(A) The Senior Bonds Historical Test is satisfied if the aggregate amount of motor fuel tax revenue, motor vehicle document fees, motor vehicle registration fees, revenue from the Delaware Turnpike, Pledged Miscellaneous Transportation Revenue and Additional Revenue pledged to secure the Bonds (excluding TTF Investment Earnings) (the “Test Revenue”) for any 12 consecutive month period of the preceding 15 months ending not later than three months prior to the date of the additional Senior Bonds, which date shall not be more than 90 days prior to the date of issuance of the additional Senior Bonds (adjusted to reflect adjustments in the tax rates, fees and tolls as if such adjustments had been in effect for the entire period) equals or exceeds 2.00 times the maximum Principal and Interest Requirements for all Senior Bonds, including the Senior Bonds proposed to be issued.

(B) The Junior Bonds Historical Test is satisfied if the aggregate amount of Test Revenue, calculated in the same manner and for the same 12 month period as in (i)(A) above, reduced by the maximum Principal and Interest Requirements for the Senior Bonds, equals or exceeds 3.0 times the maximum Principal and Interest Requirements for all Junior Bonds, including the Junior Bonds proposed to be issued.

(ii)(A) The Senior Bonds Alternate Test is satisfied if estimated Test Revenue (assuming for each fiscal year described below, that Test Revenue is equal to the aggregate amount of Test Revenue for the same 12 month period as in (i)(A) above as adjusted in subsequent fiscal years for any increase in tolls, taxes or fees from the date such increase is to be in effect) (I) for the current fiscal year and each of the following four fiscal years equals or exceeds 2.00 times the Principal and Interest Requirements for all Senior Bonds Outstanding during each such year and (II) for the fifth following fiscal year equals or exceeds 2.00 times the maximum Principal and Interest Requirements for all Senior Bonds for that year or any subsequent fiscal year.

(B) The Junior Bonds Alternate Test is satisfied if estimated Test Revenue (assuming for each fiscal year described below, that Test Revenue is equal to the aggregate amount of Test Revenue for the same 12 month period as in (i)(A) above as adjusted in subsequent fiscal years for any increase in tolls, taxes or fees from the date such increase is to be in effect), less (x) for the current and each of the next four fiscal years, the Principal and Interest Requirements on the Senior Bonds for each such year, and (y) for the fifth following fiscal year, the maximum Principal and Interest Requirements on the Senior Bonds for that year or any subsequent fiscal year, (I) for the current fiscal year and each of the following four fiscal years equals or exceeds 3.0 times the Principal and Interest Requirements for all Junior Bonds Outstanding during each such year and (II) for the fifth following fiscal year equals or exceeds 3.0 times the maximum Principal and Interest Requirements for all Junior Bonds for that year or any subsequent fiscal year.

The Authority may also issue additional Senior Bonds to refund any Senior Bonds, without meeting the coverage tests described above, if the maximum Principal and Interest Requirements for the refunding bonds is less than the maximum Principal and Interest Requirements for the Bonds to be refunded.

## **Additional Junior Bonds**

The Agreement and the Act permit the Authority to issue additional Junior Bonds secured on a parity with all other Junior Bonds issued and outstanding under the Agreement for any purpose permitted

under the Act, provided that either the Junior Bonds Historical Test or the Junior Bonds Alternate Test, as described above, is satisfied.

The Authority may also issue additional Junior Bonds to refund any Junior Bonds or Senior Bonds, without meeting the coverage tests described above, if the maximum Principal and Interest Requirements for the refunding bonds are less than the maximum Principal and Interest Requirements for the Bonds to be refunded.

### **Additional Revenue Considered in Additional Bonds Tests**

For the purposes of the additional bonds coverage tests described above, Additional Revenue (excluding the TTF Investment Earnings) may be included and taken into account as Test Revenue provided that (1) a Supplemental Agreement is duly adopted by the Authority providing for the pledge of such Additional Revenue under the Agreement for the benefit of the holders of Bonds, (2) the Authority receives a written opinion of nationally recognized bond counsel to the effect that such pledge is valid and binding on the Authority and any pledge or assignment of such additional revenue to the Authority by the State is valid, (3) the State or the Authority, as the case may be, shall have covenanted not to repeal, reduce or adversely alter such Additional Revenue below rates in effect at the time of such pledge and assignment, (4) all approvals and authorizations necessary to effect such pledge and assignment have been obtained and (5) the Supplemental Agreement evidencing the pledge of Additional Revenues shall incorporate all of the covenants, terms and conditions contained in the Agreement.

### **Subordinate Indebtedness**

Under the Agreement, the Authority may also issue additional obligations secured by a lien on the Pledged Revenue which is subordinate to the lien of the Senior Bonds and the Junior Bonds. Pursuant to Supplemental Agreement No. 27, bonds, parity obligations and/or subordinated indebtedness issued pursuant to and subject to the terms of that certain Master Indenture of Trust dated as of December 1, 2015 (the "Master Indenture") between the Authority and Wilmington Trust, National Association, as trustee (the "301 Trustee") are considered "Subordinate Indebtedness" under the Agreement. In December 2015, the Authority issued its Sr. 301 Bonds (as defined herein) in an aggregate principal amount of \$212,535,000 and its TIFIA 301 Bond (as defined herein) in a principal amount up to \$211,350,000, both of which were issued as Subordinate Indebtedness under the Agreement.

Before January 1, 2016, subordinate obligations issued under the Agreement could be issued without regard to any additional bonds debt service coverage test. After January 1, 2016, no such Subordinate Indebtedness shall be issued under the Agreement unless the tests in "Additional Seniors Bonds" above are first met with respect to Senior Bonds and Junior Bonds, and the following coverage test is also met: the aggregate amount of the Test Revenues for any twelve (12) consecutive months occurring in the most recent fifteen (15) months preceding the date on which the Subordinate Indebtedness is proposed to be issued was not less than 2.00 times the maximum debt service due for all outstanding Subordinate Indebtedness, taking into account the Subordinate Indebtedness proposed to be issued after subtracting from the Test Revenues the maximum Principal and Interest Requirements for Senior Bonds and Junior Bonds and any deposits to any funds or reserve funds as may be required by the Agreement. See "SECURITY FOR THE BONDS – Flow of Funds."

The rights of holders of any Subordinate Indebtedness will be limited, however, as follows: all principal and interest on all Senior and Junior Bonds must be paid before any payment of debt service may be made on any Subordinate Indebtedness if any of the following occur (i) insolvency, bankruptcy, receivership or any similar proceeding with respect to the Authority or its property; (ii) the acceleration of principal and interest on the Subordinate Indebtedness; (iii) an Event of Default with respect to Senior or Junior Bonds resulting in acceleration of principal of and interest on the Senior Bonds and/or the Junior Bonds; or (iv) an Event of Default resulting from the failure in payment of Principal and Interest

Requirements on any Bond. An event of default with respect to Subordinate Indebtedness shall not in itself create the right to declare an Event of Default with respect to the Senior Bonds or the Junior Bonds.

## **SOURCES OF REVENUE FOR THE TRUST FUND**

### **General**

The TTF receives the motor fuel taxes, the Delaware Turnpike toll and concession revenue, Route 1 Toll Revenue, the motor vehicle document fee revenue, the motor vehicle registration fee revenue, Miscellaneous Transportation Revenue and the interest earnings on the TTF's balances. All of the revenue derived from these sources, except the Route 1 Toll Revenue and the Non-Pledged Miscellaneous Transportation Revenue (which includes, among others, the escheat revenues), is pledged to secure the Bonds.

The Delaware Economic and Financial Advisory Council (“DEFAC”) forecasts revenue of the TTF applying various assumptions and forecasts provided to it by the Department. A traffic report entitled “Traffic and Revenue Study” has been completed by Stantec Consulting Services Inc. (the “Transportation Consultant”) on September 27, 2016 (the “Traffic Report”). An update letter (the “Update Letter”) with forecast adjustments was completed in July 2019 and is attached hereto, together with the Traffic Report, as APPENDIX D. The forecasts of toll and concession revenue for the Delaware Turnpike and the Route 1 Toll Road contained herein reflect the DEFAC forecasts. Based on the new Update Letter, minor forecast adjustments will be recommended at the September 2019 DEFAC meeting. It is likely that SR-1 will remain unchanged and I-95 will decrease by \$1.4 million in FY2020.

### **Motor Fuel Tax Revenue**

#### *General*

Motor fuel tax revenue is derived from taxes imposed by the State on gasoline and special fuels. This revenue totaled \$131.9 million (net of refunds) in fiscal 2018. Motor fuel tax revenue provided 27.1% of the revenue pledged to secure the Bonds in fiscal 2018 and is the second largest component of such pledged revenue.

The term “gasoline” includes all products commonly or commercially known as gasoline but does not include liquefied gases. The term “special fuel” means all combustible gases and liquids, except gasoline, suitable for the generation of power for propulsion of motor vehicles. Gasoline taxes are payable by licensed distributors and special fuel taxes are remitted by licensed special fuel suppliers, users and dealers based on the sale or use of special fuels. Distributors, licensed special fuel users, dealers and suppliers are required to file tax reports monthly and remit the taxes due for the preceding month. Failure to file reports or remit taxes subjects the distributor, dealer, user or supplier to monetary penalties plus civil or criminal proceedings. Exemptions from the motor fuel tax are provided to the United States or any government agencies thereof and to the State and its political subdivisions, among other entities.

Motor fuel taxes were imposed at the rate of 16 cents per gallon for gasoline and special fuels for the period from September 1, 1987 to December 31, 1990. On January 1, 1991 the motor fuel tax increased to 19 cents per gallon. In June, 1993, the General Assembly enacted increases in both the gasoline and special fuels tax rates as follows: (1) the gasoline tax rate increased to 22 cents per gallon on September 1, 1993 and to 23 cents per gallon on January 1, 1995; and (2) the special fuels tax rate increased to 22 cents per gallon on January 1, 1995.

*Historical Summary of Gallonage and Revenue from Motor Fuel Taxation*

The following table summarizes certain historical information pertaining to motor fuel taxes and motor fuel usage in the State.

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## History of Gallonage and Revenue from Motor Fuel Taxes

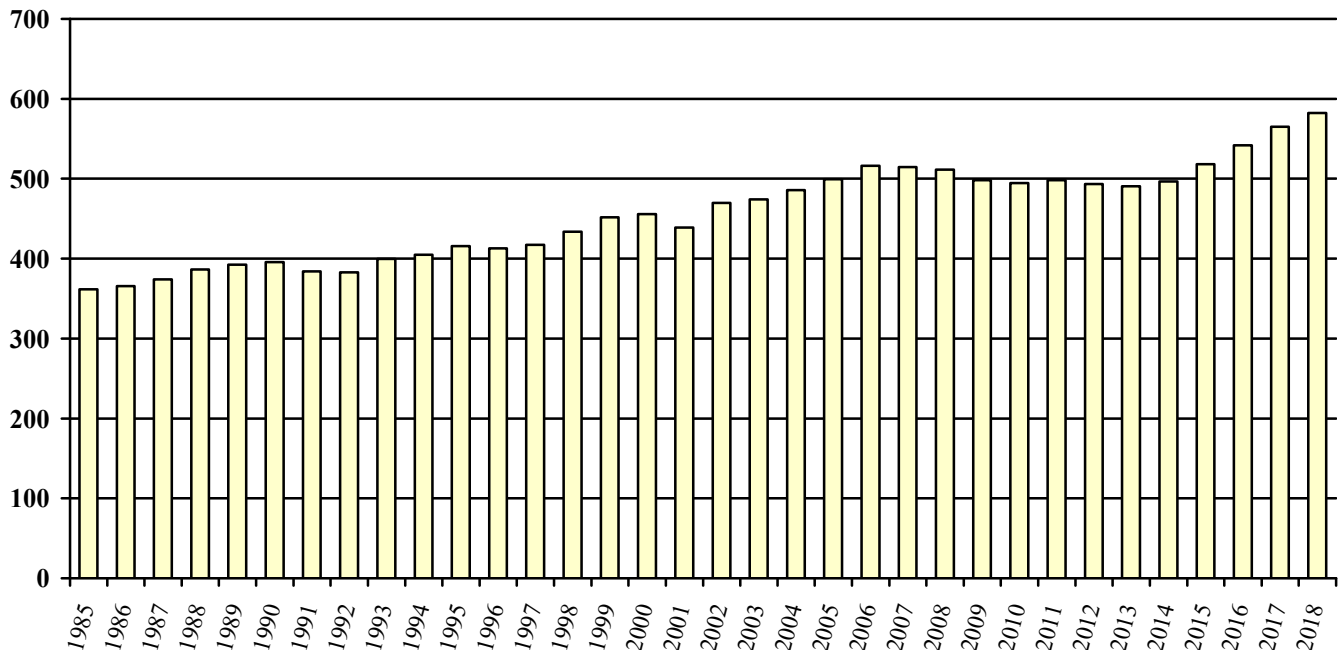
(dollars and gallonage in millions; percent change  
calculated from unrounded data)

	<u>Gallonage</u>	<u>Change</u>		<u>Revenue</u> <sup>(1)</sup>	<u>Change</u>	
1985	361.5	3.9	%	\$ 39.4	3.7	%
1986	365.6	1.1		40.2	2.0	
1987	374.2	2.4		45.7 <sup>(3)</sup>	13.7	
1988	386.4	3.3		59.2 <sup>(4)</sup>	29.5	
1989	392.5	1.6		62.6	5.7	
1990	395.8	0.8		63.4	1.3	
1991	383.9	(3.0)		66.0 <sup>(5)</sup>	4.1	
1992	382.8	(0.3)		72.5	9.9	
1993	399.7	4.4		75.6	4.3	
1994	404.8	1.3		84.7 <sup>(6)</sup>	12.0	
1995	415.5	2.6		91.7 <sup>(7)</sup>	8.3	
1996	412.7	(0.7)		94.1	2.6	<sup>(8)</sup>
1997	417.2	1.1		95.1	1.1	
1998	433.8	4.0		98.5	3.6	
1999	451.9	4.1		102.5	4.0	
2000	455.7	0.8		103.9	1.4	
2001	438.8	(3.7)		98.9	(4.8)	
2002	469.6	7.0		107.7	8.9	
2003	474.2	1.0		107.3	(0.4)	
2004	485.7	2.4		112.4	4.8	
2005	499.2	2.8		113.7	1.1	
2006	516.2	3.4		120.1	5.7	
2007	514.6	(0.3)		117.5	(2.2)	
2008	511.4	(0.6)		117.7	0.2	
2009	498.1	(2.6)		114.6	(2.6)	
2010	494.5	(0.7)		112.9	(1.5)	
2011	498.1	0.7		113.8	0.8	
2012	493.5	(0.9)		112.9	(0.7)	
2013	490.7	(0.6)		112.6	(0.3)	
2014	496.7	1.2		114.6	1.8	
2015	518.0	4.3		117.0	2.1	
2016	541.9	4.6		124.6	6.5	
2017	565.0	4.3		129.6	4.0	
2018	582.1	3.0		131.9	1.8	

- 
- (1) Net of motor carrier fees and refunds for non-highway use.  
(2) Rate increased from 9 to 11 cents per gallon on August 1, 1981.  
(3) Rate increased from 11 to 13 cents per gallon on October 1, 1986.  
(4) Rate increased from 13 to 16 cents per gallon on September 1, 1987.  
(5) Rate increased from 16 to 19 cents per gallon for gasoline on January 1, 1991.  
(6) Rate increased from 19 cents to 22 cents per gallon for gasoline on September 1, 1993.  
(7) Rate increased from 22 cents to 23 cents per gallon for gasoline and from 19 to 22 cents per gallon for special fuels on January 1, 1995.  
(8) Reflects full year impact of fiscal 1995 rate increase.

The following graph plots the taxable motor fuel consumed in the State from fiscal 1985 through fiscal 2018.

## Motor Fuel Consumption Fiscal 1985-2018 (in millions of gallons)



### *Motor Fuel Consumption*

Motor fuel consumption is affected by various factors, including population growth, stages of the business cycle, cost and availability of fuel, the requirements of the Federal Energy Act and the Federal Clean Air Act Amendments of 1991 and the fuel efficiency of the vehicle fleet.

During the thirty-four year period from fiscal 1985 through fiscal 2018, motor fuel consumption has risen from a low of 361.5 million gallons during fiscal 1985 to an all-time high of 582.1 million gallons during fiscal 2018. Until 2014, motor fuel consumption had declined in every year since 2007, except for a 0.7% increase in fiscal 2011 which is attributed to the re-opening of the I-95 service plaza that had been closed for most of fiscal 2010. Motor fuel consumption has risen every year since FY2014, increases can be attributed to both lower fuel prices and increased vehicle miles traveled. In fiscal 2018, the I-95 service plaza sold over 11.1 million gallons of gasoline and over 4.6 million gallons of diesel fuel.

Special fuel consumption has increased significantly since fiscal 1980 primarily because of the increased use of diesel engines. Special fuel's percentage of total consumption has increased from 9.2% in fiscal 1980 to 14% in fiscal 2018.

*Projections of Gallonage and Revenue from Motor Fuel Taxes*

Based on the historical data regarding motor fuel consumption, current economic conditions and some of the factors referenced below, DEFAC has provided projections of fuel revenues through fiscal 2025. An important factor which will affect future motor fuel consumption and revenues, both nationally and in Delaware, is the shift in consumer purchasing toward smaller more fuel-efficient vehicles. Increases in vehicle fuel efficiency will also impact consumption. New vehicles entering the fleet have increased the average number of gallons for all vehicles and future changes in vehicle technology may affect gasoline consumption.

Revenues and fuel consumption are impacted by several factors which contribute to increases and decreases in both the price and availability of gasoline. Such factors taken into consideration are:

- U.S. dependency on imported crude oil has been decreasing due to continued domestic development of light oil and increased offshore development. Based on estimates from the Department of Energy - U.S. Energy Information Administration (EIA), by 2020, domestic oil production could be at the high levels previously seen in 1994;
- Use of other fuel types, such as biofuel, has increased in the U.S., reducing the need for gasoline;
- Demand for fuel remains uncertain based on domestic and world economic recovery and future economic conditions. A potential slowing of domestic demand could result in lower prices; however, price decreases could be offset by increased demand overseas as global economic conditions improve;
- Political unrest in oil-producing countries creates price uncertainty;
- Vehicle Miles Traveled (VMT) on a national level decreased by 2.5% between 2007 and 2008 and by 2.2% between 2010 and 2011. Delaware VMT patterns from 2006 to 2011 reflected a 6.3% decrease (from a high of 9.5 billion miles in 2006 down to 8.9 billion in 2011). Since 2011, Delaware VMT has increased by 3.4%, reaching an annual level of 9.2 billion in 2013. Fuel price increases could decrease future Delaware VMT, as seen when gasoline prices increased in 2008 and 2011.
- Vehicle fuel efficiency continues to increase. The latest data available from the U.S. Environmental Protection Agency shows that the adjusted 2012 composite model year fuel economy was at a high of 23.6 miles per gallon (mpg). It is assumed that fuel efficiency of vehicles will continue to increase. Total fleet federal Corporate Average Fuel Economy (CAFE) requirements are set at 34.1 mpg for 2016 (37.8 mpg average for passenger cars / 28.8 mpg for light trucks).
- Currently, motor fuel consumption has increased in recent years primarily due to continued lower fuel prices. DEFAC continued a conservative growth rate of 1.0% in FY2020 through 2025, believing that fuel consumption will return to a more normal growth rate.

The forecasted motor fuel consumption and revenue from motor fuel taxation, assumes the current and approved rate structure of \$.23 per gallon for gasoline and \$.22 per gallon for special fuels.

**Projections of Gallonage and Revenue from Motor Fuel Taxes<sup>(1)</sup>**  
(dollars and gallonage in millions)

<u>Fiscal Year</u>	<u>Gallonage</u>	<u>Percent Change</u>	<u>Revenue<sup>(2)</sup></u>	<u>Percent Change</u>
2019	572,632	7.7% <sup>(3)</sup>	142.4	7.7% <sup>(3)</sup>
2020	578,358	1.0%	143.8	1.0%
2021	581,142	1.0%	145.3	1.0%
2022	589,983	1.0%	146.8	1.0%
2023	595,883	1.0%	148.3	1.0%
2024	601,842	1.0%	149.8	1.0%
2025	607,860	1.0%	151.3	1.0%

(1) Projections provided by DEFAC from its June 19, 2019 meeting.

(2) Revenue net of motor carrier fees and refunds for non-highway use.

(3) Percent change from fiscal 2018 actual.

## **Toll Revenue**

### *Delaware Turnpike Revenue*

General. The toll and concession revenue of the Delaware Turnpike generated the largest source of revenue to the TTF: \$135.1 million in fiscal 2018 or 27.8% of the revenue pledged to secure the Senior Bonds (including the 2020 Bonds), Junior Bonds and Subordinate Indebtedness issued pursuant to the Agreement. Of the total toll and concession revenue in fiscal 2018, toll revenue comprised 98% and concession revenue comprised 2%.

Electronic Tolls. In 1998, the Department joined a consortium of several transportation agencies from New Jersey and New York (the “Consortium”) for the purpose of installing an electronic toll collection system (“E-Z Pass System”) on the toll roads and bridges operated by the members of the Consortium.

For a variety of reasons, the Department determined to separate from the Consortium. In connection with the decision to separate from the Consortium, the Department entered into an Agreement with TransCore for the build-out and operation of the Department’s new stand-alone E-Z Pass Customer Service Center and Violations Processing Center. The Center was completed and made operational in October 2003.

The implementation of the E-Z Pass System occurred in stages. The implementation of E-Z Pass coincided with the increase in tolls at the Delaware Turnpike in January 1999. Implementation on the southern section of State Route 1 occurred in April 1999 and implementation in the northern section occurred with the opening of the tolls at Biddles Corner, southern New Castle County, in November 1999.

The E-Z Pass System has increased the Authority’s ability to track traffic and transactions at the toll barriers and has aided in the electronic transfer of funds to TTF accounts. It has also increased the Authority’s enforcement of violations for non-payment of tolls.

Delaware's E-Z Pass utilization rates have increased as expected. The Delaware Turnpike has a utilization rate of 75.8%, while the rate on State Route 1 was 73.9% for fiscal 2018. These rates will continue to increase as neighboring toll facilities join the E-Z Pass network.

Description of Delaware Turnpike. The Delaware Turnpike comprises 11.3 miles of the nation's Interstate 95, which extends along the east coast from Maine to Florida. To the southwest, the Delaware Turnpike connects directly to the Maryland Turnpike, a similar toll facility extending southward to Baltimore.

The easterly terminus of the Delaware Turnpike is at Delaware Route 141 where the Delaware Turnpike meets the following three non-toll sections of the State's interstate road system: Interstate 95 which extends north to Wilmington, Delaware and into Pennsylvania; Interstate 495 which bypasses Wilmington to the east and rejoins I-95 at the Delaware/Pennsylvania state line; and Interstate 295 which connects with U.S. Routes 13, 40 and 301 immediately to the east, and continues across the Delaware Memorial Bridge, connecting with the New Jersey Turnpike and New Jersey I-295.

Most of the Delaware Turnpike consists of four twelve-foot wide lanes in each direction. There are four interchanges to serve communities along the route. A main barrier toll plaza consisting of 18 lanes (7 cash lanes and 2 high speed E-Z Pass lanes in each direction), the only toll collection point on the Delaware Turnpike, is located near the Maryland state line.

The Authority owns a service plaza facility containing restaurants and one service station which, through contracts with concessionaires, provides additional revenue for the Delaware Turnpike. The facility is located on I-95 near Newark, Delaware, approximately midway on the Delaware Turnpike, between the north and southbound lanes.

The Delaware Welcome Center Travel Plaza was rebuilt over a nine month period beginning September 9, 2009. The new facility opened June 24, 2010 and features a 47,000 square foot building and a new service station operated by Sunoco, with high-speed diesel pumps and a 24-hour convenience store. The \$35 million complex was financed entirely with private funding by the operator, HMS Host Corporation, pursuant to a twenty-year contract which extended through June 2008, but which remained in force through carryover provisions until the plaza closed down for construction in September 2009. A new contract was negotiated and executed in July 2008 for the design, finance, construction, operation, and maintenance of a new welcome center and service plaza. The contract also requires the operator to spend, at a minimum, an additional \$21 million in capital improvements over the 35-year lease term. To replace revenue lost during the closure, temporary rent payments were made each month during the closure (\$170,000/month). A new revenue sharing agreement was also negotiated between the operator and the Department. In fiscal 2018, concession revenue to the Delaware Turnpike totaled \$2.4 million.

Historic Traffic and Toll Summary. The average annual growth of vehicle trips since fiscal 1985 has been 1.9%. During fiscal 2018, traffic decreased by 0.4% (passenger traffic decreased by 1.5% and commercial traffic was up 5.0%).

Several factors have had a significant impact on I-95/Delaware Turnpike traffic over the last ten years. These include the recession of 2007 – 2009 and its slow recovery; toll increases in 2005 and 2007; severe weather events such as Superstorm Sandy in October 2012 and severe winter snow and ice storms over the last few years. Traffic has also been impacted by the increase in fuel prices in 2008 and 2011. Traffic volumes on I-95/Delaware Turnpike decreased from a high of 28.6 million in fiscal 2004 to 27.4 million in fiscal 2018.

Toll Evasion Agreement. In fiscal 2008, the Authority discontinued its toll evasion program. Commercial traffic declined from fiscal 2008 through fiscal 2011. In fiscal 2012, as the recession eased, commercial traffic increased by 2.5%. However, in fiscal 2013, traffic unexpectedly declined. In fiscal 2014, after six consecutive months of decline, the decision was made to implement a three-month pilot program for enhanced enforcement of toll evasion by heavy trucks and commercial motor vehicles in the vicinity of the I-95 Newark toll plaza, particularly along the Delaware Route 896 corridor and Christina Parkway which by local ordinance restricts use of such roads for local deliveries.

The Delaware State Police Commercial Motor Vehicle Unit in conjunction with the City of Newark Police Department started a pilot program from November 1, 2014 through January 31, 2015 to enforce heavy trucks and commercial motor vehicles along the Delaware Route 896 corridor and the vicinity of the I-95 Newark toll plaza. The Delaware State Police concentrated its enforcement along Delaware Route 896, Old Baltimore Pike, Elkton Road and Otts Chapel Road. The Newark Police Department concentrated its enforcement on Delaware Route 896 and the Christina Parkway.

The pilot program resulted in 759 hours of enforcement with 564 vehicles being inspected, which resulted in 267 citations being issued. Commercial traffic during this period increased by 22,281 vehicles, which resulted in additional toll revenues of over \$182,000. Program costs were \$52,120. There are many variables that affect commercial traffic, and although the Authority cannot attribute the large traffic gains specifically to the enforcement program, the Delaware State Police have witnessed heightened communication between truckers using the corridor, which implies trucker awareness of the enforcement.

Based on the results of the pilot program, on January 21, 2015, the Department entered into two new agreements (each with the Delaware State Police and the City of Newark Police Department) to continue the enforcement program through the end of the fiscal 2015 (February 1, 2015 to June 30, 2015). To reduce the cost while still remaining effective, it was determined that the number of enforcement shifts could be reduced and the program hours of operation would be randomized, so that no enforcement pattern could be detected by the truckers. The extended program resulted in an additional 276,375 trucks passing the toll plaza compared to the previous year. Revenues associated with the increased truck traffic was \$2.3 million. The total cost of the agreement was \$55,584. Commercial traffic was up 5.9% compared to the previous year.

The Department has kept this program in place and has just negotiated to continue these programs through FY2020. Due to the success of the program, the Department anticipates continuing the program into the future.

Vehicle Trips. The following table summarizes the recorded vehicle trips through the Delaware Turnpike toll barrier and the revenue derived from tolls and concessions from fiscal 1985 through fiscal 2018.

## Delaware Turnpike Vehicle Trips and Revenue

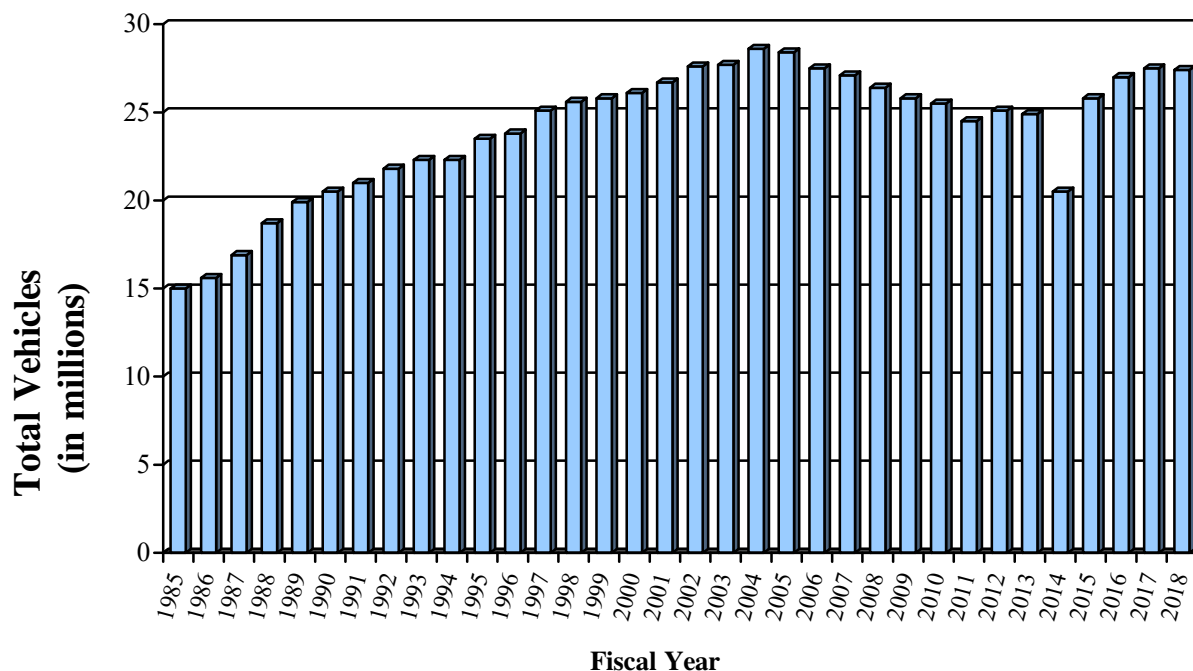
(dollars and vehicles in millions, percent change and totals  
calculated from unrounded data)

	<u>Vehicles Through the Toll Barrier</u>	<u>Change</u>	<u>Toll Revenue</u>		<u>Concession Revenue</u>	<u>Toll and Concession Revenue</u>	<u>Change</u>
1985	15.0	4.5	\$ 19.7	(1)	1.3	\$ 21.0	4.5%
1986	15.6	4.1%	20.5		1.3	21.8	3.8
1987	16.9	8.3	22.3		1.4	23.7	8.7
1988	18.7	10.4	24.6		1.4	26.0	9.7
1989	19.9	6.5	26.1		1.7	27.8	6.9
1990	20.5	3.2	28.3	(2)	1.7	30.0	7.9
1991	21.0	2.1	29.0		1.7	30.7	2.3
1992	21.8	4.0	29.5		1.9	31.4	2.3
1993	22.3	2.4	30.4		2.0	32.4	3.2
1994	22.3	(0.2)	36.7	(3)	2.1	38.8	19.7
1995	23.5	5.4	40.3		2.2	42.5	9.5
1996	23.8	1.7	40.6		2.3	42.9	0.9
1997	25.1	4.7	41.8		2.4	44.2	3.0
1998	25.6	2.2	43.3		2.4	45.7	3.4
1999	25.8	0.7	51.3	(4)	2.5	53.8	17.6
2000	26.1	1.2	60.1		2.5	62.6	16.3
2001	26.7	2.2	61.6		2.6	64.2	2.6
2002	27.6	3.4	62.1		2.5	64.6	0.6
2003	27.7	0.3	60.1		2.5	62.6	(3.0)
2004	28.6	3.0	60.1		2.8	62.9	0.4
2005	28.4	(0.5)	57.9		2.8	60.7	(3.4)
2006	27.5	(3.1)	84.7	(5)	3.0	87.7	44.5
2007	27.1	(1.5)	93.6		3.1	96.7	10.3
2008	26.4	(2.6)	115.4	(6)	2.5	117.9	21.9
2009	25.8	(2.3)	118.8		2.4	121.2	2.8
2010	25.5	(1.2)	117.2		2.2	119.4	(1.5)
2011	24.5	(4.2)	114.1		1.8	115.9	(2.9)
2012	25.1	2.5	115.3		1.8	117.1	1.1
2013	24.9	(0.9)	117.7		2.4	120.1	2.5
2014	25.0	0.4	119.9		2.5	122.4	1.9
2015	25.8	3.2	117.8		2.6	120.4	(1.7)
2016	27.0	4.8	129.9		2.6	132.5	10.0
2017	27.5	1.9	133.7		2.5	136.2	2.8
2018	27.4	(0.4)	132.7		(0.8)	135.1	(0.8)

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- (1) Toll increase effective July 1, 1983.  
(2) Toll adjustments effective October 1, 1989.  
(3) Toll increase effective September 1, 1993.  
(4) Toll increase for Non-E-Z Pass cars effective on January 4, 1999.  
(5) Toll increase effective October 1, 2005.  
(6) Toll increase effective October 1, 2007.

The following graph illustrates the growth of traffic through the toll gates of the Delaware Turnpike from fiscal 1985 through fiscal 2018.

## Delaware Turnpike Toll Traffic Fiscal 1985-2018



Delaware Turnpike Toll Schedules. The Act authorizes the imposition of tolls at the main barrier of the Delaware Turnpike. The Authority has broad power to determine the levels of the tolls. The establishment of tolls does not involve public hearings, nor are the levels of tolls subject to approval by any person or entity other than the Authority itself. In general, the Authority has set tolls to meet debt service and reserve requirements on obligations sold to fund Delaware Turnpike projects, to meet operating and maintenance costs and to fund the costs of constructing and reconstructing feeder roads and related facilities used by Delaware Turnpike travelers.

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The following table summarizes the recent toll history and indicates the percentage of toll revenue collected in fiscal 2018 by class of vehicle.

### Delaware Turnpike Barrier Tolls

	January 4, 1999 - September 30, 2005	October 1, 2005 - September 30, 2007	October 1, 2007 to Present (4)	% of Fiscal 2018 Toll Revenue by Vehicle Class
Commuter Vehicle	n/a	n/a	n/a	n/a
High Occupancy Vehicle (2)	\$0.63	n/a	n/a	n/a
Passenger cars, pick up and panel trucks (1)	\$2.00	\$3.00	\$4.00	19.8%
Passenger cars, pick up and panel trucks-EZP	\$1.25	\$3.00	\$4.00	55.1%
Two axles, six tire trucks	n/a	n/a	n/a	n/a
Three axles trucks	\$2.50	\$5.00	\$6.00	2.4%
Three axles trucks EZP 10 p.m. - 6 a.m. (3)	n/a	\$1.25	n/a	n/a
Four axle trucks	\$3.75	\$6.00	\$7.00	2.7%
Four axle trucks EZP 10 p.m. - 6 a.m. (3)	n/a	\$1.50	n/a	n/a
Five axle trucks	\$5.00	\$8.00	\$9.00	19.4%
Five axle trucks EZP 10 p.m. - 6 a.m. (3)	n/a	\$2.00	n/a	n/a
Six axle trucks	\$6.25	\$10.00	\$11.00	0.6%
Six axle trucks EZP 10 p.m. - 6 a.m. (3)	n/a	\$2.50	n/a	n/a
Special permit vehicles	\$10.00	\$10.00	\$11.00	0.0%

- (1) Includes toll revenue from two axle, six tire trucks which are now in the same vehicle class as passenger cars, pick up and panel trucks.
- (2) Special 50% discount applied when commuter's vehicle has two or more passengers.
- (3) Commencing October 1, 2005, toll increase and discounts offered to commercial E-Z Pass customers during the hours of 10 p.m. to 6 a.m.
- (4) Commencing October 1, 2007, all vehicle class tolls increased by \$1.00, and the night-time discount offered to commercial E-Z Pass customers during the hours of 10 p.m. to 6 a.m. was discontinued.

Projections of Delaware Turnpike Toll and Concession Revenue. DEFAC projects toll and concession revenue which projections are set forth in the following chart.

### Projections of Delaware Turnpike Toll and Concession Revenue<sup>(1)</sup> (dollars in millions)

<u>Fiscal Year</u>	<u>Toll Revenue</u> <sup>(2)</sup>	<u>Concessions</u>	<u>Total Revenue</u>	<u>Percent Change</u>
2019	\$ 142.4	\$ 2.5	\$ 144.9	2.6% <sup>(3)</sup>
2020	143.8	2.6	146.4	1.0
2021	145.2	2.6	147.8	1.0
2022	146.7	2.7	149.4	1.0
2023	148.2	2.7	150.9	1.0
2024	149.7	2.7	152.4	1.0
2025	151.2	2.7	153.9	1.0

- (1) Projections provided by DEFAC from its June 19, 2019 meeting.
- (2) Excludes "Other Turnpike Revenue".
- (3) Percent change from fiscal 2018 actual.

### *Route 1 Toll Road*

General. The Authority has completed a fully controlled access highway of 41 miles extending from a connection with the southern terminus of the new Route 1 Toll Road just south of Wilmington to points south of Dover on U.S. Routes 13 and 113. A new high-level bridge across the Chesapeake and Delaware Canal was opened for traffic during December 1995.

The southern portion of the project was opened for traffic during December 1993. This section is approximately 9 miles and extends from north of Smyrna southward to south of State Route 10 in the vicinity of the Dover Air Force Base. This section also includes a mainline toll plaza and one ramp toll for access to and from the City of Dover.

A portion of the northern section of approximately 4.8 miles, including a new bridge over the Chesapeake and Delaware Canal, was opened for traffic in December 1995. On November 17, 1999, this section was extended another 9 miles south to Odessa. This section has a main-line toll plaza (the Biddle's Plaza) and tolls on the southerly interchange ramps at Route 896 (Boyd's Corner). The final section from south of Odessa to north of Smyrna was finished in May 2003.

Most Recent Toll Increase. Effective August 2014, the weekend toll rate for all vehicle classes was increased by \$1.00.

Fiscal 2008 Toll Increases. With input from the General Assembly and the then Governor and her Administration, the Authority evaluated the current toll structure and found that amending the current structure of the Route 1 Toll Road would be in the best interest of the Authority.

Effective October 1, 2007, passenger tolls at the Biddles and Dover plazas were increased by \$1.00 on weekends (weekends are defined as the period between 7:00 p.m. ET on Friday through 11 p.m. ET on Sunday). Passenger weekday and weekend tolls at the other toll areas remained unchanged.

Commercial traffic tolls were raised by \$.25 per axle at Smyrna and \$.50 per axle at Denneys and Boyds. At Biddles and Dover, the commercial toll was raised by \$1.00 per axle on weekdays and an additional \$1.00 per axle on weekends.

Effective October 1, 2007, the 15% E-Z Pass discount was eliminated. Passenger frequency discounts of 50% for travelers who meet the "30 trips in 30 days" requirement remained in place. The commercial E-Z Pass discount was reduced from 50% to 25%, and is still available without a minimum trip requirement. The High Occupancy Vehicle ("HOV") Plan discount was also eliminated. The current toll structure is listed below:

<u>Vehicle Class</u>	<u>Smyrna</u>	<u>Denneys Road and Boyds Corner</u>	<u>Biddles Plaza and Dover Plaza</u>	
	All Days	All Days	Weekday	Weekend
Two Axle.....	\$ 0.25	\$ 0.50	\$ 1.00	\$ 3.00
Three axle.....	0.75	1.50	3.00	5.00
Four axle.....	1.00	2.00	4.00	6.00
Five axle.....	1.25	2.50	5.00	7.00
Six axle.....	1.50	3.00	6.00	8.00
Permit.....			\$11.00	\$11.00

Historic and Projected State Route 1 Toll Revenue. Fiscal 1995 represented the first full year of operation for the Route 1 Toll Road. Total revenues of \$6.4 million exceeded the forecast of \$5.7 million projected in connection with the sale of the 1994 Series Senior Bonds. DEFAC's projected toll revenue for

the entire Route 1 Toll Road, assuming the present toll structure was maintained at both mainline toll barriers, is set forth in the following table. Total annual revenues to be generated from the entire toll road are expected to increase to approximately \$69.6 million by fiscal 2025. **Revenue from the Route 1 Toll Road is not pledged to secure the Bonds.**

Route 1 traffic volumes have been increasing fairly consistently, with the exception of the impacts of the 2007 toll increase in fiscal 2008 and the effects of the recession in fiscal 2009. In 2006, there were 37.3 million transactions on the toll road and this increased to 44.5 million in fiscal 2018.

**Route 1 Toll Road  
Historical Toll Revenue**

(dollars in millions, percentage change calculated from unrounded data)

<u>Fiscal Year</u>	<u>Total Toll Revenue</u>	<u>Percent Change</u>
1997	\$ 8.4	---
1998	9.2	8.9
1999	9.7	5.8
2000	16.4	69.8
2001	20.7	25.7
2002	24.2	17.2
2003	25.4	5
2004	27.1	6.5
2005	30.2	11.3
2006	31.5	4.5
2007	32.6	3.4
2008	40.5 <sup>(2)</sup>	24.2 <sup>(2)</sup>
2009	44.5	9.9
2010	45.5	2.3
2011	44.4	-2.4
2012	44.9	1.0
2013	46.2	3.0
2014	47.6	3.0
2015	55.8 <sup>(3)</sup>	17.2
2016	59.8	7.3
2017	61.3	2.5
2018	62.0	1.1

(1) Projections provided by DEFAC from its June 19, 2019 meeting.

(2) Toll increase effective October 1, 2007.

(3) Weekend toll increase effective August 1, 2014.

**Projections of SR-1 Toll Revenue<sup>(1)</sup>**

(dollars in millions)

<u>Fiscal Year</u>	<u>Toll Revenue<sup>(2)</sup></u>
2019	64.0 <sup>(2)</sup>
2020	65.0
2021	66.0
2022	67.0
2023	68.0
2024	68.8
2025	69.6

(1) Projections provided by DEFAC from its June 19, 2019 meeting.

(2) Percent change from fiscal 2018 actual.

**Most Recent Revenue Legislation**

The Delaware General Assembly passed House Bill 140 on June 30, 2015, increasing various Department of Motor Vehicle fees. All fee increases became effective on October 1, 2015.

House Bill 140 increased the following revenue sources for the TTF:

<u>Fee Source</u>	<u>Prior Fee</u>	<u>New Fee (effective Oct. 1, 2015)</u>
Motor Vehicle Document Fee	3.75% of vehicle net cost	4.25% of vehicle net cost
Late Renewal of Driver's License	\$1.15	\$10.00
Late Renewal of Vehicle Registration	\$10.00	\$20.00
Reinstatement of Suspended License	\$25.00	\$40.00
Reinstatement of Revoked License	\$143.75	\$200.00
Vehicle Temporary Tag	\$10.00	\$20.00
Sale of Driver's License Records	\$15.00	\$25.00
Transfer of Specific Vehicle Tag	\$10.00	\$20.00
Issuance of Title	\$25.00	\$35.00
Issuance of a Lien on Existing Title	\$10.00	\$20.00
Duplicate Documents		
- Driver's License	\$10.00	\$20.00
- Title	\$25.00	\$50.00
- Vehicle Validation Stickers	\$1.00	\$5.00
- Registration Card	\$2.00	\$10.00

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## Motor Vehicle Document Fees

### *General*

Motor vehicle document fees are imposed upon the sale or transfer of any new or used motor vehicle, truck tractor, trailer or motorcycle in the State. These fees contributed \$116.2 million in fiscal 2018, 23.9% of the fiscal 2018 revenue pledged to the Senior Bonds (including the 2020 Bonds), Junior Bonds and Subordinate Indebtedness issued pursuant to the Agreement.

*Fiscal 2008 Fee Increase.* Effective October 1, 2007, the document fee increased by \$.50 per hundred dollars of the net vehicle purchase price. The new fee increased from \$2.75 per hundred to \$3.25 per hundred.

*Fiscal 2009 Fee Increase.* Effective October 1, 2008, the second phase of the document fee increase became effective. The new increase of an additional \$.50 per hundred increased the fee to \$3.75 per hundred.

*Fiscal Year 2016 Fee Increase.* Effective October 1, 2015, a document fee increase became effective. The new increase of an additional \$0.50 per hundred increased the fee to \$4.25 per hundred.

The document fee, which is based on the vehicle purchase price, is paid by the owners and collected by the State for deposit in the TTF. If the price of the vehicle is less than \$400, the fee is \$8; if the price is \$400 to \$500, the fee is \$13.75. Thereafter, the fee increases by \$4.25 for each additional \$100 of vehicle purchase price or any fraction thereof. The following table summarizes the history of motor vehicle document fee collections from fiscal 1985 through fiscal 2018.

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## History of Motor Vehicle Document Fees

(vehicles in thousands and dollars in millions,  
percent change calculated from unrounded data)

<u>FY</u>	<u>Vehicles Titled</u> <sup>(1)</sup>	<u>Change</u>		<u>Revenue</u>		<u>Change</u>
1985	229.6	--		\$ 16.7		--
1986	251.4	9.5	%	19.5		17.0 %
1987	274.3	9.1		21.1		8.1
1988	270.6	(1.3)		22.1		4.7
1989	233.2	(13.8)		22.6		2.3
1990	213.8	(8.3)		22.6		(0.2)
1991	209.7	(1.9)		19.7		(12.7)
1992	196.4	(6.3)		19.5		(0.8)
1993	193.0	(1.7)		21.0		7.7
1994	199.0	3.1		30.3	(2)	44.3
1995	215.5	8.3		38.6		27.4
1996	211.6	(1.8)		39.9		3.3
1997	216.5	2.3		42.5		6.7
1998	217.0	0.3		44.4		4.4
1999	224.9	3.6		48.1		8.3
2000	232.7	3.5		52.9		9.9
2001	234.0	0.5		52.8		0.0
2002	244.1	4.3		55.2		4.5
2003	248.2	1.7		57.7		4.6
2004	262.3	5.7		62.5		8.4
2005	276.1	5.2		65.7		5.0
2006	275.8	(0.1)		64.8		(1.3)
2007	264.7	(4.0)		62.7		(3.3)
2008	250.1	(5.5)		64.6	(3)	3.0
2009	214.9	(14.1)		56.2	(4)	(13.0)
2010	215.9	0.5		58.4		3.8
2011	232.0	7.5		68.3		17.1
2012	234.0	0.9		71.1		4.1
2013	240.0	2.6		77.6		9.1
2014	251.9	5.0		84.8		9.3
2015	264.6	12.7		94.0		10.9
2016	271.2	2.5		107.8	(5)	14.6
2017	272.0	0.3		116.3		7.9
2018	265.3	(2.5)		116.2		(0.1)

(1) Includes titles for both new and used vehicles which closely approximates total car sales during each fiscal year.

(2) Reflects rate increase from 2% to 2.75%, effective September 1, 1993.

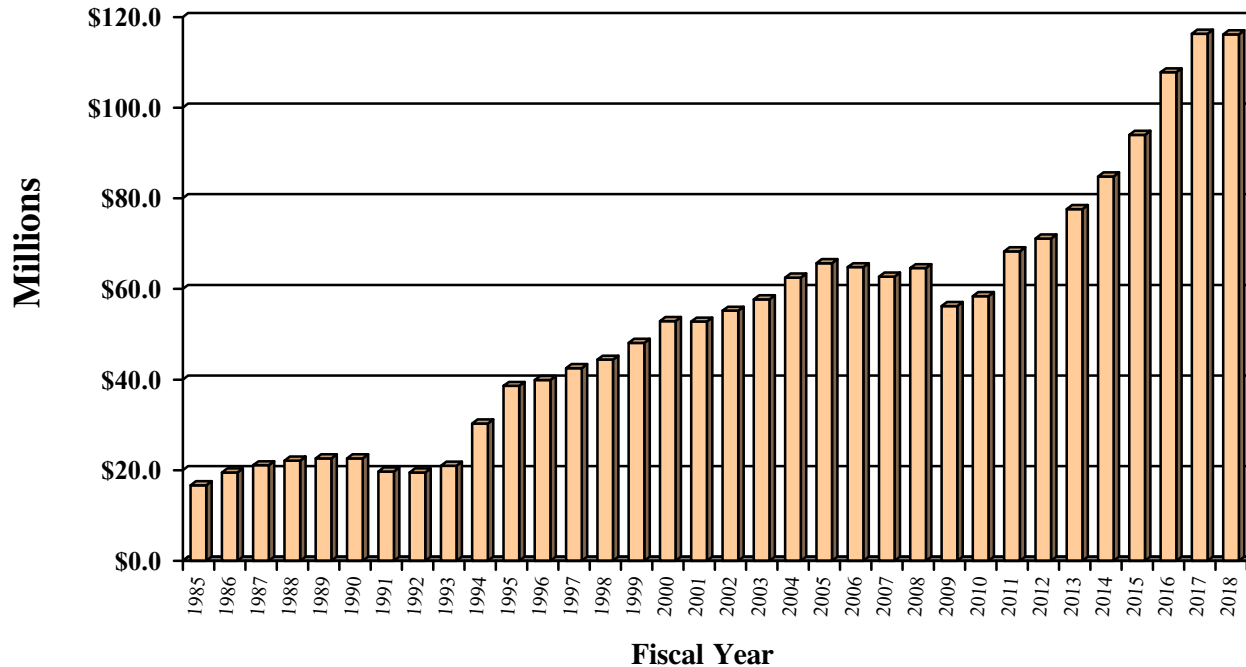
(3) Reflects rate increase from \$2.75 per hundred to \$3.25 per hundred, effective October 1, 2007.

(4) Reflects rate increase from \$3.25 per hundred to \$3.75 per hundred, effective October 1, 2008.

(5) Reflects rate increase from \$3.75 per hundred to \$4.25 per hundred, effective October 1, 2015.

The revenue stream in the previous table is illustrated by the following graph.

## Motor Vehicle Document Fee Revenue Fiscal 1985-2018



Document fee revenue decreased in fiscal years 1990 through 1992 reflecting that recessionary period. Fiscal 1993 revenue increased 7.7% as the economy improved as indicated by the increase in new car sales of 5.6%. The trend continued during fiscal 1994 as revenue increased over 44% as a result of an increase in new car sales of over 9.1% combined with the document fee increase from 2% to 2.75% in September 1993.

The average annual rate of growth in revenue was 8.0% between fiscal 1994 and fiscal 2007, due in large part to increases in new car sales and document fees (as described below). The average annual rate of growth in revenue was 4.2% between fiscal 1996 and fiscal 2007, despite no increase in the document fee. Document fee revenue is generated by the number of transactions as well as the cost of the vehicle transferred. Fiscal 2008 saw revenues increase by 3.0% primarily due to the fee increase. The slowing economy contributed to poor auto sales, as vehicle titles decreased by 5.5% from fiscal 2007.

Again in fiscal 2008 both new and used car sales were down compared to the previous year. Tightening credit conditions along with higher interest rates slowed vehicle sales. These economic conditions combined with increased energy costs reduced consumers disposable income and borrowing ability, which resulted in weaker vehicle sales. The continued poor economic conditions caused a reduction in fiscal 2009 revenues. As conditions started to improve in fiscal 2010, revenues increased from document fees. By fiscal 2011, document fee revenues increased greatly by 17.1%, and such gain was attributed to the easing of bank financing and pent-up demand as consumers once again started to replace older vehicles. Strong vehicle sales continued annually from fiscal 2012 through fiscal 2017, inclusive, with fiscal 2018 just slightly behind fiscal 2017 (-0.1%). The forecast for vehicle sales has been realigned to reflect a more normal growth rate of 1.5%.

Listed below are the DEFAC forecasts of document fee revenue through fiscal 2025.

**Projected Motor Vehicle Document Fees <sup>(1)</sup>**  
(vehicles in thousands and dollars in millions)

<u>Fiscal Year</u>	<u>Vehicles Titled</u>	<u>Change</u>	<u>Revenue</u>	<u>Percent Change</u>
2019	272,175	2.6%	\$119.3	2.6% <sup>(2)(3)</sup>
2020	276,258	1.5	121.1	1.5
2021	280,402	1.5	122.9	1.5
2022	284,608	1.5	124.7	1.5
2023	288,877	1.5	126.6	1.5
2024	293,210	1.5	128.5	1.5
2025	297,608	1.5	130.4	1.5

(1) Projections provided by DEFAC from its June 19, 2019 meeting.

(2) Percent change from fiscal 2018 actual.

(3) Reflects fee increase from \$3.75 to \$4.25 effective October 1, 2015.

## Motor Vehicle Registration Fees

### *General*

Motor vehicle registration fees are paid at the time of application for the registration of a motor vehicle and prior to the issuance of the required registration plates by the Division of Motor Vehicles. The revenue (net of refunds to other states) from this source was \$55.3 million in fiscal 2018 and constituted 11.4% of the revenue pledged to the Senior Bonds (including the 2020 Bonds), Junior Bonds and Subordinate Indebtedness issued pursuant to the Agreement.

Since October 1986, new cars can be registered for a three-year period and effective September 1990, new or used cars have had the option to renew for a two-year period. Commencing in July 2000, any newly-manufactured current model year motor vehicle or trailer with a gross registered weight of 10,000 lbs. or less not previously registered or titled in any state or country may be initially registered by the owner for five years or less. Passenger cars have paid \$20 per year since 1965 while trucks pay according to their weight. On October 1, 1991, the registration fee for commercial vehicles increased from \$2.60 to \$5.20 for each 1000 pounds or fraction thereof in excess of 5,000 pounds as part of the three year plan to increase fees in this category. On July 1, 1992 this fee was increased to \$12.00 for each such 1000 pounds or fraction thereof. The third increase to \$16.80 for each such 1000 pounds or fraction thereof became effective on July 1, 1993.

Effective October 1, 2007, passenger car registration and the base commercial registration fee increased by \$20 per year to \$40 per year. Additionally, the registration weight fee for commercial vehicles increased from \$16.80 for each 1000 pounds or fraction thereof in excess of 5,000 pounds to \$18.00 for each 1,000 pounds. Motorcycle registration increased from \$10 to \$15 annually; recreational vehicle, farm truck and trailer registrations and weight fees were also increased.

During January 1995, the Department established the Motor Carrier Service Section to support the trucking industry and entered into a base state agreement under the International Registration Plan ("IRP") for the collection and distribution of commercial registration fees for vehicles in excess of 26,000 pounds. Under IRP, commercial registration fee revenue is a function of the miles traveled in each state and the registration fee assessed by each state.



From fiscal 1985 - 2018, the average annual growth rate of registrations in the State has been 2.0% and the average annual growth rate of revenue from those registrations has been 4.6%, largely due to commercial fee increases enacted in fiscal 1992 and the various fee increases in October 2008. Registration fee revenue growth since fiscal 1987 has varied from the growth in the number of vehicles registered. In fiscal 1987 and fiscal 1988, revenue increased faster than vehicles registered, whereas in fiscal 1989 and fiscal 1990 revenue decreased while the number of vehicles registered increased. The variances are primarily due to the option, beginning in fiscal 1987, for new car owners to elect a three-year registration period. In fiscal 1991, growth in vehicles registered was flat but revenue increased 14.8% due to the implementation of a two-year registration option for used vehicles. Increases in commercial registration fees were phased in from fiscal 1992 through fiscal 1994, contributing to increases in revenue of 7.8%, 4.7% and 11.4%, respectively. The growth in registered vehicles from fiscal 2000 to fiscal 2011 was 20.8% as registrations increased to 839.7 from 695.2. This motor vehicle growth rate is directly correlated to the population growth rate in Delaware. In fiscal 2008, registration revenue grew by 31.2% largely due to the fee increases. Vehicle registration slowed, growing only 1.0%, partially due to the slowing housing market, which limited the influx of new residents entering the state and registering their vehicles. The continued poor economic conditions caused small reductions in fiscal 2009 and fiscal 2010 registration counts. However, revenues increased in both fiscal 2009 and fiscal 2010; this is possible because revenues are affected not only by the number of registrations but the type of registration and term selected. The registration term was from ¼ of a year to up to 5 years for new vehicles. In January 2018, 6 and seven-year registrations for both passenger and commercial vehicles became available.

Registration revenue continued strong in fiscal 2013 through fiscal 2018, benefitting from increased vehicle sales. Revenue was up 1.5% in fiscal 2018 and is forecasted to remain consistent through fiscal 2025 with a growth rate of 1.4% annually. There were various registration related fees increased on October 1, 2015. The out years are expected to return to the more normal 1.4% annual growth rate.

*Historical Summary of Vehicle Registrations and Revenue*

The following table shows the historical record of vehicle registrations and registration fees for the last thirty-four fiscal years:

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### History of Vehicle Registrations and Revenue

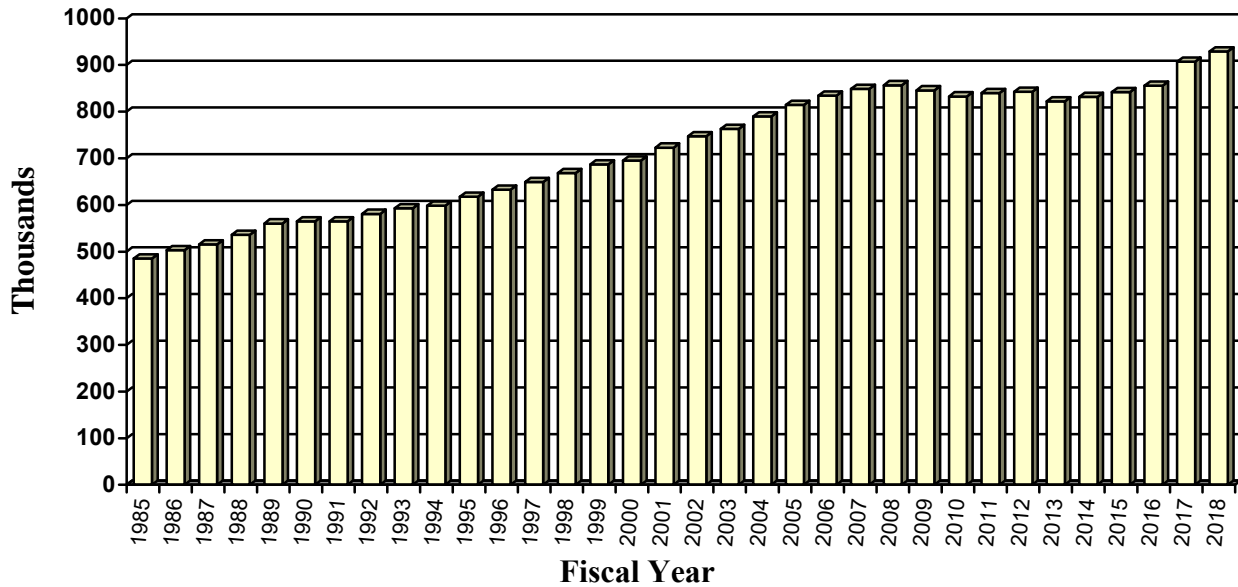
(dollars in millions, vehicle registrations in thousands,  
percent change calculated from unrounded data)

	<u>Vehicle Registration</u>	<u>Percentage Change</u>	<u>Registration Revenue</u>		<u>Percentage Change</u>
1985	485.2	--	\$ 14.2		--
1986	503.0	3.7	14.4		1.6
1987	515.7	2.5	15.3	(1)	6.5
1988	536.0	3.9	16.2		5.7
1989	560.4	4.5	15.6		(3.7)
1990	565.0	0.8	14.9		(4.3)
1991	565.1	0.0	17.1	(2)	14.8
1992	581.0	2.8	18.4	(3)	7.8
1993	592.8	2.0	19.3	(4)	4.7
1994	598.3	0.9	21.5	(5)	11.4
1995	617.7	3.2	22.2	(6)	3.3
1996	632.6	2.4	22.6	(6)	1.8
1997	649.3	2.6	23.0	(6)	1.6
1998	668.3	2.9	24.8	(6)	8.0
1999	687.1	2.8	24.2	(6)	(2.4)
2000	695.2	1.2	26.6	(6)	10.1
2001	722.9	4.0	27.0	(6)	1.0
2002	747.5	3.4	28.0	(6)	4.0
2003	762.9	2.1	27.8	(6)	(0.7)
2004	790.0	3.5	28.3	(6)	1.8
2005	814.3	3.1	30.2	(6)	6.5
2006	834.3	2.5	30.2	(6)	0.2
2007	848.6	1.7	31.5	(6)	4.1
2008	856.7	1.0	41.3	(6)(7)	31.2
2009	845.8	(1.0)	43.3	(6)	4.8
2010	832.7	(1.5)	44.5	(6)	2.8
2011	839.7	0.8	47.2	(6)	5.9
2012	842.4	0.3	46.6	(6)	(1.1)
2013	822.3	(2.4)	47.6	(6)	2.0
2014	831.7	1.1	49.2	(6)	3.4
2015	841.7	1.2	51.2	(6)(7)	3.9
2016	855.5	1.6	52.3	(8)	2.3
2017	907.4	6.1	54.5		4.2
2018	928.9	2.4	55.3		1.5

- (1) Effective October 1, 1986, new car owners had the option to register the vehicle for a three year period. Commencing on October 1, 1999, new car owners had the option to register the cars for a four-year period or a five-year period for a fee equal to \$20.00 for each year in the period.
- (2) New and used vehicle owners had the option to renew the registration for a two year period commencing September 1, 1990.
- (3) Fee increase for vehicles in excess of 5,000 pounds effective October 1, 1991.
- (4) Fee increase for vehicles in excess of 5,000 pounds effective July 1, 1992.
- (5) Fee increase for vehicles in excess of 5,000 pounds effective July 1, 1993.
- (6) Net of refunds to other states under IRP.
- (7) Various registration fee increases effective October 1, 2007.
- (8) Various registration fee increases effective October 1, 2015.

The growth of vehicle registrations in the previous table is illustrated in the following graph:

## Motor Vehicle Registrations Fiscal 1985-2018 (thousands)



### Projected Registration Fee Revenue<sup>(1)</sup> (vehicles in thousands and dollars in millions)

Fiscal Year	Vehicles	Percent Change	Revenue	Percent Change
2019	964	3.8% <sup>(2)</sup>	\$58.0	3.8% <sup>(2)(3)</sup>
2020	977	1.4	58.8	1.4
2021	991	1.4	59.6	1.4
2022	1,005	1.4	60.5	1.4
2023	1,019	1.4	61.3	1.4
2024	1,033	1.4	62.2	1.4
2025	1,048	1.4	63.0	1.4

(1) Projections provided by DEFAC from its June 19, 2019 meeting. All amounts are net of refunds for IRP.

(2) Percent change from fiscal 2018 actual.

(3) Reflects various increases for motor vehicle registration fees. Fiscal 2017 reflects first full year at increased fees.

### Miscellaneous Transportation Revenue

#### *Pledged Miscellaneous Transportation Revenue*

Motor carrier registration fees, operator license fees, titling fees, Division of Motor Vehicles record sales, vanity tag fees and other miscellaneous transportation related revenue which have been assigned by the State to the TTF and which have been pledged by the Authority to secure the bonds are herein referred to as “Pledged Miscellaneous Transportation Revenue”.

Motor carrier registration fee revenue is collected with respect to trucks registered in Delaware and totaled \$1.0 million (net of refunds) in fiscal 2018. Motor carrier registration fees are comprised of the motor fuel road use tax, hauling permits, temporary operating permits, and penalty and interest. The road use tax is calculated based upon the miles traveled in Delaware, the average miles per gallon, the actual fuel purchased in Delaware and the rate of the motor fuel tax. To the extent that fuel purchases are less than fuel used, the truckers are taxed at the current motor fuel tax rate for the difference. If fuel purchases in the State exceed the amount of fuel used while traveling roads in Delaware, refunds are made to the motor carrier.

The State charges various fees for obtaining a driver's license. Effective July 9, 2007, the fee for a five-year license to operate a passenger vehicle was increased from \$12.50 to \$25.00. Commercial drivers' licenses remained unchanged at \$30.00. The revenue from these fees was \$5.8 million in fiscal 2018. In fiscal 2013, the available term for driver's licenses was increased to a maximum of 8 years.

Prior to October 1, 2015, the Division of Motor Vehicles sold driver and vehicle records for \$15 per document and \$20 per certified document. Effective October 1, 2015, driver/vehicle records increased to \$25 per document and \$30 per certified document. Motor vehicle titling fees charged by the Division of Motor Vehicles have increased four times since fiscal 1992 as depicted in the following table. These fees generated \$13.7 million in revenue in fiscal 2018.

<u>Title Fees</u>	<u>Prior to Aug. 1, 1991</u>	<u>Aug. 1, 1991 to Sept. 30, 2007</u>	<u>Oct. 1, 2007 to Sept. 30, 2015</u>	<u>Effective Oct. 1, 2015</u>
Certificate of Title	\$ 4.00	\$15.00	\$25.00	\$35.00
Title with a Lien	\$ 6.05	\$25.00	\$35.00	\$55.00

State residents may buy "vanity" license plates for their vehicles. The current annual cost for a "vanity" license plate is \$40.00 in addition to the \$40.00 annual registration fee. There were 12,324 "vanity tags" sold in fiscal 2018, generating revenue of \$889,742. In addition to vanity tag revenue, the Department also receives other Division of Motor Vehicle revenue from the issuance of temporary tags and permits, reinstatement fees and nine other miscellaneous categories. Effective August 1, 1991, fees for temporary tags and permits each increased from \$4 to \$10. Effective October 1, 2015, the following increases went into effect:

	<u>Prior Fee</u>	<u>Increased Fee Effective Oct. 1, 2015</u>
Vehicle Temporary Tag	\$ 10.00	\$ 20.00
Duplicate Driver's License	\$ 10.00	\$ 20.00
Duplicate Vehicle Title	\$ 25.00	\$ 50.00
Late Driver's License Renewal	\$ 1.15	\$ 10.00
Driver's License Reinstatement	\$143.75	\$200.00
Retention of Vehicle Tag	\$ 10.00	\$ 20.00
Duplicate Vehicle Validation Sticker	\$ 1.00	\$ 5.00

Effective July 9, 2007, the fee for ID cards was also increased from \$5.00 to \$20.00.

#### *Historical Summary of Pledged Miscellaneous Transportation Revenue*

The following table outlines the history of revenue from these sources from fiscal 1985 through fiscal 2018.

**History of Pledged Miscellaneous Transportation Revenue**  
(dollars in millions, percent change calculated from unrounded data)

	<u>Total Pledged Miscellaneous Transportation Revenue</u>		<u>Change</u>	
1985	\$ 4.4	(1)	--	
1986	5.3	(2)	20.5	%
1987	5.8	(3)	9.4	
1988	7.1	(4)	22.4	
1989	6.3		(11.3)	
1990	7.0		11.1	
1991	7.9	(5)	12.9	
1992	12.3	(6)	55.7	
1993	13.0	(7)	5.7	
1994	12.9		(0.8)	
1995	13.9	(8)	7.8	
1996	14.6		5.0	
1997	15.5		6.2	
1998	15.7		1.3	
1999	15.8		0.6	
2000	16.4		3.5	
2001	17.4		6.2	
2002	18.2		4.4	
2003	17.3		(4.9)	
2004	19.6		13.2	
2005	24.5	(9)	25.5	
2006	24.0		(2.4)	
2007	23.8		(0.7)	
2008	29.3	(10)	23.1	
2009	27.4		(6.5)	
2010	25.7		(6.2)	
2011	27.5		7.0	
2012	28.0		2.0	
2013	27.9		(0.4)	
2014	28.6		2.5	
2015	28.4		(0.7)	
2016	38.0	(11)	33.8	
2017	42.7		12.4	
2018	40.6		(4.9)	

- 
- (1) Motor Fuel Tax increased from 9 to 11 cents on August 1, 1981.
- (2) Titling Fee increased from \$2 to \$4 effective September 1, 1985.
- (3) Motor Fuel Tax increased from 11 to 13 cents on October 1, 1986.
- (4) Motor Fuel Tax increased from 13 to 16 cents on September 1, 1987. Sale of driver and vehicle records increased from \$2 to \$4 per copy effective July 1, 1987.
- (5) Fee increases for Vanity Tags (\$25 to \$28.75), Temporary Tags (\$2 to \$4), License Reinstatement Fees (\$125 to \$143.75) and Temporary Permits (\$2 to \$2.30) on July 1, 1990.
- (6) Motor Fuel Tax increased from 16 to 19 cents effective January 1, 1991. Titling fees increased from \$4 to \$15 effective August 1, 1991. Increases in miscellaneous motor vehicle fees (Vanity Tags, Temporary Tags and Temporary Permits) became effective August 1, 1991.
- (7) Motor Fuel Tax increased from 19 to 22 cents effective September 1, 1993.
- (8) Hauling permits transferred from General Fund and rate on gasoline increased from 22 to 23 cents per gallon and special fuels increased from 19 to 22 cents per gallon effective January 1, 1995.
- (9) Driving and vehicle records increased from \$4 to \$15 per record and certified documents increased from \$8 to \$20 effective July 1, 2004.
- (10) Various fee increases effective in fiscal 2008.
- (11) Various fee increases effective October 1, 2015.

**Projected Pledged Miscellaneous Transportation Revenue<sup>(1)</sup>**  
(\$ in millions)

<u>Fiscal Year</u>	<u>Revenues</u>	<u>Percent Change</u>
2019	\$ 42.7	5.2% <sup>(2)(3)</sup>
2020	43.3	1.4
2021	43.9	1.4
2022	44.5	1.4
2023	45.1	1.4
2024	45.7	1.3
2025	46.3	1.3

(1) Projections provided by DEFAC from its June 19, 2019 meeting.

(2) Percent change from fiscal 2018 actual.

(3) Reflects HB-140 increases that became effective on October 1, 2015.

*Non-Pledged Miscellaneous Transportation Revenue*

Since 1999, escheat revenues have been appropriated by the General Assembly on a year-by-year basis and transferred to the TTF. Those appropriations have ranged from \$0 to \$40,000,000. No escheat transfers have been made since fiscal 2014 and no additional transfers are anticipated in the future. The Department has decided for planning purposes, it will assume that all future escheat payments will be discontinued. The Authority and the Department emphasize that the appropriation of the escheat monies to the TTF each year is subject to the discretion of the General Assembly and cannot be considered a reliable source of funds. See footnote (1) to the Base Financial Plan – Capital table under “TRANSPORTATION CAPITAL PROJECTS AND FINANCING PLANS – Current Financial Plan” herein.

In fiscal years 2016 through 2020, the General Assembly transferred \$5,000,000 to the TTF based on a task force recommendation to gradually revert Department operations to the State’s General Fund. Any future transfer from the General Fund for purposes of supporting Department operations will be reviewed annually, and as such, the Department again emphasizes that future appropriations to the TTF are subject to the discretion of the General Assembly and cannot be considered a reliable source of funds. See “THE TRANSPORTATION TRUST FUND – Constitutional Amendment” for a discussion of the Constitutional Amendment which limits the ability of the General Assembly to appropriate TTF funds to pay for operating costs of the Department.

During its June 1997 legislative session, the General Assembly approved the transfer of three revenue sources from the General Fund to the TTF effective during fiscal 1998. These revenue sources include: (1) the motor vehicle dealer handling fee assessed at \$2 for every vehicle sold by auto dealers; (2) the annual license fees for all motor vehicle dealers charged at \$100 per year; and (3) the motor vehicle use tax on lessees and lessors based on amount of lease payments. The tax rate for lessees is 1.92% of total amount and the rate for lessors is .288%. With the passage of Senate Bill 336 by the 144th General Assembly in fiscal 2008, the transfer of the lease tax and the transfer of the lessor’s license fee to the trust fund were repealed. In fiscal 2007, the 144th General Assembly passed House Bill 264, which became effective on January 1, 2008, adding a 50% surcharge to all Title 21 offenses. This surcharge revenue is transferred to the TTF, and at the time of enactment, it was expected that this revenue source would generate \$3.5 million annually in additional trust fund revenue. In fiscal 2018, the TTF received \$3.8 million from this revenue source.

The Department’s capital program requires the acquisition of real property in advance of actual construction. Once construction is completed, any property acquired for the project, but no longer needed,

is sold. As a by-product of this process the Department manages a portfolio of properties awaiting construction or disposal. All such lease revenues are transferred to the TTF. These revenues are not pledged. The Department has provided preliminary forecasts through fiscal 2025 for this revenue stream which are included in the table below.

In connection with the issuance by the Authority of its Transportation System Senior Revenue Bonds, Series 2010B (Federally Taxable – Build America Bonds) (the “2010B Bonds”), the Authority irrevocably elected to receive periodic interest subsidy payments from the United States Treasury on each interest payment date for the 2010B Bonds equal to 35% of the amount of interest payable on the 2010B Bonds on such date (the “BAB Subsidy Payments”). Subsequent acts of Congress have reduced direct pay subsidy payments by 6.9% in federal fiscal year 2017 and by rates which will be set from time to time – through federal fiscal year 2024. The BAB Subsidy Payments have not been pledged to the holders of the Bonds, and will be considered Non-Pledged Miscellaneous Transportation Revenue. Such payments are not reflected in the projections for Non-Pledged Miscellaneous Transportation Revenue contained in this Official Statement.

*Projections of Miscellaneous Transportation Revenue*

Current Dedicated Sources. Projections for “Miscellaneous Transportation Revenue” through fiscal 2025 are shown below.

**Projected Miscellaneous Transportation Revenue**  
(dollars in millions)

<u>Fiscal Year</u>	<u>Pledged Miscellaneous Transportation Revenues</u> <sup>(1)</sup>	<u>Non-Pledged Miscellaneous Transportation Revenues</u> <sup>(2)</sup>	<u>Total Miscellaneous Transportation Revenue</u>	<u>Change</u>
2019	\$ 42.7	\$ 12.6	\$ 55.3	2.0% <sup>(3)</sup>
2020	43.3	12.6	55.9	1.1
2021	43.9	12.6	56.5	1.1
2022	44.5	12.7	57.2	1.2
2023	45.1	12.7	57.8	1.0
2024	45.7	12.7	58.4	1.0
2025	46.3	12.7	59.0	1.0

(1) Provided by DEFAC from its June 19, 2019 meeting. Includes IFTA/Motor Carrier Fees, vanity tags, record sales, titles and other motor vehicle related fees, net of IFTA and DMV refunds.

(2) Not pledged by the Authority to secure the Bonds. Excludes the tolls from Route 1 Toll Road and the Delaware Transit Corporation farebox. Includes escheat revenue, real estate lease and sales proceeds, use tax on motor vehicle leases, motor vehicle handling and license fees, and development plan review fees, and various other transfers to the TTF. The BAB Subsidy Payments expected to be received by the Authority are considered Non-Pledged Miscellaneous Transportation Revenues, but have not been included in this table.

(3) Percent change from fiscal 2018 actual.

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## Projected Total Revenue Sources

The following table shows in the aggregate for fiscal years 2019 through 2025 the projections of total Pledged Revenue and Non-Pledged Revenue.

### Projected Total Revenue Sources<sup>(1)</sup> (dollars in millions)

<u>Fiscal Year</u>	<u>Pledged Revenue<sup>(2)</sup></u>	<u>Percent Change</u>	<u>Non-Pledged Revenue<sup>(3)</sup></u>	<u>Percent Change</u>	<u>Total</u>	<u>Percent Change</u>
2019	\$ 511.3	5.2% <sup>(4)</sup>	\$ 95.6	2.8% <sup>(4)</sup>	\$ 606.9	4.8% <sup>(4)</sup>
2020	517.4	1.2	97.6	2.1	615.0	1.3
2021	524.0	1.3	99.6	2.0	623.6	1.4
2022	530.4	1.2	101.7	2.1	632.1	1.4
2023	536.2	1.1	103.7	2.0	639.9	1.2
2024	543.1	1.3	105.5	1.7	648.6	1.4
2025	549.4	1.2	107.3	1.7	656.7	1.2

(1) Delaware Turnpike toll and concession revenue, investment earnings, Route 1 Toll Revenue, motor fuel revenue, motor vehicle document fee revenue, motor vehicle registration fee revenue, Pledged Miscellaneous Transportation Revenue and Non-Pledged Miscellaneous Transportation Revenue projected by DEFAC from its June 19, 2019 meeting.

(2) Includes Delaware Turnpike Revenues, motor fuel tax revenues, motor vehicle document fee revenue, motor vehicle registration fee revenue, Pledged Miscellaneous Transportation Revenue and investment earnings.

(3) Route 1 Toll Revenue, escheat revenues and other Non-Pledged Miscellaneous Transportation Revenues. See discussion of escheat revenue under "SECURITY FOR THE BONDS – Non-Pledged Revenue" herein. Does not include Delaware Transit Corporation farebox transit revenue. The BAB Subsidy Payments expected to be received by the Authority are considered Non-Pledged Miscellaneous Transportation Revenues, but have not been included in this table. Also, Port of Wilmington loan repayments are not included.

(4) Percent change from fiscal 2018 actual.

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## DEBT SERVICE REQUIREMENTS

The following table summarizes debt service requirements for the Authority's outstanding Senior Bonds, as well as the 2019 Bonds in each fiscal year ending June 30 (assuming July 1 payments are made on the previous June 30). No Junior Bonds are outstanding. The table below does not take into account outstanding Subordinate Indebtedness under the Agreement.

Fiscal Year	Prior Outstanding Senior Bonds Debt Service <sup>(1)</sup>	2019 Senior Bonds		Total Senior Bonds Debt Service <sup>(1)(2)</sup>
		Principal	Interest	
2020	\$ 87,885,605	\$ 1,625,000	\$4,527,677	\$94,038,282
2021	82,089,055	4,535,000	5,520,000	\$92,144,055
2022	77,205,295	4,770,000	5,293,250	\$87,268,545
2023	70,125,023	5,015,000	5,054,750	\$80,194,773
2024	61,899,238	5,270,000	4,804,000	\$71,973,238
2025	53,720,930	5,540,000	4,540,500	\$63,801,430
2026	41,168,395	5,825,000	4,263,500	\$51,256,895
2027	32,861,175	6,125,000	3,972,250	\$42,958,425
2028	32,753,825	6,435,000	3,666,000	\$42,854,825
2029	29,447,465	6,765,000	3,344,250	\$39,556,715
2030	12,614,755	7,115,000	3,006,000	\$22,735,755
2031	4,987,700	7,480,000	2,650,250	\$15,117,950
2032	4,991,050	7,860,000	2,276,250	\$15,127,300
2033	4,990,650	8,180,000	1,883,250	\$15,053,900
2034	4,991,500	8,430,000	1,637,850	\$15,059,350
2035	4,988,450	8,690,000	1,384,950	\$15,063,400
2036	4,991,500	8,950,000	1,124,250	\$15,065,750
2037	4,990,350	9,225,000	855,750	\$15,071,100
2038		9,505,000	579,000	\$10,084,000
2039		9,795,000	293,850	\$10,088,850
Total <sup>(2)</sup>	<u>\$616,701,960</u>	<u>\$137,135,000</u>	<u>\$60,677,577</u>	<u>\$814,514,537</u>

<sup>(1)</sup> The interest shown on the above table includes the total amount of interest on the Authority's Build America Bonds issued in 2010, that is, it does not take into account the BAB Subsidy Payments expected to be received.

<sup>(2)</sup> Totals may not add due to rounding.

## RISK FACTORS

The following is a discussion of certain risk factors that should be considered in evaluating an investment in the 2019 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 2019 Bonds in addition to those set forth herein.

## **Limited Obligations**

The 2019 Bonds are limited obligations of the Authority payable solely from and secured by a pledge of the Pledged Revenue. Other than the pledge of the Pledged Revenue, the Authority has not mortgaged, assigned or pledged any interest in any real or personal property or improvements as security for payment of the 2019 Bonds.

## **Ability to Maintain or Raise Rates**

The Authority may need to raise toll rates in the future above the current toll rate schedule to support its debt service requirements. Although the Transportation Consultant's Traffic Report suggests there is an ability to raise rates further, the effect of any future rate increase is unknown. It is possible that a future increase in rates could result in reduced usage of the Delaware Turnpike, resulting in decreased Pledged Revenue. Additionally, political pressure could result in hesitance by the Authority to raise rates further if needed.

## **Motor Fuel Prices and Taxes**

There is no assurance that motor fuel will remain in adequate supply or that motor fuel prices and federal and State motor fuel taxes will not increase. Increases in motor fuel pump prices could negatively impact the Pledged Revenue of the Authority. Additionally, if motor fuel prices increase, it could have a material adverse effect on the economy of the region and the Pledged Revenue of the Authority.

## **Dilution of Pledged Revenue**

The Agreement permits the Authority, subject to certain conditions, to issue from time to time, additional senior revenue bonds, junior revenue bonds or subordinated indebtedness as described in "SECURITY FOR THE BONDS – Additional Senior Bonds, – Additional Junior Bonds, – Subordinate Indebtedness," and in "APPENDIX A – SUMMARY OF CERTAIN PROVISIONS OF THE AGREEMENT." In addition, under certain conditions, the debt service reserve fund and operating reserve fund requirements under the Agreement may be increased. Such additional senior revenue bonds, junior revenue bonds or subordinated indebtedness and any increases in debt service reserve fund or operating reserve fund requirements may impact the amount of Pledged Revenue that is available to pay debt service on the 2019 Bonds. See "APPENDIX A – SUMMARY OF CERTAIN PROVISIONS OF THE AGREEMENT."

## **Technological and Societal Changes**

Neither the Authority nor the Transportation Consultant can predict the technological and societal changes that may affect the use of the Delaware Turnpike during the period that the 2019 Bonds remain Outstanding. Societal changes may include, for example, the increased use of telecommuting. Higher levels of telecommuting could have an adverse impact on usage of the Delaware Turnpike. Technological advancements may include broadening the use of electric vehicles, which, together with more stringent air quality standards, could change the characteristics of vehicles on the road. The development of new types of switchable transponders and other technological advances may significantly change the way toll revenue of the Delaware Turnpike is collected. Other technologies or societal changes could have a similar detrimental effect on the Delaware Turnpike and the generation of Pledged Revenue.

## **Cyber-Attack Security**

As a repository for personal, private and sensitive information, Delaware has an information security program in place for data and system protection. This program includes business continuity capabilities to ensure the availability of the systems and information that deliver essential services to the citizens of Delaware. Delaware has a centrally managed cyber security team that provides a threat detection

and response service to protect each branch of government, including DelDOT. The team continuously monitors threat intelligence sources to prevent and mitigate cyber incidents. Delaware has perimeter and internal protections across the State's centralized network. State computers are equipped with Endpoint protection software with built-in breach detection and response capabilities. The State's cyber security risk management program encompasses employee training, vulnerability scanning, simulated phishing campaigns and targeted third-party penetration assessments. Additionally, vendors that interface with the State's systems are required to take appropriate security measures.

While the State conducts periodic tests and reviews of its networks, no assurances can be given that such security and operational control measures will be successful in guarding against all cyber threats and attacks. The results of any successful attack on the State's computers and information technology systems could impact its operations and damage the State's digital networks and systems, and the costs of remedying any such damage could be substantial and could have a material impact on the operations of the State.

It is the policy of the State to self-insure its exposures when cost effective and commercially insure on exposures that are specialized.

### **Market Liquidity Risks**

Two credit rating agencies have been engaged to assign credit ratings to the 2019 Bonds. A rating is not a recommendation to purchase, hold or sell the 2019 Bonds, and does not address the market price or suitability of the 2019 Bonds for a particular investor. A rating on the 2019 Bonds may not remain for any given period of time and may be lowered or withdrawn depending on, among other things, each rating agency's assessment of the credit strength of the Pledged Revenue.

The Authority has been informed by the Underwriters that they intend to make a market in the 2019 Bonds after the completion of this offering; however, the Underwriters are not required to make a market in the 2019 Bonds, and they may cease market-making at any time without notice. The Authority cannot assure potential investors that an active market for the 2019 Bonds will develop. Even if a market for the 2019 Bonds does develop, depending on prevailing interest rates and market conditions generally, the 2019 Bonds could trade at a discount from their initial offering price. Holders of the 2019 Bonds may not be able to sell their 2019 Bonds in the future or such sale may not be at a price equal to or greater than the initial offering price of the 2019 Bonds. As a result, holders of the 2019 Bonds may not be able to liquidate their investment quickly or to liquidate it at an attractive price or at all.

### **Forward-Looking Statements**

This Official Statement and Appendices hereto contain "forward-looking statements," which generally can be identified with words or phrases such as "anticipates," "believes," "could," "estimates," "expects," "foresees," "may," "plan," "predict," "should," "will" or other words or phrases of similar import. All statements included in this Official Statement and Appendices hereto that any person expects or anticipates will, should or may occur in the future, including but not limited to, the projections in the Transportation Consultant's Traffic Report, are forward-looking statements. These statements are based on assumptions and analysis made by the Authority and the Transportation Consultant, as applicable, in light of their experience and perception of historical trends, current conditions and expected future developments as well as other factors they believe are appropriate in the circumstances. However, whether actual results and developments will conform with expectations and predictions is subject to a number of risks and uncertainties, including, without limitation, the information discussed under this "RISK FACTORS" caption of this Official Statement as well as additional factors beyond the Authority's control. The important risk factors and assumptions described under this caption and elsewhere in this Official Statement could cause actual results to differ materially from those expressed in any forward-looking statement. All of the forward-looking statements made in this Official Statement and any Appendices hereto are qualified by these cautionary statements. There can be no assurance that the actual results or developments anticipated will be realized or, even if substantially realized, that they will have the expected consequences to or effects

on the Authority's revenues or operations. All forward-looking statements attributable to the Authority or persons acting on their behalf are expressly qualified in their entirety by the factors and assumptions described above and in any documents containing those forward-looking statements. All forward-looking statements included in this Official Statement are based on information available to the Authority and the other aforementioned entities on the date hereof, and neither the Authority nor any of such other aforementioned entities assumes any obligation to update any such forward-looking statements.

The forward-looking statements herein are necessarily based on various assumptions and estimates that are inherently subject to numerous 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, suppliers, business partners and competitors, 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, therefore, there can be no assurance that the forward- looking statements included in this Official Statement will prove to be accurate.

## **TRANSPORTATION CAPITAL PROJECTS AND FINANCING PLANS**

### **Capital Transportation Program**

The Capital Transportation Program is a six-year planning document which is updated bi-annually by the Department, coordinated with the three Metropolitan Planning Organizations ("MPOs"), approved by the Council on Transportation and the first year of which is authorized by the General Assembly.

The Capital Transportation Program is presented as a plan to the Council on Transportation (the "Council" or "COT"), a nine-member citizen committee created by State law to serve as an advisor with respect to transportation matters to the Governor, the Secretary and the Authority. The Council has final approval of and adopts the Capital Transportation Program after holding public hearings. The Council may make priority changes to the proposed Capital Transportation Program in an open meeting by documenting the reasons and justifications for the changes. If the Council fails to adopt a Capital Transportation Program after a reasonable period of time, the Secretary may, with the approval of the Governor and with forty days prior written notice to the Chairperson of the Council, give final approval to the Capital Transportation Program. The first year is the basis for the Department's portion of the State's annual capital budget, which must be enacted into law before being implemented.

In preparing its capital spending plans through fiscal 2024, the Department has formulated its Capital Transportation Program by purpose and function for all modes of transportation. Listed below are the names and descriptions of each category which include transportation investments for all modes:

<i>Road System:</i>	Improvements to roads, bridges, and adjacent assets;
<i>Grants and Allocations:</i>	Municipal Street Aid and Community Transportation Funds;
<i>Transit System:</i>	Investments in transit services including buses, rail, facilities, and other assets supporting transit users;
<i>Support System:</i>	All other investments in the transportation network including facilities, equipment, information systems, etc.

As described above, the Department prepares estimates of capital needs for the current year and also for the ensuing years in the Capital Transportation Program. The Department, however, cannot undertake or commit to projects in the proposed six-year program without specific authorization by the State.

### **Implementation of New Project Prioritization Process**

In fiscal 2014, the Department began using Decision Lens Software (“Decision Lens”) to aid in the project prioritization process. Decision Lens allows the Department to use a more transparent, structured, and data driven decision process to achieve the organization’s goals and mission. In using the software, the Department can define and prioritize the criteria used to rank projects using specific weighted goals. The result is a qualitative and quantitative rating system that measures projects against established priorities.

The current priorities evaluated include: system operating effectiveness, safety, environmental impact/stewardship, revenue generation/economic development/jobs & commerce, multi-modal mobility, and the impact on the public and system preservation. Department leadership can easily evaluate alternatives, make decisions, justify those decisions and change course quickly when needed.

This process improves communication between the officials, government, and citizens while increasing decision efficiency, buy-in, and transparency. The software also provides the ability to quickly model various “what-if” scenarios to quickly react to what the future may bring, resulting in a process that is proactive and defensible.

### **MAP-21**

On July 6, 2012, President Obama signed into law P.L. 112-141, the Moving Ahead for Progress in the 21st Century Act (MAP-21). MAP-21 provides needed funds and represents a milestone for the U.S. economy:

- The first multi-year transportation authorization enacted since 2005 - The bill provides states two years of steady funding to build the roads, bridges and transit systems.
- Funds surface transportation programs at over \$105 billion for fiscal years 2013 and 2014
- Transforms the framework for investments to guide the growth and development of the country’s vital transportation infrastructure.

### **FAST-Act**

The Fixing America’s Surface Transportation (FAST) Act, signed into law by President Barack Obama in December 2015, authorizes approximately \$305 billion in federal highway and transit spending over the next five years for transportation projects. The FAST Act provides much needed certainty for states, transit agencies and other local agencies to move forward with critical transportation infrastructure projects. This is the longest duration of a surface transportation bill in over a decade and will provide increased stability to DelDOT’s federal capital program. The anticipated impact to the State is a 5.1% increase in formula funding in fiscal 2016, on average, a \$15 million per year increase, with a total five-year impact of \$75 million.

### **Capital Program – Long Range Financial Planning**

In fiscal 2012, DelDOT introduced its new initiative “TEAM DelDOT” with the intent of revitalizing the organization through the creation of a **T**ransparent, **E**fficient, **A**ccountable and **M**easured DelDOT. The goals of the initiative are as follows:

- *Transparent* – posting property acquisitions on the DelDOT website for public view;
- *Efficient* – providing quick and precise responses to earthquake and hurricane threats, and ensuring that projects are delivered on time and on budget;

- *Accountable* – providing DelDOT’s performance metrics with the public via the new “dashboard” on the DelDOT website; and
- *Measured* – aiming to provide improved customer service which can be measured with established performance metrics.

During this same time, DelDOT proposed a different way of conducting business. Rather than program all of the projects DelDOT can afford, the new Capital Transportation Program will be based on what DelDOT can responsibly and realistically deliver. The Capital Transportation Program will focus on maintaining the core transportation infrastructure, and maximizing Federal Funds, before considering advancing the Capital Transportation Program. DelDOT’s commitment to reducing its \$1.2 billion debt load and tightening spending priorities has decreased outstanding Senior Revenue debt to \$700.5 million at the end of fiscal 2018. US 301 Toll Revenue Bond debt at the end of FY2018 was \$212.5 million.

During fiscal 2015, Secretary Cohan continued the debt-reduction strategy and was instrumental in gaining legislative approval of a new revenue package for the Transportation Trust Fund in fiscal 2016. The revenue package focused on increased Department of Motor Vehicle fees and is forecasted to generate \$25 million annually for the TTF. The new fees were implemented on October 1, 2015. As a result of receiving new pledged revenue, DelDOT has been authorized to borrow up to \$25 million annually for its capital program. In FY2017, \$75 million was issued. In FY2020, with ample additional borrowing capacity, the decision was made to increase borrowing to continue building and maintaining the infrastructure, resulting in a new-money issuance of \$160.0 million. The \$25 million annual borrowing is forecasted to continue with borrowing of \$75.0 million in fiscal years 2021 and 2024.

## **Federal Funds**

### *Level of Funding*

The State has benefited from authorizations granted under federal laws. In fiscal 2018, the State received approximately \$190 million in FHWA and Federal Transportation Administration (“FTA”) apportionments under the legislation.

The total federal funding anticipated under the fiscal 2020-2025 plan will be approximately \$1.51 billion.

### *Application of Innovative Financing Techniques*

As part of its capital programming process, the Department is currently reviewing the timing of federal apportionments to determine the potential expanded use of certain innovative financing techniques available with federal funding. The Department is currently making use of “advanced construction” in the programming of federal funds in an effort to accelerate some projects.

The Department has also performed a toll credit analysis and received FHWA approval of \$197.8 million in state toll credits. The State’s credits can be applied toward the non-Federal share of projects authorized under Title 23. The credits may also be used for transit projects authorized by Chapter 53 of Title 49. The Department has identified eligible projects and has received Federal approval of the projects and has started to utilize the credits.

To help finance the new U.S. 301 Project, DelDOT applied for and received a Transportation Infrastructure Finance and Innovation Act Program (TIFIA) loan from the Federal Department of Transportation in an amount not to exceed \$211,350,000. The loan closed on December 3, 2015 at an interest rate of 2.94%.

## U.S. 301 Project

The new U.S. 301 Mainline is a four-lane tolled expressway from the Maryland state-line to Delaware SR1, south of the C&D Canal. This 14-mile roadway completed the “missing link” of limited access high speed roadway, designed to intercept existing traffic flows on US 301. It is expected that this road will provide a low cost, competitive route to I-95 through the Baltimore region and reduce traffic and congestion on local roadways in Middletown, Delaware. This limited access high-speed option facilitates long-distance travel passing through Middletown, Delaware, retain long-haul truck traffic on the toll road, and provide enhanced access with direct connections to the C&D Canal Bridges.

In December 2015, the Department and the Authority secured the final funding for the U.S. 301 Project with the following bond issues, both of which are Subordinate Indebtedness under the Agreement:

<p><b>\$212,535,000 U.S. 301 Project Revenue Bonds, Series of 2015 (the “Sr. 301 Bonds”)</b></p> <ul style="list-style-type: none"> <li>• 40 year maturity;</li> <li>• senior lien on revenues generated from new U.S. 301 toll road;</li> <li>• enhanced by a subordinate lien on the Pledged Revenue under the Agreement</li> </ul>	<p><b>Use of Sr. 301 Bond Proceeds</b></p> <ul style="list-style-type: none"> <li>(i) finance only that portion of the U.S. 301 Project that consists of the construction and equipping of the new U.S. 301 Mainline;</li> <li>(ii) pay capitalized interest on the Sr. 301 Bonds during construction;</li> <li>(iii) make a deposit to the debt service reserve fund; and</li> <li>(iv) pay the costs associated with financing the Sr. 301 Bonds</li> </ul>
<p><b>Up to \$211,350,000 Subordinated U.S. 301 Project Revenue Bonds, TIFIA Series of 2015 (the “TIFIA 301 Bond”)</b></p> <ul style="list-style-type: none"> <li>• matures the earlier of 35 years from substantial completion date or December 31, 2053;</li> <li>• subordinate lien on revenues generated from new U.S. 301 toll road;</li> <li>• enhanced by a subordinate lien on the Pledged Revenue under the Agreement</li> </ul>	<p><b>Use of TIFIA 301 Bond Proceeds</b></p> <ul style="list-style-type: none"> <li>(i) finance eligible costs of the U.S. 301 Project</li> </ul>

At 85-100% of the traffic and revenue forecast for U.S. 301, there is no negative impact on the TTF and on U.S. 301 generating sufficient revenues to pay debt service on the Sr. 301 Bonds and the TIFIA 301 Bond. This plan has sufficient revenues to cover all debt-service payments, the operating and maintenance expenses of the road and also fund a capital expense reserve account. At various levels throughout the 40 year term excess revenues are forecasted to be available to the TTF. There can be no assurance, however, that at lower traffic levels there would not be a financial impact on the TTF. US 301 opened to traffic on January 10, 2019 and so far, based on traffic statistics appears to be on track to meet the current revenue forecast.

## Grant Anticipation Revenue Vehicle (GARVEE) Bond Issue

In June 2010, the Authority utilized the GARVEE Bond Program, under which the cost of the debt service is paid from federal funds. The GARVEE bonds sold by the Authority are backed by the annual federal appropriations for federal-aid transportation projects and carry a 15-year term. The Authority was able to issue these bonds without the additional backing or pledge of any TTF revenues.

The Authority sold a total of \$113,490,000 (par value) in bonds, and received an additional \$12,455,753.90 in premiums resulting in total proceeds of just under \$126 million. The net proceeds from the bond sale were used for the completion of the design and the real estate acquisition for the U.S. 301

Project. As of March 15, 2012, the underlying bond documents pertaining to the GARVEE bonds were amended to allow proceeds of the GARVEE bonds to also be used for payment of the costs associated with the construction and equipping of the U.S. 301 Project.

Through the use of additional innovative credit enhancements, the Department successfully structured the GARVEE bonds to protect the bondholders, preserve the integrity and high credit rating of the TTF and achieve a rating of “AA” and “Aa2” by Standard & Poor’s and Moody’s Investor Services, respectively. In November 2012 and again in June 2014, Moody’s downgraded the GARVEE bonds to “Aa3” and “A1”, respectively.

### **Diamond State Port Corporation/GT USA Wilmington LLC**

The Capital Transportation Program for fiscal 2002 contained a \$27,500,000 loan which the TTF made to the Diamond State Port Corporation (the “Port Corporation”) to enable the Port Corporation to prepay or refinance certain obligations which it owed to the City of Wilmington related to the Port Corporation's acquisition of the Port of Wilmington from the City. The Port Corporation was obligated to repay the loan to the TTF over a 20-year term, which commenced in January, 2003. The Port Corporation has not performed its obligations with respect to the loan, and therefore the loan has subsequently been restructured three times.

Due to the multiple restructurings and the uncertainty of future payments, the Authority recorded a loss of \$20,297,835 for the year ended June 30, 2010 on the impairment of the loan receivable. This however, will not impede the Authority’s ability to receive future loan repayments.

Since the last restructuring, the Port Corporation has made all scheduled payments in a timely manner up through FY2018. The loan principal and interest payments are currently deferred through fiscal 2020.

In September 2018, the Port Corporation signed a Concession Agreement with GT USA Wilmington, LLC (GT) which allows GT the right to commercially redevelop and operate the existing Port facilities and to develop, finance and operate new port facilities at Edgemoor for a term of 50 years. In exchange for GT’s rights to operate, the Port Corporation will receive an annual concession fee and the Port Corporation and the State are released from further commitments to capital or operating funding. The Agreement closed on October 3, 2018. Under the Concession Agreement, GT assumed the obligation to make the loan payments to the TTF subject to certain deferral conditions.

### **Line of Credit**

In November 2013, the Authority issued its General Obligation Note, Series 2013 (Revolving Line of Credit) (the “2013 Note”) to PNC Bank, National Association (the “Bank”) in a maximum principal amount of \$50,000,000. Under the terms of the 2013 Note, the Authority can request advances during the revolving period, which expires on November 8, 2019 (the “Revolving Period”). The line of credit is available to meet short-term cash flow needs when revenue receipts are not sufficient to cover current capital expenditures; it cannot be used for any debt-service or operating expenses.

Amounts advanced under the 2013 Note that are repaid may be advanced again during the Revolving Period, but the aggregate principal outstanding at any one time may not exceed \$50,000,000. Principal on all amounts advanced is due on November 8, 2019 unless the Authority elects to convert the outstanding aggregate amount of advances made during the Revolving Period to a fixed-rate, term loan for an additional term of up to 5 years. The 2013 Note bears interest on the amount which has been advanced from time to time at an annual rate equal to:  $(80\% \times \text{Daily LIBOR Rate}) + 0.67\%$ . An annual unused fee equal to 0.125% on any undrawn portion of the note is charged by the bank to the Authority quarterly in arrears during the revolver term. Amounts due under the 2013 Note are unsecured general obligations of the



Authority. The Authority may pre-pay any outstanding balance due under the 2013 Note at any time without penalty. To date, the Authority has not requested any advance under the 2013 Note.

### **Current Financial Plan**

The revenue sources described earlier are combined with the proceeds of the Transportation System Revenue Bonds and support from the federal government to fund the Department's total transportation budget - both operating and capital. The Department updates its six-year financial plan concurrent with the preparation of the annual operating and capital budgets.

The current financial plan assumes that the existing sources of revenues will meet projections without any further increases in the rates. In the event revenues or other sources fall short of projections, the Department will either request additional revenues from the General Assembly, reduce the transportation program or a combination of both.

The table on the following page shows the anticipated financing plan assuming that the full implementation of the proposed Capital Transportation Program is approved by the State.

**Base Financial Plan - Capital**  
**Fiscal 2019 – Fiscal 2025 June DEFAC w/Borrowing**  
(\$ in 000s)

<b>Sources of Funds</b>	<b>2019</b>	<b>2020</b>	<b>2021</b>	<b>2022</b>	<b>2023</b>	<b>2024</b>	<b>2025</b>
<b>Existing Pledged Revenue</b>							
I-95 Tolls & Concessions	144,900	146,400	147,800	149,400	150,900	152,400	153,900
Motor Fuel Tax Admin.	144,400	145,800	147,300	148,800	150,300	151,800	153,300
DMV Fees	218,000	221,200	224,400	227,700	231,000	234,400	237,700
Interest Income	<u>4,000</u>	<u>4,000</u>	<u>4,500</u>	<u>4,500</u>	<u>4,000</u>	<u>4,500</u>	<u>4,500</u>
<b>Total Pledged Revenue</b>	<b>511,300</b>	<b>517,400</b>	<b>524,000</b>	<b>530,400</b>	<b>536,200</b>	<b>543,100</b>	<b>549,400</b>
<b>Non-Pledged Revenues</b>							
SR 1 Tolls	64,000	65,000	66,000	67,000	68,000	68,800	69,600
DE Transit (Farebox, FTA, & Other)	27,102	27,544	27,995	28,454	28,924	29,502	30,093
Port of Wilmington - Refinancing	0	0	1,049	1,091	1,135	1,181	1,228
Build America Bond Subsidy Payment	1,199	1,263	1,190	1,110	1,026	935	839
Other Transportation Revenue	12,600	12,600	12,600	12,700	12,700	12,700	12,700
Special Fund Transfers	<u>-6,600</u>	<u>-6,700</u>	<u>-6,800</u>	<u>-6,900</u>	<u>-7,000</u>	<u>-7,000</u>	<u>-7,000</u>
<b>Total Non-Pledged Revenue</b>	<b>98,301</b>	<b>99,707</b>	<b>102,034</b>	<b>103,455</b>	<b>104,785</b>	<b>106,118</b>	<b>107,460</b>
<b>Total Sources of Funds</b>	<b>609,601</b>	<b>617,107</b>	<b>626,034</b>	<b>633,855</b>	<b>640,985</b>	<b>649,218</b>	<b>656,860</b>
<b>Uses of Funds</b>							
<b>Debt Service</b>							
DTA Bonds & Notes	93,099	87,886	82,089	77,205	70,125	61,889	53,720
Senior Bonds	93,099	87,886	82,089	77,205	70,125	61,889	53,720
New Debt Service	0	0	11,424	17,861	17,861	17,861	24,299
<b>Total Debt Service</b>	<b>93,099</b>	<b>87,886</b>	<b>93,513</b>	<b>95,066</b>	<b>87,986</b>	<b>79,750</b>	<b>78,019</b>
<b>Operations</b>							
Department Operations	157,763 <sup>(1)</sup>	165,927 <sup>(1)</sup>	170,905 <sup>(1)</sup>	176,032 <sup>(1)</sup>	181,313 <sup>(1)</sup>	186,752 <sup>(1)</sup>	192,355 <sup>(1)</sup>
Delaware Transit Corp. Operations (Adj.)	<u>120,284</u>	<u>122,348</u>	<u>128,465</u>	<u>134,889</u>	<u>141,633</u>	<u>148,715</u>	<u>156,150</u>
<b>Total Operations</b>	<b>278,047</b>	<b>288,275</b>	<b>299,370</b>	<b>310,921</b>	<b>322,946</b>	<b>335,467</b>	<b>348,505</b>
<b>Total Uses of Funds Before Capital</b>	<b>\$371,146</b>	<b>\$376,161</b>	<b>\$392,883</b>	<b>\$405,987</b>	<b>\$410,932</b>	<b>\$415,218</b>	<b>\$426,524</b>
<b>State Resources Available for Capital</b>							
Beginning Capital Cash Balance	20,000	20,000	20,000	20,000	20,000	20,000	20,000
Carry-over Cash Balance	66,932	13,026	33,972	26,123	0	0	50,000
Federal Funds	230,000	280,000	250,000	250,000	250,000	250,000	225,000
Bond Proceeds		160,000	75,000	0	0	75,000	0
<b>DSR Release</b>	<b>16,139</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>	<b>0</b>
<b>Total Funds Available for Capital Expenditures</b>	<b>\$571,526</b>	<b>\$713,972</b>	<b>\$612,123</b>	<b>\$523,991</b>	<b>\$500,053</b>	<b>\$579,001</b>	<b>\$525,335</b>
<b>Less:</b>							
State Capital Expenditures	\$238,455	\$380,000	\$308,151	\$227,868	\$230,053	\$259,001	\$230,335
Carry-over Encumbrance Spend	70,045		7,849	26,123	0		25,000
Federal Capital Expenditures	219,017	269,012	239,026	239,007	239,045	238,983	214,076
GARVEE Debt-Service (Federal)	10,983	10,988	10,974	10,993	10,955	11,017	10,924
<b>Total Capital Spending</b>	<b>\$538,500</b>	<b>\$660,000</b>	<b>\$566,000</b>	<b>\$503,991</b>	<b>\$480,053</b>	<b>\$509,001</b>	<b>\$480,335</b>
Sub-Total	33,026	53,972	46,123	20,000	20,000	70,000	45,000
Carry Over Cash	13,026	33,972	26,123	0	0	50,000	25,000
<b>Ending Capital Cash</b>	<b>\$20,000</b>	<b>\$20,000</b>	<b>\$20,000</b>	<b>\$20,000</b>	<b>\$20,000</b>	<b>\$20,000</b>	<b>\$20,000</b>
<b>Pay Go Revenue</b>	\$238,455	\$240,946	\$233,151	\$227,868	\$230,053	\$234,001	\$230,335
<b>State Capital</b>	308,500	380,000	316,000	253,991	230,053	259,001	255,335
<b>Pay Go Percentage</b>	77.3%	63.4%	73.8%	89.7%	100.0%	90.3%	90.2%
<b>Additional Senior Bond Test</b>	5.45	5.84	5.56	5.53	6.05	6.75	6.98

Source: Revenue forecasts for all Fiscal Years derived from DEFAC forecasts from its June 19, 2019 meeting. Fiscal 2019 expenditure forecast derived from DEFAC forecast from its June 19, 2019 meeting; expenditure forecasts for fiscal years 2020-2025 prepared internally by the Department based on an assumed growth rate of 3% for the Department and 5% for the Delaware Transit Corporation.

(1) Net of \$5 million of General Fund support for Department operations.

## BOOK-ENTRY ONLY SYSTEM

*Portions of the following information concerning The Depository Trust Company (“DTC”) and DTC’s book-entry-only system have been obtained from DTC. The Authority, the Financial Advisor, and the Underwriters make no representation as to the accuracy of such information.*

Initially, DTC will act as Securities Depository for the 2019 Bonds. The 2019 Bonds initially will be issued solely in book-entry form to be held under DTC’s book-entry only system, registered in the name of Cede & Co. (DTC’s Partnership nominee) or such other name as may be requested by an authorized representative of DTC. One fully-registered 2016 Bond certificate will be issued for each maturity and interest rate of the 2019 Bonds, in the aggregate principal amount of the 2019 Bonds of such maturity and interest rate, 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 a 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). So long as the 2019 Bonds are maintained in book-entry form with DTC, the following procedures will be applicable with respect to the 2019 Bonds.

Purchases of the 2019 Bonds under the DTC system must be made by or through Direct Participants, which will receive a credit for the 2019 Bonds on DTC’s records. The ownership interest of each actual purchaser of each 2019 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 Owner entered into the transaction. Transfers of ownership interests in the 2019 Bonds are to be accomplished by entries made on the books of Direct and Indirect Participants acting on behalf of Beneficial Owners. Beneficial Owners will not receive certificates representing their ownership interests in 2019 Bonds, except in the event that use of the book-entry system for the 2019 Bonds is discontinued.

To facilitate subsequent transfers, all 2019 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 2019 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 2019 Bonds; DTC’s records reflect only the identity of the Direct Participants to whose accounts such 2019 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.

As long as the book-entry system is used for the 2019 Bonds, redemption notices will be sent to Cede & Co. If less than all of the 2019 Bonds within a maturity and interest rate are being redeemed, DTC's practice is to determine by lot the amount of the interest of each Direct Participant in such maturity to be redeemed.

As long as the book-entry system is used for the 2019 Bonds, principal or redemption price of, and interest payments on, the 2019 Bonds will be made to DTC. DTC's practice is to credit Direct Participants' accounts on the payable date in accordance with their respective holdings shown on DTC's records unless DTC has reason to believe that it will not receive payment on the payable date. 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 Participant and not of DTC, the Trustee or the Authority, subject to any statutory or regulatory requirements as may be in effect from time to time. Payment of principal or redemption price and interest to DTC is the responsibility of the Authority or the Trustee, 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. Beneficial Owners of the 2019 Bonds may wish to take certain steps to augment the transmission to them of notices of significant events with respect to the 2019 Bonds, such as redemptions, tenders, defaults, and proposed amendments to the financing documents. For example, Beneficial Owners of the 2019 Bonds may wish to ascertain that the nominee holding the 2019 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 registrar and request that copies of notices be provided directly to them.

Neither DTC nor Cede & Co. (nor any other DTC nominee) will consent or vote with respect to the 2019 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 Trustee 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 the 2019 Bonds are credited on the record date (identified in listing attached to the Omnibus Proxy).

Redemption proceeds, distributions, and interest payments on the 2019 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 Authority or the Trustee, 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 Participant and not of DTC (nor its nominee), the Trustee, or the Authority, subject to any statutory or regulatory requirements as may be in effect from time to time. Payment of redemption proceeds, distributions, and interest payments to Cede & Co. (or such other nominee as may be requested by an authorized representative of DTC) is the responsibility of the Authority or the Trustee, 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 depository with respect to the 2019 Bonds at any time by giving reasonable notice to the Authority and the Trustee. In addition, the Authority may decide to discontinue use of the system of book-entry transfers through DTC (or a successor Securities Depository).

Under either of such circumstances, in the event that a successor Securities Depository is not obtained, bond certificates are required to be printed and delivered.

The information in this section concerning DTC and DTC's book-entry system has been obtained from DTC, and the Authority takes no responsibility for the accuracy thereof.

THE AUTHORITY AND TRUSTEE CANNOT AND DO NOT GIVE ANY ASSURANCES THAT THE DIRECT PARTICIPANTS OR THE INDIRECT PARTICIPANTS WILL DISTRIBUTE TO THE BENEFICIAL OWNERS OF THE 2019 BONDS: (I) CERTIFICATES REPRESENTING AN OWNERSHIP INTEREST OR OTHER CONFIRMATION OF BENEFICIAL OWNERSHIP INTERESTS IN THE 2019 BONDS, OR (II) REDEMPTION OR OTHER NOTICES SENT TO DTC OR CEDE & CO., ITS NOMINEE, AS THE REGISTERED OWNERS OF THE 2019 BONDS, OR THAT THEY WILL DO SO ON A TIMELY BASIS OR THAT DTC, DIRECT PARTICIPANTS OR INDIRECT PARTICIPANTS WILL SERVE AND ACT IN THE MANNER DESCRIBED IN THIS OFFICIAL STATEMENT. 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.

THE AUTHORITY AND THE TRUSTEE WILL HAVE NO RESPONSIBILITY OR OBLIGATION TO ANY SECURITIES DEPOSITORY, ANY PARTICIPANTS IN THE BOOK-ENTRY SYSTEM, OR THE BENEFICIAL OWNERS WITH RESPECT TO (I) THE ACCURACY OF ANY RECORDS MAINTAINED BY THE SECURITIES DEPOSITORY OR ANY PARTICIPANT; (II) THE PAYMENT BY THE SECURITIES DEPOSITORY OR BY ANY PARTICIPANT OF ANY AMOUNT DUE TO ANY PARTICIPANT OR BENEFICIAL OWNER, RESPECTIVELY, IN RESPECT OF THE PRINCIPAL AMOUNT OR REDEMPTION PRICE OF, OR INTEREST ON, ANY 2019 BONDS; (III) THE DELIVERY OF ANY NOTICE BY THE SECURITIES DEPOSITORY OR ANY PARTICIPANT; (IV) THE SELECTION OF THE BENEFICIAL OWNERS TO RECEIVE PAYMENT IN THE EVENT OF ANY PARTIAL REDEMPTION OF THE 2019 BONDS; OR (V) ANY OTHER ACTION TAKEN BY THE SECURITIES DEPOSITORY OR ANY PARTICIPANT.

## **LITIGATION**

There is no litigation pending or, to the knowledge of the Authority, threatened in any court or administrative body, questioning the enforceability of the Act, the statutes imposing the motor fuel taxes, the motor vehicle document fees, the motor vehicle registration fees, the Miscellaneous Transportation Revenue or the transfer of that revenue to the Authority, the existence of the Authority, the validity of the 2019 Bonds, or any proceedings of the Authority taken with respect to the issuance or sale thereof, or seeking to restrain or enjoin the issuance, sale, execution or delivery of the 2019 Bonds or questioning the power of the Authority to collect, pledge and assign revenue of the Delaware Turnpike, or to pay the 2019 Bonds as provided in the Agreement.

The Authority monitors any possible judicial proceedings that may arise and affect the TTF revenue sources as well as continues to review the impact, if any, such judicial decisions could have on the TTF revenue sources. If necessary, the Authority plans to take whatever action may be required with respect to any required revisions to the TTF revenue and expenditure plan, with the end result that there will be a revenue neutral impact on the TTF. In the event that any such changes require approval by the State, the Authority expects that the State will enact any such changes requested by the Authority.

## **INDEPENDENT AUDITORS AND TRANSPORTATION CONSULTANT**

The financial statements (the "Financial Statements") of the Department of Transportation (an enterprise fund of the State of Delaware) for fiscal year ending June 30, 2018 have been examined by KPMG LLP, independent auditor, whose report thereon appears therein. The Financial Statements are incorporated herein by reference and are available online at the Department of Transportation's section of

the State's website at <https://auditor.delaware.gov/wp-content/uploads/sites/40/2018/12/Delaware-Department-of-Transportation-Financial-Statements-June-30-2018.pdf>. In addition, the Financial Statements have been submitted to the Municipal Securities Rulemaking Board (the "MSRB") via the Electronic Municipal Market Access System ("EMMA") (<http://emma.msrb.org>). Finally, copies are available by contacting the Department of Transportation, State of Delaware, 800 Bay Road, Dover, DE 19901. Other than the Financial Statements, none of the other information contained on the State's website is included by reference in this Official Statement. The auditor's report incorporated herein by reference is provided as a publicly available document. KPMG LLP has not been requested to consent to such incorporation. KPMG LLP has not been engaged to perform and has not performed, since the date of its report, any procedures on the Financial Statements addressed in that report. KPMG LLP has not performed any procedures relating to this Official Statement. The Authority represents that, except as described herein, there has been no material adverse change in its financial position since June 30, 2018.

The Transportation Consultant's Traffic Report and the Update Letter, prepared by Stantec Consulting Services, Inc., is included as APPENDIX D to this Official Statement. The Transportation Consultant's Traffic Report and the Update Letter are based on historical data provided by the Authority and the Department of Public Safety and their own forecasts of population, and certain other factors. This Traffic Report and the Update Letter have been included in this Official Statement in reliance on the Transportation Consultant's knowledge and experience in examining and projecting such matters. Unanticipated events and circumstances may occur which would affect the forecasts contained therein. Therefore, the actual results achieved during the forecast period may vary materially from those forecasted.

### **FINANCIAL ADVISOR**

PFM Financial Advisors LLC has served as financial advisor (the "Financial Advisor") to the Authority in connection with the sale of the 2019 Bonds. The Financial Advisor is an independent financial advisory firm and is not engaged in the business of underwriting, trading or distributing municipal securities or other public securities. Compensation paid to the Financial Advisor is contingent upon the successful issuance of the 2019 Bonds.

### **TRUSTEE**

The Trustee for the holders of the 2019 Bonds, as well as the Authority's outstanding Senior Bonds, is Wilmington Trust Company. Wilmington Trust Company, as escrow agent, holds funds for the payment of certain defeased indebtedness of the Authority.

### **RATINGS**

The 2019 Bonds have been given a rating of "AA+" (stable outlook) by Standard and Poor's Corporation and "Aa1" (stable outlook) by Moody's Investors Service, Inc. Reference is made to the manuals of both rating agencies for a complete description of its rating procedures and other rating categories.

A bond rating is not a recommendation to buy, sell or hold bonds. The rating represents a judgment as to the likelihood of timely payment of the 2019 Bonds according to their terms but does not address the likelihood of redemption or other payments of the 2019 Bonds prior to maturity. There is no assurance that any of the ratings will remain in effect for any given period of time or that they will not be revised downward or withdrawn entirely by the rating agency if, in its judgment, circumstances so warrant. Any such downward revision or withdrawal of any of the ratings may have an adverse effect on the market price or marketability of the 2019 Bonds. Any desired explanation of the significance of such ratings should be obtained from the rating agency furnishing the same.

## **LEGALITY FOR INVESTMENT**

The Act provides that the 2019 Bonds are securities in which all officers of political subdivisions, administrative departments, boards and commissions of the State, all banks, bankers, savings banks and institutions, building and loan associations, trust companies, savings and loan associations, investment companies and other persons carrying on a banking business; all insurance companies, insurance associations and other persons carrying on an insurance business; all administrators, executors, guardians, trustees and other fiduciaries; and all other persons whatsoever who now are or may hereafter be authorized to invest in bonds or other obligations of the State, may properly and legally invest any funds, including capital, belonging to them or within their control.

The Act also provides that the 2019 Bonds may be properly and legally deposited with and received by any officer of the State, or of any political subdivision or agency of the State, for any purpose for which the deposit of bonds or other obligations of the State is now, or may hereafter be, authorized by law.

## **UNDERWRITING**

The 2019 Bonds are being purchased by Wells Fargo Bank, National Association, as representative of a group of underwriters (the “Underwriters”). The Underwriters have agreed to purchase said 2019 Bonds at a purchase price of \$160,297,023.65 (which is equal to the aggregate principal amount of \$137,135,000.00 plus original issue premium of \$23,285,445.15 less underwriters’ discount of \$123,421.50). The Underwriters’ obligation to make such purchase is subject to certain terms and conditions set forth in the related purchase contract, the approval of certain legal matters by Bond Counsel and certain other conditions.

The Underwriters reserve the right to change the initial prices of the 2019 Bonds in connection with the marketing of the 2019 Bonds and may offer and sell the 2019 Bonds to certain dealers (including dealers depositing the 2019 Bonds into investment trusts) and others at prices lower than the initial public offering price or prices set forth in the Official Statement.

The Underwriters and their respective affiliates are full service financial institutions engaged in various activities, which may include securities trading, commercial and investment banking, financial advisory, investment management, principal investment, hedging, financing and brokerage activities. The Underwriters and their respective affiliates may have, from time to time, performed and may in the future perform, various investment banking services for the Authority, for which they may have received or will receive customary fees and expenses. In the ordinary course of their various business activities, the Underwriters and their respective affiliates may make or hold a broad array of investments and actively trade debt and equity securities (or related derivative securities) and financial instruments (which may include bank loans and/or credit default swaps) for their own account and for the accounts of their customers and may at any time hold long and short positions in such securities and instruments. Such investment and securities activities may involve securities and instruments of the Authority. The Underwriters and their respective affiliates may also communicate independent investment recommendations, market color or trading ideas and/or publish or express independent research views in respect of such assets, securities or instruments and may at any time hold, or recommend to clients that they should acquire, long and/or short positions in such assets, securities and instruments.

## **CONTINUING DISCLOSURE UNDERTAKING**

Rule 15c2-12 under the Securities Exchange Act of 1934, as amended, (the “Rule”) prohibits an underwriter from purchasing or selling municipal securities, such as the 2019 Bonds, unless it has determined that the issuer of such securities and/or other persons deemed to be material “obligated persons” (each, a “MOP”) have committed to provide (i) on an annual basis, certain financial information, including

financial information and operating data (“Annual Reports”), to each Nationally Recognized Municipal Securities Information Repository (a “NRMSIR”) and the relevant state information repository (if any) and (ii) notice of various events described in the Rule, if material (“Event Notices”), to each NRMSIR or the Municipal Securities Rulemaking Board (“MSRB”) and to any such state information repository.

The Authority will agree with the purchasers of the 2019 Bonds, by executing a Continuing Disclosure Agreement prior to the issuance of the 2019 Bonds, to provide Annual Reports with respect to itself to each NRMSIR and to any Delaware information repository that is formed. The Authority has determined that there currently is no other MOP for purposes of the Rule. The Authority will provide Event Notices to the MSRB and to any Delaware information repository.

On December 5, 2008, the Securities and Exchange Commission amended the Rule by replacing the four NRMSIRs with the Electronic Municipal Market Access System (“EMMA”) created by the MSRB beginning July 1, 2009. Pursuant to the Continuing Disclosure Agreement, the Authority shall file, or cause to be filed, with EMMA any filing required or permitted under the Continuing Disclosure Agreement

A form of the Continuing Disclosure Agreement appears as APPENDIX B to this Official Statement.

The Authority previously failed to timely file an event notice in connection with a rating change on June 16, 2014 in connection with the Authority’s GARVEE bonds. The Authority subsequently filed the notice on EMMA on August 14, 2014.

Other than as set forth in the preceding paragraph, the Authority has complied in all material respects with all of its obligations under continuing disclosure agreements to which it is a party in each of the past five years.

In November 2014, the Authority filed a Questionnaire for Self-Reporting Entities with the United States Securities and Exchange Commission (the “SEC”) pursuant to the SEC’s Municipalities Continuing Disclosure Cooperation Initiative (the “MCDC Initiative”). In the Questionnaire, the Authority indicated that it had failed to comply with a prior continuing disclosure obligation and stated that it intended to consent to settlement terms under the MCDC Initiative (the “Offer of Settlement”). Subsequently, the SEC determined to accept the Authority’s Offer of Settlement and issued an Order Instituting Cease-and-Desist Proceeding (the “Order”). Under the Order, the Authority agreed, among other things: to establish appropriate written policies and procedures, to comply with existing continuing disclosure undertakings, to disclose in the terms of the Order in any official statement within five years of the institution of those proceedings, and to certify compliance with the undertakings.

## **TAX MATTERS**

### **Tax Exemption-Opinion of Bond Counsel**

The Internal Revenue Code of 1986, as amended (the “Code”) contains provisions relating to the tax-exempt status of interest on obligations issued by governmental entities which apply to the 2019 Bonds. These provisions include, but are not limited to, requirements relating to the use and investment of the proceeds of the 2019 Bonds and the rebate of certain investment earnings derived from such proceeds to the United States Treasury Department on a periodic basis. These and other requirements of the Code must be met by the Authority subsequent to the issuance and delivery of the 2019 Bonds in order for interest thereon to be and remain excludable from gross income for purposes of federal income taxation. The Authority has made covenants to comply with such requirements.

In the opinion of Bond Counsel, interest on the 2019 Bonds is not includable in gross income for purposes of federal income taxation under existing statutes, regulations, rulings and court decisions. The opinion of Bond Counsel is subject to the condition that the Authority comply with all applicable federal



income tax law requirements that must be satisfied subsequent to the issuance of the 2019 Bonds in order that interest thereon continues to be excluded from gross income. Failure to comply with certain of such requirements could cause the interest on the 2019 Bonds to be so includable in gross income retroactive to the date of issuance of the 2019 Bonds. The Authority has covenanted to comply with all such requirements. Interest on the 2019 Bonds is not treated as an item of tax preference for purposes of the federal alternative minimum taxes.

In addition to the matters addressed below, prospective purchasers of the 2019 Bonds should be aware that ownership of the 2019 Bonds may result in collateral tax consequences to certain taxpayers, including but not limited to, foreign corporations, certain S corporations, financial institutions, recipients of social security and railroad retirement benefits and property or casualty insurance companies. Bond counsel expresses no opinion regarding any other federal tax consequences related to the 2019 Bonds or the receipt of interest thereon. **Prospective purchasers of the 2019 Bonds should consult their own tax advisors as to the impact of these other tax consequences.**

In the opinion of Bond Counsel, under existing law, the 2019 Bonds, the interest on the 2019 Bonds and their transfer shall be exempt from taxation by The State of Delaware and its political subdivisions, except for estate, inheritance or gift taxes imposed by The State of Delaware.

### **Deduction for Interest Paid by Financial Institutions to Purchase or Carry Tax-Exempt Obligations**

The Code, subject to limited exceptions not applicable to the 2019 Bonds, denies the interest deduction for indebtedness incurred or continued to purchase or carry tax-exempt obligations, such as the 2019 Bonds. With respect to banks, thrift institutions and other financial institutions, the denial to such institutions is one hundred percent (100%) for interest paid on funds allocable to the 2019 Bonds and any other tax-exempt obligations acquired after August 7, 1986.

### **Property or Casualty Insurance Company**

The Code also provides that a property or casualty insurance company may also incur a reduction, by a specified portion of its tax-exempt interest income, of its deduction for losses incurred.

### **Accounting Treatment of Amortizable Bond Premium**

The 2019 Bonds maturing on July 1 in the years 2020 through 2039, inclusive, are hereinafter referred to as the "Premium Bonds". An amount equal to the excess of the initial public offering price of a Premium Bond set forth on the cover page over its stated redemption price at maturity constitutes premium on such Premium Bond. A purchaser of a Premium Bond must amortize any premium over such Premium Bond's term using constant yield principles, based on the purchaser's yield to maturity. As premium is amortized, the purchaser's basis in such Premium Bond is reduced by a corresponding amount, resulting in an increase in the gain (or decrease in the loss) to be recognized for federal income tax purposes upon a sale or disposition of such Premium Bond prior to its maturity. Even though the purchaser's basis is reduced, no federal income tax deduction is allowed.

Purchasers of Premium Bonds, whether at the time of initial issuance or subsequent thereto, should consult their own tax advisors with respect to the determination and treatment of premium for federal income tax purposes and with respect to state and local tax consequences of owning Premium Bonds.

## APPROVAL OF LEGAL PROCEEDINGS

The authorization and issuance of the 2019 Bonds are subject to the issuance of a legal opinion as to validity by Bond Counsel, Saul Ewing Arnstein & Lehr LLP, Wilmington, Delaware, whose legal opinion will be available at the time of the delivery of the 2019 Bonds. A complete copy of the proposed form of Bond Counsel opinion is contained in APPENDIX C hereto. Bond Counsel undertakes no responsibility for the accuracy, completeness or fairness of this Official Statement. Compensation paid to Bond Counsel and Underwriters' Counsel is conditioned upon the successful issuance of the 2019 Bonds. Certain legal matters will be passed upon for the Authority by a Deputy Attorney General of the State of Delaware.

The agreement of the Authority with the holders of the 2019 Bonds is set forth in full in the Agreement, and neither any advertisement of the 2019 Bonds nor this Official Statement is to be construed as constituting an agreement with the purchasers of the 2019 Bonds. So far as any statements are made in this Official Statement involving estimates, projections or matters of opinion, whether or not expressly so stated, they are intended merely as such and not as representations of fact.

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The execution and distribution of this Official Statement by the undersigned and its distribution to prospective purchasers has been duly authorized by the Authority.

**DELAWARE TRANSPORTATION AUTHORITY**

By: Secretary of Department of Transportation

\_\_\_\_\_  
/s/ Jennifer L. Cohan

Director of Finance

\_\_\_\_\_  
/s/ Lanie Thornton

Transportation Trust Fund Administrator

\_\_\_\_\_  
/s/ Brian G. Motyl

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## APPENDIX A

### Summary of Certain Provisions of the Agreement

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## APPENDIX A

### SUMMARY OF CERTAIN PROVISIONS OF THE AGREEMENT

The following is a general summary of certain provisions of the Agreement, Summaries of definitions of certain defined terms used in the Agreement and the Official Statement are also set forth below. Other terms defined in the Agreement or the Official Statement for which summary definitions are not set forth are indicated by initial capitalization. This Summary is not to be considered a full statement of the terms of the Agreement and accordingly is qualified by reference thereto and is subject to the full text thereof. Copies of the Agreement are available for examination at the offices of the Trustee and the Authority.

#### Definitions

“Accreted Value” shall mean, as of any date of computation with respect to any Compound Interest Bond, an amount equal to the principal amount of such Compound Interest Bond (the principal amount at its original issuance) plus the interest accrued on such Compound Interest Bond from the date of its original issuance to the Interest Payment Date next preceding the date of computation or the date of computation if an Interest Payment Date, such interest to accrue at the interest rate per annum of the Compound Interest Bonds set forth in the Supplemental Agreement authorizing the issuance of such Compound Interest Bonds, compounded on each Interest Payment Date, plus, with respect to matters related to the payment upon redemption or acceleration of the Compound Interest Bonds, if such date of computation shall not be an Interest Payment Date, a portion of the difference between the Accreted Value as of the immediately preceding Interest Payment Date (or the date of original issuance if the date of computation is prior to the first Interest Payment Date succeeding the date of original issuance) and the Accreted Value as of the immediately succeeding Interest Payment Date, calculated based upon an assumption that Accreted Value accrues during any semi-annual period in equal daily amounts on the basis of a year of 360 days consisting of twelve (12) months of thirty (30) days each.

“Act” shall mean the Delaware Transportation Authority Act, Chapter 13, Title 2, Delaware Code, as amended, and the Transportation Trust Fund Act, Chapter 14, Title 2, Delaware Code, as amended from time to time.

“Additional Revenues” shall mean any receipts or revenue of the Authority pledged to the Trustee for the benefit of the holders of the Bonds pursuant to a Supplemental Agreement and not pledged by the Agreement on the date of its initial execution and delivery. By Supplemental Agreement No. 3 dated as of August 1, 1990, the following were added as Additional Revenue: motor vehicle registration fees imposed by the State pursuant to Chapter 21, Title 21, Delaware Code, all fees which are collected by the Department of Public Safety and paid to the Transportation Trust Fund pursuant to Chapter 3, Title 21, Delaware Code, and investment income earned and received on assets held in the Trust Fund (provided that investment income shall not be treated as Additional Revenue for the purposes of the additional Bonds tests). By Supplemental Agreement No. 9 dated as of November 1, 1994, amounts received from the State and derived by the State from the hauling permits required under Chapter 45, Title 21, Delaware Code were added as Additional Revenue. The Chapter 3, Title 21 Additional Revenue pledged by Supplemental Agreement No. 3 and the Chapter 45, Title 21 Additional Revenue pledged by Supplemental Agreement No. 9 are referred to herein as “Pledged Miscellaneous Transportation Revenue”.

“Agreement” shall mean the Trust Agreement, dated as of the 1st day of August, 1988, between the Authority and Wilmington Trust Company together with all agreements supplemental thereto as therein permitted.

“Annual Budget” shall mean the Authority's budget required to be prepared by the Act, showing, among other things, the expected deposits to the Funds created under the Agreement.

“Appreciated Value” shall mean, (i) as of any date of computation with respect to any Compound Interest and Income Bond prior to the Interest Commencement Date set forth in the Supplemental Agreement providing for the issuance of such Compound Interest and Income Bond, an amount equal to the principal amount of such Compound Interest and Income Bond (the principal amount at its original issuance) plus the interest accrued on such Compound Interest and Income Bond from the date of original issuance of such Bond to the Interest Payment Date next preceding the date of computation or the date of computation if an Interest Payment Date, such interest to accrue at the rate per

annum of the Compound Interest and Income Bonds set forth in the Supplemental Agreement providing for the issuance of such Compound Interest and Income Bond, compounded semiannually on each Interest Payment Date, plus, if such date of computation shall not be an Interest Payment Date, a portion of the difference between the Appreciated Value as of the immediately preceding Interest Payment Date (or the date of original issuance if the date of computation is prior to the first Interest Payment Date succeeding the date of original issuance) and the Appreciated Value as of the immediately succeeding Interest Payment Date calculated based upon an assumption that Appreciated Value accrues during any period in equal daily amounts on the basis of a year of 360 days consisting of twelve (12) months of thirty (30) days each, and (ii) as of any date of computation on and after the Interest Commencement Date, the Appreciated Value on the Interest Commencement Date.

“Authority” shall mean the Delaware Transportation Authority, a body corporate and politic constituting a public instrumentality of The State of Delaware, and the successor or successors of the Authority.

“Bonds” or “Bond” shall mean Senior and/or Junior Bonds or Bond issued under the Agreement.

“Capital Fund” shall mean the Delaware Transportation Authority Capital Fund, a trust fund created and designated by the provisions of Article V of the Agreement.

“Compound Interest and Income Bonds” shall mean any Bonds as to which accruing interest is not paid prior to the Interest Commencement Date specified in the Supplemental Agreement providing for the issuance of such Bonds and the Appreciated Value for such Bonds is compounded semiannually on each of the applicable semiannual dates designated for compounding prior to the Interest Commencement Date for such Compound Interest and Income Bonds, all as so designated by the Supplemental Agreement providing for the issuance of such Bonds.

“Compound Interest Bonds” shall mean those Bonds as to which interest is compounded semiannually on each of the applicable semiannual dates designated for compounding and payable in an amount equal to the then current Accreted Value only at the maturity, earlier redemption or other payment date therefor, all as so designated by the Supplemental Agreement providing for the issuance of such Bonds.

“Credit Facility; Termination thereof; Expiration thereof” “Credit Facility” shall mean any of the following: (i) a letter of credit; and (ii) any other credit facility, insurance policy or other credit support agreement or mechanism obtained, delivered, made, entered into or otherwise arranged by the Authority for the purpose of securing, evidencing or being otherwise in furtherance of the obligations of the Authority under the Agreement or for the purpose of securing all or a portion of the Bonds, or for all of the foregoing purposes. Credit Facility shall include any agreement to reimburse the obligor of such Credit Facility for a drawing or advance under that Credit Facility as well as the agreement, if separate, which embodies the obligation of the obligor to the Authority or the Trustee permitting the Authority or the Trustee to draw or obtain advances under such Credit Facility. Any Credit Facility obtained to satisfy the debt service reserve account requirements for the Junior Bonds or the Senior Bonds which is an insurance policy must be rated at its issuance in the highest Rating Category by Moody's and S&P. Any such Credit Facility which is a letter of credit must be continuously rated in the highest Rating Category by Moody's and S&P. “Termination” (and other forms of the word “terminate”) shall mean, when used with respect to any Credit Facility, the replacement, removal, surrender or other termination of such Credit Facility by the Trustee other than the Expiration of such Credit Facility. “Expiration” (and other forms of the word “expire”) shall mean, when used with respect to any Credit Facility, the expiration or termination of such Credit Facility in accordance with its terms.

“Current Interest Bonds” shall mean any bonds the interest on which is paid at least semi-annually unless otherwise provided in a Supplemental Agreement.

“Defeased Municipal Obligations” shall mean obligations of state or local governments or obligations of public authorities or agencies which are rated in the highest Rating Category by S&P or Moody's and provisions for payment of which have been made by deposit of funds or investments with a trustee or escrow agent for the benefit of the holders of such Defeased Municipal Obligations.

“Delaware Turnpike” shall mean the toll express highway designated Delaware Interstate 95 extending from a point in the vicinity of Farnhurst, Delaware, to a point at or near the boundary line between the State of Delaware and the State of Maryland.



“Delaware Turnpike Revenues” shall mean all tolls, concession revenues and other revenues or receipts derived from the ownership, operation or maintenance of the Delaware Turnpike.

“Document Fees” shall mean the fees derived from motor vehicle document fees imposed by the State of Delaware pursuant to Section 3002, Chapter 30, Title 30, Delaware Code, as amended, from time to time, and successor sections of the Delaware Code.

“Engineering Consultants” shall mean a firm or corporation having a nationwide and favorable repute for skill and experience in all phases of turnpike engineering and maintenance and in estimating operating expenses incurred in operating toll turnpikes.

“Fiscal Year” shall mean the period commencing on the first day of July of any year and ending on the last day of June of the following year.

“Government Obligations” shall mean (a) direct obligations of, or obligations the principal of and the interest on which are unconditionally guaranteed by, the United States of America and entitled to the full faith and credit thereof; and (b) certificates, depositary receipts or other instruments which evidence a direct ownership interest in obligations described in clause (a) above or in any specific interest or principal payments due in respect thereof; provided, however, that the custodian of such obligations or specific interest or principal payments shall be a bank or trust company organized under the laws of the United States of America or of any state or territory thereof or of the District of Columbia, with a combined capital stock surplus and undivided profits of at least \$50,000,000 or the custodian is appointed by or on behalf of the United States of America; and provided, further, that except as may be otherwise required by law, such custodian shall be obligated to pay to the holders of such certificates, depositary receipts or other instruments the full amount received by such custodian in respect of such obligations or specific payments and shall not be permitted to make any deduction therefrom.

“Interest Commencement Date” shall mean with respect to any particular Compound Interest and Income Bond, the date which must be an Interest Payment Date, as set forth in the Supplemental Agreement providing for the issuance of such Bond (which date must be prior to the scheduled maturity date for such Bond) after which interest accruing on such Bond shall be payable semiannually, with the first such payment being the applicable Interest Payment Date immediately succeeding such Interest Commencement Date.

“Investment Account” shall mean the Delaware Transportation Authority Investment Account, a trust fund created and designated by the provisions of Section 4.01 (“Creation of Funds”) of the Agreement.

“Junior Bonds” shall mean Bonds, at any time Outstanding, the principal and interest on which are payable from the Junior Bonds Principal and Interest Account, the Junior Bonds Redemption Account and, as provided in the Agreement, from the Junior Bonds Debt Service Reserve Account and by their terms, subordinate in right of payment to Senior Bonds (except with respect to Junior Bonds Priority Funds) but senior in their right of payment to Subordinate Indebtedness.

“Junior Bonds Debt Service Reserve Account” shall mean the Delaware Transportation Authority Junior Bonds Debt Service Reserve Account, a trust fund created and designated by the provisions of Section 4.01 (“Creation of Funds”) of the Agreement.

“Junior Bonds Debt Service Reserve Account Requirement” shall mean, as of any date of determination, an amount equal to one-half the maximum Principal and Interest Requirements on Junior Bonds then Outstanding; provided that with respect to any Junior Bonds bearing interest at the Short-Term Rate, such requirement shall be determined by Supplemental Agreements.

“Junior Bonds Principal and Interest Account” shall mean the Delaware Transportation Authority Junior Bonds Principal and Interest Account, a trust fund created and designated by the provisions of Section 4.01 (“Creation of Funds”) of the Agreement.

“Junior Bonds Priority Funds” shall mean moneys on deposit in and/or payable under a Credit Facility to the Junior Bonds Principal and Interest Account, Junior Bonds Redemption Account and/or the Junior Bonds Debt Service Reserve Account.

“Junior Bonds Redemption Account” shall mean the Delaware Transportation Authority Junior Bonds Redemption Account, a trust fund created and designated by the provisions of Section 4.01 (“Creation of Funds”) of the Agreement.

“Maximum Principal and Interest Requirement” shall mean the maximum principal and interest payable in any Fiscal Year with respect to Senior Bonds or Junior Bonds, as the case may be, less the sum of the proceeds of such Bonds issued to fund interest of such series of Bonds during the Fiscal Year of calculation.

“Motor Fuel Tax Revenues” shall mean the revenues derived from the motor fuel tax imposed by the State pursuant to Chapter 51, Title 30, Delaware Code, as amended, from time to time, and successor provisions of the Delaware Code.

“Non-Delaware Turnpike Operating Account” shall mean the trust fund created and designated in the Revenue Fund by the provisions of Supplemental Agreement No. 27.

“Operating Fund” shall mean the Delaware Transportation Authority Operating Fund, a trust fund created and designated by the provisions of Section 4.01 (“Creation of Funds”) of the Agreement.

“Operating Reserve Fund” shall mean the Delaware Transportation Authority Operating Reserve Fund, a trust fund created and designated by the provisions of Section 4.01 (“Creation of Funds”) of the Agreement.

“Other Projects Account” shall mean the Delaware Transportation Authority Other Projects Account, a trust fund created and designated in Section 5.01 (“Capital Fund”) of the Agreement.

“Outstanding” when used in reference to the Bonds, shall mean, at any particular date, the aggregate of all Bonds authenticated and delivered under the Agreement except:

- (a) those Bonds cancelled at or prior to such date or delivered to or acquired by the Trustee at or prior to such date for cancellation;
- (b) those deemed to be paid in accordance with Article VIII (“Defeasance”) of the Agreement;
- (c) those deemed to be purchased in accordance with any agreement with a Tender Agent or Remarketing Agent; and
- (d) those in lieu of or in exchange or substitution for which other Bonds shall have been authenticated and delivered pursuant to the Agreement.

“Principal” or “principal amount” shall mean (i) with respect to any Compound Interest and Income Bond, the Appreciated Value thereof and with respect to any Compound Interest Bond, the Accreted Value thereof (the difference between the stated amount to be paid at maturity and the Appreciated Value or the Accreted Value, as the case may be, being deemed unearned interest) except as used in connection with the authorization and issuance of Bonds and with the order of priority of payments of Bonds after an Event of Default (of which the Trustee has notice within the meaning of Section 10.05 of the Agreement), in which case “principal” means the initial public offering price of a Compound Interest and Income Bond and a Compound Interest Bond (the difference between the Appreciated Value or the Accreted Value, as the case may be, and the initial public offering price being deemed interest) and (ii) with respect to any Current Interest Bond, the principal amount of such Bond payable at maturity.

“Principal and Interest Requirements” shall mean for any Fiscal Year:

- (a) as applied to any Outstanding Bonds (except as provided in clauses (b), (c), (d) and (e) below), the sum of:

(i) the amount required to pay interest and any annual or other periodic fee payable to the provider of a Credit Facility ensuring the payment of principal of and interest on all serial Bonds then Outstanding which is payable in such Fiscal Year (and on any July 1 of the following Fiscal Year if any interest payable on July 1 of the Fiscal Year of calculation is excluded);

(ii) the amount required to pay principal of all serial Bonds then Outstanding which is payable in such Fiscal Year (and on any July 1 of the following Fiscal Year if the principal payment due on any July 1 of the Fiscal Year of calculation is excluded);

(iii) the amount required to pay interest and any annual or other periodic fee payable to the provider of a Credit Facility ensuring the payment of principal of and interest on all term Bonds then Outstanding which is payable in such Fiscal Year (and on any July 1 of the following Fiscal Year if interest payable on any July 1 of the Fiscal Year of calculation is excluded); and

(iv) the amount required to meet the Sinking Fund Payments on all term Bonds then Outstanding which is payable in such Fiscal Year (and on any July 1 of the following Fiscal Year if the amount required to meet the Sinking Fund Payment on any July 1 of the Fiscal Year of calculation is excluded);

(b) as applied to Bonds of any series which are payable in a Fiscal Year by virtue of the right of a holder of Bonds to demand repurchase or repayment prior to their scheduled maturity (after taking into account all scheduled mandatory redemptions or prepayments payable over the life of those Bonds):

(i) the amount required to pay interest and any annual or other periodic fee payable to the provider of a Credit Facility ensuring the payment of principal of and interest on such Bonds then Outstanding which is payable in a Fiscal Year (and on any July 1 of the following Fiscal Year if interest payable on any July 1 of the Fiscal Year of calculation is excluded);

(ii) the amount required to pay principal of such Bonds then Outstanding which is payable in a Fiscal Year (and on any July 1 of the following Fiscal Year if principal payable on any July 1 of the Fiscal Year of calculation is excluded) assuming that the principal amount of such Bonds which is subject to repurchase or repayment prior to its scheduled maturity shall be required to be repurchased or repaid on the earliest date on which such demand can be made or on which by its terms it can be required to be repaid;

(iii) notwithstanding items (i) and (ii) in this clause (b), if the Authority has delivered a Credit Facility to the Trustee under which money is available for the payment of all or a portion of such Bonds (a "balloon payment") (provided that if the Credit Facility is scheduled to expire prior to the date of payment of the balloon payment, the amount available under the Credit Facility is required to be drawn and applied to the payment of the balloon payment unless the Credit Facility is replaced or renewed prior to such Expiration date) Principal and Interest Requirements shall be calculated as follows: (1) it shall be assumed that the amounts available under the Credit Facility are drawn on the earlier of the balloon payment date or the Expiration or Termination date of the Credit Facility; (2) the Principal and Interest Requirements on the Bonds for each Fiscal Year prior to the Fiscal Year of the assumed date of drawing on the Credit Facility shall be deemed to be equal to the amount of principal and interest payments scheduled to be paid; and (3) the Principal and Interest Requirements for the Fiscal Year of the assumed draw under the Credit Facility and for each Fiscal Year thereafter shall be deemed to be equal to the sum of the principal and interest payable during such period by the terms of the Credit Facility and the principal and interest payments of other Bonds of that series for which amounts are not available under the Credit Facility;

(c) with respect to any Bonds bearing interest at the Short-Term Rate, for purposes of calculations made under (a) or (b) above, interest payments shall be the sum of:

(i) the maximum interest rate payable at the Short-Term Rate as determined by the Supplemental Agreement pursuant to which such Bonds are issued, or, if higher, the maximum rate payable on the Bonds if held by any provider of a Credit Facility ensuring the payment of principal of and interest on such Bonds but only to the extent that such interest is payable from a Debt Service Fund; and

(ii) any annual or other periodic fee payable to the provider of a Credit Facility ensuring the payment of principal of and interest on the Bonds subject to the foregoing calculations;

(d) Notwithstanding the foregoing provisions of this definition with respect to any Bonds bearing interest at the Commercial Paper Rate, the payment of principal of and interest on which is ensured by the provider of a Credit Facility, Principal and Interest Requirements for each Fiscal Year shall be calculated assuming level debt service over 20 years with interest, for purposes of that calculation, at the maximum allowable rate on the date of initial issuance of Bonds bearing interest at the Commercial Paper Rate as determined by the Supplemental Agreement pursuant to which such Bonds are issued, or, if higher, the maximum rate payable on such Bonds if held by such provider of the Credit Facility but only to the extent that such interest is payable from a Debt Service Fund;

(e) Notwithstanding the foregoing provisions of this definition, Principal and Interest Requirements with respect to Compound Interest Bonds and Compound Interest and Income Bonds (each of such Bonds may comprise a portion of a series) shall be determined by the Supplemental Agreement providing for the issuance of any such Bonds but in any event, shall commence on the Interest Commencement Date with respect to Compound Interest and Income Bonds and, with respect to Compound Interest Bonds, either six months or one year prior (or such lesser time prior, as provided in the applicable Supplemental Agreement) to the date on which Accreted Value becomes due and payable with principal and interest portions of Accreted Value payable on such due date being deemed to accrue in equal daily installments commencing on the first day of such one year period (or such other period as is provided in the Supplemental Agreement pursuant to which such Bonds are issued).

“Project” shall mean any project which the Authority is authorized to finance under the provisions of the Act.

“Qualified Investments” shall mean

(a) (i) Government Obligations and (ii) bonds, debentures, notes or other obligations issued or guaranteed by any of the following: Federal National Mortgage Association, the Federal Financing Bank, the Federal Home Loan Mortgage Association, the Federal Housing Administration, the Farmers Home Administration, the Government National Mortgage Association, or by any other agency controlled by or supervised by and acting as an instrumentality of the United States Government (except for the Federal Farm Credit Bank, the Federal Land Bank, the Federal Intermediate Credit Bank, the Federal Home Loan Banks, or the Federal Bank for Cooperatives),

(b) certificates of deposit issued by, and time deposits in, any bank (including the Trustee), any branch of any bank, national banking association or federally chartered savings and loan association; provided that, with respect to any of the foregoing institutions, other than the Trustee, whose long-term unsecured indebtedness is rated less than A by Moody's or S &P, such certificates of deposit or time deposits are (i) insured by the Federal Deposit Insurance Corporation or the Federal Savings and Loan Insurance Corporation for the full face amount thereof or (ii) to the extent not so insured, collateralized by direct obligations of the United States of America having a market value of not less than the face amount of such certificates and deposits,

(c) evidences of ownership of a proportionate interest in specified direct obligations of the United States of America, 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, or when “stripped” by the United States Treasury, then by the custodian designated by the United States Treasury,

(d) Defeased Municipal Obligations,

(e) obligations of state or local government municipal bond issuers which are rated in one of the two highest Rating Categories by S&P or Moody's,

(f) obligations of state or local government municipal bond issuers, the principal of and interest on which, when due and payable, have been insured by an insurance policy or guaranteed by a letter of credit and which are rated in one of the two highest Rating Categories by S&P or Moody's despite the failure of such obligations to qualify as a Qualified Investment under (e) above,

(g) interests in a money market mutual fund registered under the Investment Company Act of 1940, 15 U.S.C. §§80-1, et seq., as from time to time amended, the portfolio of which is limited to obligations described in clause (a), (e) or (f) above and repurchase agreements fully collateralized thereby provided that such fund has total assets of at least \$100,000,000 and is rated in the highest Rating Category by S&P or Moody's,

(h) evidences of ownership of a proportionate interest in specified Defeased Municipal Obligations which Defeased Municipal 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,

(i) any repurchase agreement for Government Obligations by the Trustee that is with a bank or trust company (including the Trustee) or any securities dealer which is a member of the Securities Investors Protective Corporation; provided, however, that the Government Obligations must be transferred to the Trustee or a third party agent by physical delivery or by an entry made on the records of the issuer of such obligations, and the collateral security must continually have a market value at least equal to the amount so invested and the collateral must be free of third party claims, and further provided that (i) in the case of a bank or trust company, such institution shall have a combined capital and surplus of not less than \$50,000,000 or have ratings from S&P or Moody's in one of their three highest Rating Categories and (ii) in the case of a securities dealer, such dealer is a member of the National Association of Securities Dealers, Inc. Any investment in a repurchase agreement shall be considered to mature on the date the bank, trust company or recognized securities dealer providing the repurchase agreement is obligated to repurchase the Government Obligations, and

(j) commercial paper rated in the highest Rating Category by either S&P or Moody's.

Any investment in obligations described in (a), (c), (d), (e), (f), (g), (h) and (j) above may be made in the form of an entry made on the records of the issuer of the particular obligation.

“Rebate Account” shall mean the Delaware Transportation Authority Rebate Account, a special fund created and designated by the provisions of Section 7.22 of the Agreement.

“Receipts and Revenues of the Authority” shall mean all moneys paid or payable to the Trustee by or for the account of the Authority, including, but not limited to, Motor Fuel Tax Revenues, Delaware Turnpike Revenues, Document Fees, the proceeds of all drawings by or advances to the Trustee under a Credit Facility in satisfaction of the Authority's obligations to make payments under the Agreement (other than drawings or advances under Credit Facilities ensuring payment of principal of and interest on Bonds), all Additional Revenues and all receipts of the Trustee which, under the provisions of the Agreement, reduce the amount of such payments.

“Revenue Account” shall mean the Delaware Transportation Authority Revenue Account, a trust fund created and designated by the provisions of Section 4.01 (“Creation of Funds”) of the Agreement.

“Revenue Fund” shall mean the Delaware Transportation Authority Revenue Fund, a trust fund created and designated by the provisions of Section 4.01 (“Creation of Funds”) of the Agreement.

“Senior Bonds” shall mean Bonds, at any time Outstanding, that by their terms are senior in right of payment to Junior Bonds (except Junior Bonds to the extent payable from Junior Bonds Priority Funds) and the principal and interest on which are payable from the Senior Bonds Principal and Interest Account, the Seniors Bonds Redemption Account and, as provided in the Agreement, from the Senior Bonds Debt Service Reserve Account.

“Senior Bonds Debt Service Reserve Account” shall mean the Delaware Transportation Authority Senior Bonds Debt Service Reserve Account, a trust fund created and designated by the provisions of Section 4.01 (“Creation of Funds”) of the Agreement.

“Senior Bonds Debt Service Reserve Account Requirement” shall mean as of any date of determination, an amount equal to one-half of the maximum Principal and Interest Requirements on Senior Bonds then Outstanding (subject to the provisions of Section 4.05 of the Agreement); provided that with respect to any Senior Bonds bearing interest at the Short-Term Rate, such requirement shall be determined by Supplemental Agreements.

“Senior Bonds Principal and Interest Account” shall mean the Delaware Transportation Authority Senior Bonds Principal and Interest Account, a trust fund created and designated by the provisions of Section 4.01 (“Creation of Funds”) of the Agreement.

“Senior Bonds Redemption Account” shall mean the Delaware Transportation Authority Senior Bonds Redemption Account, a trust fund created and designated by the provisions of Section 4.01 (“Creation of Funds”) of the Agreement.

“Stabilization Fund” shall mean the Delaware Transportation Authority Debt Service Stabilization Fund, a trust fund created and designated by the provisions of Section 4.01 (“Creation of Funds”) of the Agreement.

“Subordinate Indebtedness” shall mean obligations of the Authority issued pursuant to the Agreement on a basis subordinate to the lien of the holders of Bonds in the Receipts and Revenues of the Authority.

“Supplemental Agreement” shall mean any agreement of the Authority modifying, altering, amending, supplementing or confirming the Agreement for any purpose, in accordance with the terms thereof.

“Supplemental Agreement No. 27” shall mean the Supplemental Agreement No. 27 to Trust Agreement dated as of December 1, 2015 between the Authority and the Trustee.

“Tender Agent” shall mean the agent appointed in accordance with a Supplemental Agreement to accept the tender of Bonds, as determined by such Supplemental Agreement.

“Test Revenues” shall mean the aggregate amount of Delaware Turnpike Revenues, Motor Fuel Tax Revenues, Document Fees and Additional Revenues, as calculated pursuant to Section 2.07(b)(i) of the Agreement.

“Traffic Consultants” shall mean a firm or corporation having a nationwide and favorable repute for skill and experience in making estimates of vehicular traffic, turnpike earnings, fees and taxes related to motor vehicle use and/or other transportation related matters with respect to which the Traffic Consultants are providing projections, estimates or other advice and counsel described in the Agreement.

“Trust Estate” shall mean at any particular time all right, title and interest of the Trustee in and to the Agreement (except any rights of the Authority to receive notices, certificates, requests, requisitions and other communications thereunder), including without limitation the Receipts and Revenues of the Authority, any Credit Facility (excluding the rights to make drawings thereunder with respect to the payment or purchase of Bonds and proceeds of such drawings), the Revenue Fund, the Debt Service Fund, the Debt Service Reserve Fund, the Stabilization Fund (but not the Operating Fund and the Operating Reserve Fund) and the Capital Fund (and Funds created in those Funds) and all moneys and investments from time to time on deposit therein (excluding, however, any moneys or investments held in the Rebate Account), any and all other moneys and obligations (other than Bonds) which at such time are deposited or are required to be deposited with, or are held or are required to be held by or on behalf of, the Trustee, the Paying Agent or any Co-Paying Agent in trust under any of the provisions of the Agreement and all other rights, titles and interests which at such time are subject to the lien of the Agreement; provided, however, that in no event shall there be included in the Trust Estate (a) moneys or obligations deposited with or paid to the Trustee for the redemption or payment of Bonds which are deemed to have been paid in accordance with Article VIII (“Defeasance”) of the Agreement or moneys held pursuant to Section 4.10 (“Money Held in Trust”) and 7.22 (“Rebate Account”) of the Agreement or (b) except as therein expressly provided, any moneys held by the Tender Agent or any other person for the purchase of Bonds or for payment of Bonds held or to be held by it pursuant to a draw under a Credit Facility; provided, further, however that advances or drawings under a Credit Facility may be subject to a lien under the Agreement in favor of holders of less than all of the Bonds Outstanding, as provided in any Supplemental Agreement and the lien of the holders of Junior Bonds shall be subordinate and subject in right of payment, to the extent and in the manner set forth in the Agreement, to the prior payment of all Senior Bonds but prior to the rights of holders of Senior Bonds with respect to the Junior Bonds Priority Funds.

“Turnpike Account” shall mean the Delaware Transportation Authority Turnpike Account created and designated by the provisions of Section 5.01 of the Agreement.

“Turnpike Operating Expenses” shall mean the Authority's reasonable and necessary current expenses of operating, maintaining and repairing the Delaware Turnpike and shall include, without limiting the generality of the foregoing, all ordinary and usual expenses of operation, maintenance and repair, which may include extraordinary operating, maintenance and repair expenses not annually recurring, ordinary and usual costs of equipment acquisition, premiums for insurance, fees and expenses of any Credit Facility, all administrative and engineering expenses relating to operation, maintenance and repair of the Delaware Turnpike (excluding administrative expenses of the Authority paid by the State, if any), legal expenses, advertising expenses, any taxes or assessments lawfully levied on the Delaware Turnpike, any payments to pension or retirement funds, any payments required to be made by the Authority under any interest rate exchange agreement entered into by the Authority, any other expenses required or permitted to be paid by the Authority under the provisions of the Agreement or by law including any expenses incurred by the Authority for any of the foregoing purposes.

“U.S. 301 Subordinate Indebtedness Account” shall mean the trust fund created and designated in the Revenue Fund by the provisions of Supplemental Agreement No. 27.

“Variable Rate” shall mean an interest rate on a Bond that varies from period to period during the term of the Bond, which may or may not be subject to a put, and which may include an interest rate fixed for a period of time less than the term of the Bond, all as determined pursuant to a Supplemental Agreement.

### **Pledge and Assignment of Revenue**

In the Agreement the Authority grants, bargains, sells, conveys, mortgages, pledges and assigns, and grants a security interest in, the Trust Estate to the Trustee, its successors in trust and their assigns forever in trust upon the terms and trusts therein set forth for the equal and proportionate benefit and security of all holders of the Bonds issued under and secured by the Agreement without preference, priority or distinction as to liens of any Bonds over any other Bonds except as otherwise provided therein or in any Supplemental Agreement; provided, however, that (a) the holders of Senior Bonds shall have a prior and superior lien on the Funds created under the Agreement to the lien of the holders of the Junior Bonds except with respect to the lien on the Junior Bonds Principal and Interest Account, the Junior Bonds Redemption Account and the Junior Bonds Debt Service Reserve Account (the lien of the holders of Junior Bonds on the Junior Bonds Principal and Interest Account, the Junior Bonds Redemption Account and the Junior Bonds Debt Service Reserve Account shall be prior and superior to the lien of the holders of Senior Bonds); (b) certain holders of Senior Bonds may be given a prior and superior lien to holders of other Senior Bonds in a Fund into which are only deposited proceeds of such Bonds together with interest thereon and investment proceeds thereof; (c) the holders of certain Bonds may be given a prior and superior lien in accounts into which are deposited proceeds of advances or draws under a Credit Facility ensuring the payment of such Bonds to the extent of any such deposit; and (d) proceeds of advances or draws under a Credit Facility ensuring the payment of principal of and interest on any series of Bonds shall be excluded from the pledge and assignment of the Trust Estate although held for the benefit of holders of Bonds.

### **Flow of Funds**

**Creation of Funds.** The Agreement creates and establishes with the Trustee the following trust funds, and within those funds, the following accounts:

- Revenue Fund
  - Revenue Account
  - Investment Account
  - U.S. 301 Subordinate Indebtedness Account
  - Non-Delaware Turnpike Operating Account
- Debt Service Fund
  - Senior Bonds Principal and Interest Account
  - Junior Bonds Principal and Interest Account
  - Senior Bonds Redemption Account
  - Junior Bonds Redemption Account

Stabilization Fund  
 Debt Service Reserve Fund  
     Senior Bonds Debt Service Reserve Account  
     Junior Bonds Debt Service Reserve Account  
 Operating Fund  
 Operating Reserve Fund  
 Capital Fund  
     Turnpike Account  
     Other Projects Account  
     Settlement Account

**Deposits to Revenue Fund.** Receipts and Revenues of the Authority constituting Delaware Turnpike Revenue, Motor Fuel Tax Revenue, Document Fees and Additional Revenues shall be deposited in the Revenue Account. Earnings derived from any Fund created under the provisions of the Agreement other than the Rebate Account shall be deposited in the Investment Account.

**Use of Money in Revenue Fund.** It shall be the duty of the Trustee, on or before the 15th day of each month, to withdraw from the Revenue Account and the Investment Account an amount equal to the amount of all moneys held for the credit of those accounts on the tenth day of that month and deposit the sum so withdrawn to the credit of the following Funds in the following order (provided that the Trustee first apply amounts in the Revenue Account to the credit of the following Funds):

(a) to the credit of the Senior Bonds Principal and Interest Account, such sum, if any, required to increase the amount in said account so that it equals the total of (a) the sum obtained by multiplying one sixth (1/6) of all unpaid interest on Senior Bonds (or interest on any obligation under any Credit Facility drawn upon to purchase any Senior Bonds and required to be paid under the terms of such Credit Facility in the next six months) due and payable on or before the next succeeding Interest Payment Date by the number of months in the period beginning seven months prior to such Interest Payment Date and ending on the date of such computation (provided that with respect to Senior Bonds bearing interest at intervals more frequently than once every six months or at a variable rate, the Trustee shall deposit such amounts as are necessary to pay interest on such Senior Bonds when due as provided in the applicable Supplemental Agreement) and (b) the sum obtained by multiplying one-twelfth (1/12) of all unpaid principal of serial Senior Bonds (or amounts attributable to principal of such Senior Bonds acquired by a drawing under a Credit Facility and required to be paid under the terms of such Credit Facility in the next twelve months) due and payable on or before the date when the next installation of serial Senior Bonds shall mature by the number of whole months in the period beginning thirteen months prior to such date and ending on the date of such computation;

(b) to the credit of the Senior Bonds Redemption Account, a sum obtained by multiplying one-twelfth (1/12) of the principal amount of the then Outstanding term Senior Bonds of each series required to be retired in satisfaction of Sinking Fund Payments therefor in the next succeeding twelve months (or amounts attributable to principal of Senior Bonds acquired by a drawing under a Credit Facility and required to be paid under the terms of the Credit Facility in the next succeeding twelve months) by the number of whole months in the period beginning thirteen months prior to such date and ending on the date of such computation;

(c) to the credit of the Senior Bonds Debt Service Reserve Account such amount, if any, of the balance remaining after making the deposits under clauses (a) and (b) above (or the entire balance if less than the required amount) as may be required to make the amount then to the credit of the Senior Bonds Debt Service Reserve Account equal to the Senior Bonds Debt Service Reserve Account Requirement or such greater amount as shall be determined by the Authority pursuant to a Supplemental Agreement provided such amount is originally funded with proceeds of Bonds or satisfied by a Credit Facility;

(d) to the credit of the Junior Bonds Principal and Interest Account, such sum, if any, required to increase the amount in said account so that it equals the total of (a) the sum obtained by multiplying one sixth (1/6th) of all unpaid interest on Junior Bonds (or interest on any obligation under any Credit Facility drawn upon to acquire any Junior Bonds and required to be paid under the terms of such Credit Facility in the next six months) due and payable on or before the next succeeding Interest Payment Date by the number of whole months in the period beginning seven months prior to such Interest Payment Date and ending on the date of such computation (provided that



with respect to Junior Bonds bearing interest at intervals more frequently than once every six months or at a variable rate, the Trustee shall deposit such amounts as are necessary to pay interest on such Junior Bonds when due as provided in the applicable Supplemental Agreement) and (b) the sum obtained by multiplying one-twelfth (1/12th) of all unpaid principal of serial Junior Bonds (or amounts attributable to principal of such Bonds acquired by a drawing under a Credit Facility and required to be paid under the terms of such Credit Facility in the next twelve months) due and payable on or before the date when the next installment of serial Junior Bonds shall mature by the number of whole months in the period beginning thirteen months prior to such date and ending on the date of such computation;

(e) to the credit of the Junior Bonds Redemption Account, a sum obtained by multiplying one-twelfth (1/12th) of the principal amount of the then Outstanding term Junior Bonds of each series required to be retired in satisfaction of Sinking Fund Payments therefor in the next succeeding twelve months (or amounts attributable to principal of Junior Bonds acquired by a drawing under a Credit Facility and required to be paid under the terms of the Credit Facility in the next twelve months) by the number of whole months in the period beginning thirteen months prior to such date and ending on the date of such computation;

(f) to the credit of the Junior Bonds Debt Service Reserve Account, such amount, if any, of the balance remaining after making the deposits under clauses (d) and (e) above (or the entire balance if less than the required amount) as may be required to make the amount then to the credit of the Junior Bonds Debt Service Reserve Account equal to the Junior Bonds Debt Service Reserve Account Requirement or such greater amount as shall be determined by the Authority by resolution from time to time filed with the Trustee;

(g) to the credit of the Operating Fund, an amount necessary to increase the amount in said Fund to an amount equal to one-sixth (1/6) of the amount set forth in the Annual Budget to be expended from said Fund;

(h) if and only if the most recently-filed certificate of the Authority described in Section 4.05(d) of the Agreement (dealing with the debt service reserve fund) indicates that Test Revenues do not cover maximum Principal and Interest Requirements of the Senior Bonds Outstanding by at least 3.00 times, then to the credit of the Operating Reserve Fund, an amount necessary to increase the amount in said Fund to an amount equal to one-sixth (1/6) of the amount set forth in the Annual Budget to be expended from the Operating Fund for the Delaware Turnpike;

(i) to the credit of the Stabilization Fund, an amount, together with any other amount credited to such Fund, equal to an amount to be determined by the Authority in a Supplemental Agreement with the initial deposit required to be made to the Stabilization Fund when a determination is made by the Authority that Test Revenues are less than 3.5 times the maximum Principal and Interest Requirements on Senior Bonds Outstanding; and

(j) to the credit of the U.S. 301 Subordinate Indebtedness Account. If the Trustee receives notice on or prior to the fifteenth (15th) day of any month from the Authority or the trustee under that certain Master Trust Indenture dated as of December 1, 2015 (the "301 Indenture") between the Authority and Wilmington Trust, National Association, as trustee (the "301 Trustee") that amounts deposited in and credited to those certain funds and accounts identified in paragraphs (a) through (d), inclusive, of Section 4.2 of the 301 Indenture are less than the required amounts to be deposited therein, the Trustee shall cause the monies deposited into the U.S. 301 Subordinate Indebtedness Account on or prior to the fifteenth (15th) day of such month to be transferred as directed by the 301 Trustee to cause the balance on deposit in those funds and accounts identified in paragraphs (a) through (d), inclusive, of Section 4.2 of the 301 Indenture to equal the amounts so required. If the Trustee does not receive any notice described in the preceding sentence on or prior to the fifteenth (15th) day of any month, the Trustee shall release all monies held in the U.S. 301 Subordinate Indebtedness Account as set forth in paragraph (l) below.

(k) after all amounts have been deposited pursuant to the above paragraphs (a) through (j), inclusive, to the credit of the Non-Delaware Turnpike Operating Account, an amount equal to one-sixth (1/6) of the amount set forth in the Authority's Annual Budget for operating expenses after subtracting for such Annual Budget the amount budgeted for Turnpike Operating Expenses.

(l) the remainder, if any, to the Authority, free of the lien of the Agreement, for deposit to the Transportation Trust Fund, subject to the obligation to transfer interest earned on assets held therein to the Revenue Fund.

**Deposits to and Uses of Funds in the Capital Fund.** Bond proceeds borrowed for capital projects are deposited into the Capital Fund and disbursed by the Trustee to the Authority to pay for authorized projects in accordance with a requisition procedure provided in the Agreement. In payment of any such requisition, the Trustee is entitled to rely as to the completeness and accuracy of all statements in such requisition upon the approval of such requisition by an Authorized Authority Representative, execution thereof to be conclusive evidence of such approval.

**Deposits to and Uses of Funds in the Operating Fund.** Moneys deposited in the Operating Fund pursuant to provisions of the Agreement for the purposes of paying Turnpike Operating Expenses shall be limited to an annual growth rate equal to the greater of (i) the percentage increase in Receipts and Revenues of the Authority from the prior year or (ii) three percent (3%). Moneys in the Operating Fund shall be held by the Trustee in trust and used to pay Turnpike Operating Expenses, including all amounts required for payment by the Authority under any interest rate exchange agreement entered into by the Authority, and any other amounts contemplated to be met in the Annual Budget with respect to Turnpike Operating Expenses to the extent provision is made in the Annual Budget to meet such expenditures. Payments from the Operating Fund shall be made in accordance with the provisions of the Agreement, and before any amount shall be withdrawn from the Operating Fund, the Authority shall file with the Trustee a requisition as set forth in the Agreement.

**Deposits to and Uses of Funds in the U.S. 301 Subordinate Indebtedness Account.** Moneys deposited in the U.S. 301 Subordinate Indebtedness Account pursuant to the provisions of Supplemental Agreement No. 27 shall be held by the Trustee in trust and used to pay any deficiencies identified by the 301 Trustee in those certain funds and accounts identified in paragraphs (a) through (d), inclusive, of Section 4.2 of the 301 Indenture. If the Trustee receives notice from the 301 Trustee of any such deficiencies in those specific funds and accounts under the 301 Indenture, it shall cause the monies held in the U.S. 301 Subordinate Indebtedness Account to be transferred on or prior to the fifteenth (15th) day of such month to the 301 Trustee to cause the balances contained in such funds and accounts under the 301 Indenture to equal the amounts so required. If the Trustee does not receive any notice from the 301 Trustee on or before the fifteenth (15th) day of any month as described in the prior sentence, the Trustee shall release all monies held in the U.S. 301 Subordinated Indebtedness Account in accordance with the provisions of the Agreement.

**Deposits to and Uses of Funds in the Non-Delaware Turnpike Operating Account.** Moneys in the Non-Delaware Turnpike Operating Account shall be held by the Trustee in trust and used to pay any amounts contemplated to be met in the Annual Budget with respect to operating expenses (other than Turnpike Operating Expenses) of the Authority to the extent provision is made in the Annual Budget to meet such expenditures. Payments from the Non-Delaware Turnpike Operating Account shall be made in accordance with the provisions of the Agreement, and before any amount shall be withdrawn from the Non-Delaware Turnpike Operating Account, the Authority shall file with the Trustee a requisition as set forth in the Agreement.

**Additional Bonds; Debt Service Reserve Fund.** In addition to the requirements described in the body of this Official Statement no additional Bonds may be issued under the Agreement, unless the Trustee shall deduct from the proceeds of such additional Bonds and deposit to the credit of the appropriate account in the Debt Service Reserve Fund such amount, if any, as may be required to make the amount then to the credit of the appropriate account in the Debt Service Reserve Fund equal to the Senior Bonds Debt Service Reserve Account Requirement and/or the Junior Bonds Debt Service Reserve Account Requirement, as the case may be. The Trustee shall also deduct from such proceeds and deposit to the credit of the Stabilization Fund such amount, if any, as may be required to be deposited to the Stabilization Fund unless the Authority certifies to the Trustee that the Annual Budget has made provision for the amount required to be deposited in the current Fiscal Year and that such amount shall be available in amounts and at the times required by Supplemental Agreements.

### **Investment of Funds**

The moneys in the Funds shall, at the direction of the Authority, be invested and reinvested in Qualified Investments, provided, however, that moneys constituting proceeds of a drawing on a Credit Facility and, while the Credit Facility is in effect ensuring the payment of principal and interest on a series of Bonds, any moneys held by the Paying Agent pursuant to Section 4.10 (“Money Held in Trust”), of the Agreement or by a Tender Agent, Remarketing Agent or other similar person for the purchase or redemption of Bonds shall be invested only in Government Obligations which have a remaining term not exceeding 30 days or such shorter period as needed. Subject to the further provisions of Section 6.01 of the Agreement, such investments shall be made by the Trustee as directed and

designated by the Authority in a certificate of, or telephonic advice promptly confirmed by a certificate of, an Authorized Authority Representative. As and when any amounts thus invested may be needed for disbursements from any Fund, the Trustee shall cause a sufficient amount of such investments to be sold or otherwise converted into cash to the credit of such Fund. As long as no Event of Default (as defined in Section 9.01 (“Events of Default”) of the Agreement) shall have occurred and be continuing, the Authority shall have the right to designate the investments to be sold and to otherwise direct the Trustee in the sale or conversion to cash of the investments made with the moneys in the Funds, provided that the Trustee shall be entitled to assume conclusively the absence of any such Event of Default unless it has notice thereof within the meaning of Section 10.05 (“Notice of Event of Default”) of the Agreement.

Investments shall be made from each Fund for a period not exceeding a period during which such investments are expected to be required to be converted to cash for application by or on behalf of the Authority provided that: (a) moneys held for the credit of the Revenue Fund and the Operating Reserve Fund shall not be invested in Qualified Investments which mature or which are not subject to redemption by the Trustee, at the option of the Trustee, later than one year after the date of such investment; (b) moneys held for the credit of the Debt Service Reserve Fund shall be invested in Qualified Investments which mature or which are not subject to redemption by the Trustee, at the option of the Trustee at such times as designated by the Authority.

In furtherance of the covenant of the Authority set forth in Section 7.22 (“Rebate Account”) of the Agreement, the Trustee shall comply with any and all instructions of the Authority, given from time to time, to pay all or a portion of the moneys in the Funds not constituting part of the Trust Estate to, or upon the order of, the Department of the Treasury of the United States of America, anything in the Agreement to the contrary notwithstanding.

#### **Accounts, Reports and Audits**

The Authority covenants that it will keep an accurate record of the total cost of the Delaware Turnpike and of transfers to the State to meet the costs of other Projects financed with the proceeds of Bonds, of the Receipts and Revenues of the Authority collected from the Delaware Turnpike, of Motor Fuel Tax Revenues, of Document Fees, of Additional Revenues, if any, and of the application of such receipts and revenues. Such records shall be open during normal business hours of the Authority to the inspection of the Trustee and the holders of the Bonds and their agents and representatives.

The Authority further covenants that, in the months of January, April, July and October in each year, it will cause to be filed with the Trustee and mailed to all holders of Bonds who shall have filed their names and addresses with the Authority board for such purpose a report setting forth in respect of the preceding three months' period

- (a) in reasonable detail, the Receipts and Revenues of the Authority and the Turnpike Operating Expenses (i) for such period and (ii) for the same period of the preceding Fiscal Year,
- (b) all deposits to the credit of and withdrawals from each Fund created under the provisions of the Agreement during such period,
- (c) the details of all Bonds issued, paid, purchased or redeemed during such period,
- (d) a balance sheet as of the end of such period,
- (e) the amount on deposit at the end of such period to the credit of each such Fund, the security therefor, and the details of any investments thereof, and
- (f) any revisions during such period of the charges, fares, fees, rentals and tolls for the use or services of the Delaware Turnpike.

The Authority further covenants that promptly after the close of each Fiscal Year it will cause an audit to be made of its books and accounts relating to the Delaware Turnpike and the Receipts and Revenues of the Authority for the preceding Fiscal Year by an independent firm of certified public accountants of recognized ability and standing, to be chosen by the Authority. The Trustee shall make available to such accountants all of its books and records pertaining to the Delaware Turnpike and the Receipts and Revenues of the Authority. Promptly thereafter reports of

each such audit shall be filed with the Authority and the Trustee and copies of such reports shall be mailed by the Authority to all holders of Bonds who shall have filed their names and addresses with the Authority board for such purpose. Each such audit report shall set forth in respect of the preceding Fiscal Year the same matters as are hereinabove required for the quarterly reports, the findings of such certified public accountants as to whether the moneys received by the Authority under the provisions of the Agreement during such Fiscal Year have been applied in accordance with the provisions of the Agreement, and whether any obligations for Turnpike Operating Expenses were incurred in the preceding Fiscal Year in excess of the total amount provided for Turnpike Operating Expenses in the Annual Budget for such Fiscal Year. Such quarterly reports and audit reports shall be open at all reasonable times to the inspection of the holders of Bonds and their agents and representatives.

The Authority further covenants that it will cause any additional reports or audits relating to the Delaware Turnpike to be made as required by law and that, as often as may be requested, it will furnish to the Trustee and the holder of any Bond such other information concerning the Delaware Turnpike or the operation thereof as any of them may reasonably request.

The cost of the reports and audits referred to above shall be payable from the Operating Fund.

### **Insurance**

The Authority covenants that it will at all times, maintain, to the extent reasonably obtainable, the following insurance, with terms, conditions, provisions and costs, the Authority determines to be reasonable, subject to applicable, customary insurance practice:

- (a) Multi-risk insurance on facilities of the Delaware Turnpike of an insurable nature and of the character usually insured by those operating similar facilities, covering direct physical loss or damage from causes customarily insured against, in amounts certified to be necessary or advisable by the Authority;
- (b) Use and occupancy insurance covering loss of revenues by reason of the necessary interruption, total or partial, in the use of the Susquehanna River Bridge in the State of Maryland, in such amounts as the Authority shall certify will provide income during the period of interruption equal to the loss of Delaware Turnpike Revenues for a period of one year less the Turnpike Operating Expenses for that period;
- (c) Public liability, landlord's liability and comprehensive motor vehicle liability insurance;
- (d) During any improvement or reconstruction of the Delaware Turnpike, such insurance as is customarily carried by others under similar circumstances, unless maintained for the benefit of the Authority by contractors;
- (e) Blanket crime policies on all officers and employees of the Authority who collect or have custody of or access to revenues, receipts or income of the Delaware Turnpike or any funds of the Delaware Turnpike;
- (f) Boiler and machinery coverage; and
- (g) Any additional or other insurance determined by the Authority to be necessary or advisable.

All such insurance policies shall be carried with a responsible insurance company or companies authorized or qualified under the laws of the State to assume the risks covered by such policy or policies.

The Trustees shall deposit the proceeds of physical loss or damage insurance to the credit of an account in the Capital Fund. The Authority shall give written instructions to the Trustee concerning the use of such money. The Trustee shall deposit the proceeds of use and occupancy insurance to the credit of the Revenue Fund immediately upon receipt and such proceeds shall be used, for the purposes permitted for moneys in such Fund. Instead of any of the foregoing policies of insurance, the Authority may establish one or more self-insurance funds to cover one or more of the risks required to be covered by the foregoing policies of insurance. Any self insurance fund shall be established pursuant to a written plan for funding and coverage adopted by the Authority. The plan shall, among other things, require that: (a) all funds be deposited with a fiduciary in trust pursuant to a written agreement; (b) an actuary shall

prepare a written report recommending, among other things, the amounts to be deposited initially in the self insurance fund and the times by which such initial amounts shall be deposited; (c) a written report by an actuary, on at least a biennial basis, making recommendations on appropriate funding levels; and (d) the actuary hired by the Authority to make the foregoing reports shall be qualified and experienced.

### **Tax Law Compliance; Arbitrage Rebate**

**Tax Covenant.** The Authority covenants for the benefit of the holders of the Bonds (a) that no use of the proceeds of the Bonds or the earnings thereon will be made, and no other action will be taken, which would cause the Bonds to be “arbitrage bonds” within the meaning of Section 148(a) of the Code, (b) that all action with respect to the Bonds required to be taken to avoid characterization of the Bonds as “arbitrage bonds” under Section 148 of the Code shall be taken, (c) that the Authority will take all reasonable steps to ensure that interest on the Bonds is not included in gross income of the holder of any Bond for purposes of federal income taxation (unless such bonds are issued as federally taxable bonds) and (d) that the Authority will take no action to cause the Bonds to become “private activity bonds” as that term is used in Section 141(a) of the Code.

**Rebate Account.** The Agreement creates and establishes with the Trustee an account designated the “Delaware Transportation Authority Rebate Account” (the “Rebate Account”). The Trustee, at the direction of an Authorized Authority Representative shall transfer from the Investment Account to the Rebate Account amounts determined solely by the Authority as necessary to avoid characterization of the Bonds as “arbitrage bonds” under Section 148 of the Code. Amounts on deposit in the Rebate Account shall not be subject to any claim or charge in favor of the Trustee or any holder of a Bond. Upon receipt of written instructions from an Authorized Authority Representative, the Trustee shall pay to the United States of America amounts determined solely by the Authority and/or shall transfer amounts determined solely by the Authority to the Investment Account from the Rebate Account. All amounts on deposit in the Rebate Account may be invested in Qualified Investments at the direction of the Authority. Interest earned or profit realized on amounts invested in the Rebate Account shall be retained in the Rebate Account. The Trustee shall not be responsible for any loss or damage resulting from any action taken or omitted to be taken with respect to amounts in the Rebate Fund or any calculations made by the Authority or any other person with respect to rebate. The Trustee may conclusively rely on any instructions received from an Authorized Authority Representative with respect to rebate.

### **Other Covenants**

**Inspection of Delaware Turnpike.** The Authority covenants that it will cause its Engineering Consultants to make an inspection of the Delaware Turnpike at least once in every other year and, on or before the 1st day of October in such year, to submit to the Authority a report or reports setting forth their findings whether the Delaware Turnpike has been maintained in good repair, working order and condition.

**Use and Operation of the Delaware Turnpike.** The Authority covenants that it will establish and enforce reasonable rules and regulations governing the use of the Delaware Turnpike and the operation thereof, that all conditions of employment and all compensation, salaries, fees and wages paid by it in connection with the operation, maintenance and repair of the Delaware Turnpike will be reasonable, that no more persons will be employed by it than are necessary, that all persons employed by it will be qualified for their respective positions, that it will maintain and operate the Delaware Turnpike in an efficient and economical manner, that from the then current Receipts and Revenues of the Authority it will at all times maintain the Delaware Turnpike in good repair and in sound operating condition and will make all necessary repairs, renewals and replacements, and that it will observe and perform all of the terms and conditions contained in the Act.

**Covenants as to Tolls.** The Authority covenants that it will fix and revise from time to time, and charge and collect charges, fares, fees, rentals and tolls for the use of the Delaware Turnpike. The Authority further covenants that it will not reduce tolls in effect on the Delaware Turnpike after the date of issuance of the 2017 Bonds unless the Authority board files a certificate with the Trustee showing that the Authority would have met the tests described in Section 2.07(b)(i)(A) and (B) (“Additional Bonds Coverage Tests”) of the Agreement with respect to the Outstanding Bonds assuming a reduction in Delaware Turnpike Revenues for the applicable twelve-month period utilized in that Section 2.07(b)(i)(A) and (B) as if the reduction occurred on the first day of that period. The Authority may make any other adjustment or reclassification of toll rates or establish special toll rates for the Delaware Turnpike, provided that

such adjustment or reclassification is recommended in writing by the Authority's Traffic Consultants and will not reduce Delaware Turnpike Revenues unless the Authority meets the foregoing test. Notwithstanding the foregoing provision, the tolls in effect on August 1, 1988 shall not be reduced.

**Covenant Against Sale and Encumbrance; Exceptions.** The Authority covenants that it will not sell or otherwise dispose of or encumber the Delaware Turnpike, or any part thereof, or any other physical assets of the Authority, subject to the other provisions of the Agreement, except those physical assets which the Authority either reasonably determines to be of no use for purposes of the Authority or for which the Authority is acquiring replacements.

The Authority may lease, or grant easements, franchises or concessions for the use of any part of the Delaware Turnpike and the net proceeds of any such lease, easement, franchise or concession shall be deposited as earned to the credit of the Revenue Fund.

### **Events of Default and Remedies; Respective Rights of Senior and Junior Bondholders**

**Events of Default.** Each of the following events shall constitute and is referred to in the Agreement as an "Event of Default":

(a) a failure to pay the principal of or premium, if any, on any Bond when the same shall become due and payable at maturity, upon redemption or otherwise;

(b) a failure to pay an installment of interest on any Bond after such interest shall have become due and payable;

(c) a failure to pay an amount due in respect of a put of any Bond for a period of two (2) Business Days after such amount shall have become due and payable (or such shorter period as provided by the applicable Supplemental Agreement);

(d) a failure of the Authority to transfer to the Trustee Receipts and Revenues of the Authority pledged to the Trustee under the Agreement;

(e) failure by the State to transfer to the Authority, or a reduction by the State subsequent to the effective date of the Agreement of the rate of, the Motor Fuel Taxes, the Document Fees or any fees and taxes yielding Additional Revenues imposed by the State;

(f) receipt by the Trustee of notice from the obligor of a Credit Facility ensuring the payment of principal and interest on any series of Bonds stating that an event of default under the applicable Credit Facility has occurred and directing the Trustee to declare the series of Bonds insured by such Credit Facility to be immediately due and payable and directing the Trustee to draw on such Credit Facility;

(g) failure by the Authority to observe and perform any other covenant, condition, agreement or provision contained in the Bonds or in the Agreement on the part of the Authority to be observed or performed for the benefit of the holders of Bonds, which failure shall continue for a period of ninety (90) days after written notice, specifying such failure and requesting that it be remedied, shall have been given to the Authority by the Trustee, which may give such notice in its discretion and shall give such notice at the written request of holders of not less than 10% in principal amount of the Bonds then Outstanding of any series, unless the Trustee, or the Trustee and the holders of a principal amount of Bonds not less than the principal amount of Bonds the holders of which requested that such notice be given, as the case may be, shall agree in writing to an extension of such period prior to its expiration; provided, however, that the Trustee, or the Trustee and the holders of such principal amount of Bonds, as the case may be, shall be deemed to have agreed to an extension of such period if corrective action is initiated by the Authority within such period and is being diligently pursued;

(h) the Authority (i) files a petition under the Bankruptcy Reform Act of 1978 (the "Bankruptcy Code"), as amended or superseded, makes an assignment for the benefit of creditors, enters into a composition with creditors or commences a case or proceeding for reorganization or readjustment of its debts, for

dissolution, liquidation or commences a similar procedure under the law of any jurisdiction, whether now or hereafter in effect; (ii) is, or admits in writing that it is, insolvent, bankrupt, is unable generally to pay its debts as they become due or its debts are greater than its property net of any property which was transferred, concealed or removed with the intent to hinder, delay or defraud its creditors; (iii) applies to any government or governmental entity for the appointment of a Custodian (as such term is defined in Section 101(10) of the Bankruptcy Code) for itself or for all or any substantial or material part of its property; or (iv) has transferred, concealed or removed any of its property with intent to hinder, delay or defraud any of its creditors generally or the holders of the Bonds, in particular, or has received less than reasonably equivalent value in a transfer of all or a substantial or material part of its property; or

(i) the Authority (i) has commenced against it an involuntary case or proceeding referred to in paragraph (h) above which is not dismissed on the day of such commencement; (ii) has an order of relief entered against it in such an involuntary case or proceeding; (iii) consents to, grants approval of or acquiesces to such involuntary case or proceeding; or (iv) is subject to the appointment of a Custodian for it or all or any substantial part of its property and such Custodian is not dismissed by a court of competent jurisdiction (and all such property returned) on the day of such Custodian's appointment.

Upon the occurrence and continuation of any Event of Default other than an Event of Default described in (f) or (g) of the preceding paragraph with respect to Bonds of any series, the Trustee may, and at the written request of the holders of not less than 25% in principal amount of the Outstanding Bonds of such series or upon the occurrence and continuation of an Event of Default described in (f) of the preceding paragraph and at the written request of the obligor under a Credit Facility ensuring the payment of the principal of and interest on a series of Bonds, shall, declare such series of Bonds to be immediately due and payable, whereupon they shall, without further action become and be immediately due and payable, anything in the Agreement or in the Bonds to the contrary notwithstanding. The Trustee shall give prompt notice of acceleration to any Tender Agent and any Remarketing Agent, and shall give notice thereof by Mail to all holders of Outstanding Bonds of all series. In the case of an Event of Default described in the preceding paragraph occurring when a Credit Facility is in effect and with respect to which the Trustee is required to draw to effect an acceleration of the Bonds, the Trustee shall make the aforesaid declaration on the first Business Day on or after the occurrence of such Event of Default that the Trustee may make a drawing or drawings on such Credit Facility (but shall not make such declaration prior to such date) unless provisions to the contrary are made in the applicable Supplemental Agreement.

The provisions of the preceding paragraph, however, are subject, when no Credit Facility shall be in effect ensuring the payment of principal of and interest on a series of Bonds, to the condition that if, after the principal of any Bonds shall have been so declared to be due and payable, and before any judgment or decree for the payment of the moneys due shall have been obtained or entered as hereinafter provided, the Authority shall cause to be deposited with the Trustee a sum sufficient to pay all matured installments of interest upon all Bonds and the principal of any and all Bonds which shall have become due otherwise than by reason of such declaration (with interest upon such principal and, to the extent permissible by law, on overdue installments of interest, at the rate per annum borne by the Bonds) and such amounts as shall be sufficient to cover reasonable compensation and reimbursement of expenses payable to the Trustee (including reasonable counsel fees and expenses), and all Events of Default other than nonpayment of the principal of Bonds which shall have become due by said declaration shall have been remedied, then, in every such case, such Event of Default shall be deemed waived and such declaration and its consequences rescinded and annulled, and the Trustee shall promptly give written notice of such waiver, rescission and annulment to the Authority, any Tender Agent and any Remarketing Agent, and, if notice of the acceleration of any Bonds shall have been given to the holders of said Bonds, shall give prompt notice thereof by Mail to all holders of Outstanding Bonds; but no such waiver, rescission and annulment shall extend to or affect any subsequent Event of Default or impair any right or remedy consequent thereon.

The provisions of the second preceding paragraph are further subject to the condition that, if an Event of Default described in clause (f) of the third preceding paragraph shall have occurred and if the Trustee shall thereafter have received notice from the obligor of a Credit Facility ensuring the payment of principal of and interest on a series of Bonds (a) that the notice which caused the Event of Default to occur has been withdrawn and (b) that the amounts available to be drawn on that Credit Facility to pay (i) the principal of said Bonds or the portion of the purchase price equal to principal and (ii) interest on said Bonds and the portion of purchase price equal to accrued interest have been reinstated all in amounts that are required to maintain the then ratings on said Bonds, then, in every such case, such Event of Default shall be deemed waived and its consequences rescinded and annulled, and the Trustee shall promptly

give written notice of such waiver, rescission and annulment to the Authority, the obligor under the applicable Credit Facility, any Tender Agent and any Remarketing Agent, and, if notice of the acceleration of said Bonds shall have been given thereof, by Mail to all holders of Outstanding Bonds; but no such waiver, rescission and annulment shall extend to or affect any subsequent Event of Default or impair any right or remedy consequent thereon or the rights of holders of any other series of Bonds.

**Remedies.** Upon the occurrence and continuation of any Event of Default, then and in every such case the Trustee in its discretion may, and upon the written request of the obligor under any Credit Facility ensuring the payment of principal of and interest on a series of Bonds in respect of which an Event of Default has occurred or the holders of not less than 25% in principal amount of the Bonds of any series then Outstanding and receipt of indemnity to its satisfaction, shall, in its own name and as the Trustee of an express trust:

- (a) by mandamus, or other suit, action or proceeding at law or in, equity, enforce all rights of the holders of said Bonds and require the Authority, or the obligor under any Credit Facility ensuring the payment of principal of and interest on any Bonds to carry out any agreements with or for the benefit of the holders of said Bonds and to perform its or their duties under the Act, any Credit Facility and the Agreement;
- (b) bring suit upon said Bonds; or
- (c) by action or suit in equity enjoin any acts or things which may be unlawful or in violation of the rights of the holders of said Bonds.

Note: If the State violates its contractual obligation to impose and collect motor vehicle fuel taxes, motor vehicle document fees, motor vehicle registration fees or the fees and taxes yielding Additional Revenue at the rates in effect on the date of issuance of the 2017 Bonds or requires the use of that revenue for some purpose other than as assigned to secure the Bonds, the State would be subject to a bondholders' suit, and, under Delaware law, probably would not be able to avail itself of the defense of sovereign immunity. Payment of any award against the State obtained by a judgment creditor, however, must be appropriated by the State legislature. In addition the overriding interest of the State in promoting the health, safety and welfare of the people of the State, may affect the enforceability of the contractual obligation and may justify the impairment of the contract.

**Limitation on Holders' Right to Institute Proceedings.** No holder of a Bond of any series shall have any right to institute any suit, action or proceeding in equity or at law for the execution of any trust or power under the Agreement, or any other remedy thereunder or on the Bonds, unless such holder previously shall have given to the Trustee written notice of an Event of Default as provided in the Agreement and unless the holders of not less than 25% in principal amount of the Bonds then Outstanding of such series shall have made written request of the Trustee so to do, after the right to institute said suit, action or proceeding shall have accrued and is continuing and shall have afforded the Trustee sixty (60) days to proceed to institute the same in either its or their name, and unless there also shall have been offered to the Trustee security and indemnity satisfactory to it against the costs, expenses and liabilities to be incurred therein or thereby (including reasonable counsel fees and expenses), and the Trustee shall not have complied with such request within sixty (60) days after receipt of the request (provided no direction inconsistent with such written request has been given to the Trustee during such 60-day period by the holders of a majority in principal amount of the Outstanding Bonds of such series); and such notification, request and offer of indemnity are in every such case, at the option of the Trustee, to be conditions precedent to the institution of said suit, action or proceeding; it being understood and intended that no one or more of the holders of the Bonds of such series shall have any right in any manner whatever by his or their action to affect, disturb or prejudice the security of the Agreement, or to enforce any right thereunder or under the Bonds, except in the manner therein provided, and that all suits, actions and proceedings at law or in equity shall be instituted, had and maintained in the manner provided in the Agreement and for the equal benefit of all holders of the Bonds of such series. In any event, no one or more holders of Bonds of any series shall have any right in any manner whatever by virtue of the Agreement to affect, disturb or prejudice the rights of any other holder of Bonds of any series or to obtain priority or preference over any other holder or to enforce any right under the Agreement except in the manner or to the extent therein provided and with respect to any series, for the equal and ratable benefit of all holders of Bonds of that Series.

**Obligors' Right Under Credit Facility or Holders' Right to Direct Proceedings.** Anything in the Agreement to the contrary notwithstanding, the holders of a majority in principal amount of the Bonds then



Outstanding thereunder with respect to which an Event of Default has occurred shall have the right, by an instrument in writing executed and delivered to the Trustee, to direct the time, method and place of conducting all remedial proceedings available to the Trustee under the Agreement or exercising any trust or power conferred on the Trustee by the Agreement; provided, however, that the obligor under any Credit Facility shall have no such rights, as a holder of Bonds or a deemed holder of Bonds, in respect of proceedings taken by holders of Bonds against such obligor. For purposes of this Section, an obligor under any Credit Facility ensuring the payment of principal of and interest on any Bonds shall be deemed the holder of those Bonds, absent a default in the obligations of the obligor of that Credit Facility under the Credit Facility, unless the applicable Supplemental Agreement provides to the contrary.

**Application of Money.** Any money received by the Trustee or by any holder of a Bond pursuant to any right given or action taken under the provisions of Article IX (“Defaults and Remedies”) of the Agreement, after payment of the costs and expenses of the proceedings resulting in the collection of such money and of the expenses, liabilities and advances incurred or made by the Trustee (including reasonable counsel fees and expenses), and the payment and setting aside of reasonable and necessary amounts to meet Turnpike Operating Expenses as determined by a firm of Engineering Consultants, shall be deposited in the Debt Service Fund for such series of Bonds and all money so deposited in the Debt Service Fund for such series of Bonds during the continuance of an Event of Default (other than money for the payment of Bonds which had matured or otherwise become payable prior to such Event of Default) shall be applied as follows with respect to each series of Bonds (provided, however, that any drawing by the Trustee under a Credit Facility for the payment of principal of, or premium, if any, or interest on the Bonds shall be applied only to the payment of the principal of or premium, if any, or interest on the particular Bonds identified in the applicable Credit Facility):

(a) Under and subject to the provisions of Section 7.22 of the Agreement, to the Rebate Account in an amount, together with any other amounts on deposit or credited to, such account, sufficient to meet the Authority's obligation to make payments to the United States of America as required under Section 148 of the Code.

(b) Unless the principal of all the Bonds shall have become due and payable, all such money shall be applied (i) first, to the payment to the persons entitled thereto of all installments of interest then due on Senior Bonds, with interest on overdue installments of interest then due on such Bonds, if lawful, at the rate per annum borne by such Bonds, 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; (ii) second, to the payment to the persons entitled thereto of the unpaid principal of any Senior Bonds which shall have become due (other than such Bonds called for redemption for the payment of which money is held pursuant to the provisions of the Agreement), with interest on such Bonds at their rate from the respective dates upon which they became due and, if the amount available shall not be sufficient to pay in full such 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; (iii) third, to the payment to the persons entitled thereto of all installments of interest then due on Junior Bonds, with interest on overdue installments of interest then due on such Bonds, if lawful, at the rate per annum borne by such Bonds, 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; (iv) fourth, to the payment to the persons entitled thereto of the unpaid principal of any Junior Bonds which shall have become due (other than such Bonds called for redemption for the payment of which money is held pursuant to the provisions of the Agreement), with interest on such Bonds at their rate from the respective dates upon which they become due and, if the amount available shall not be sufficient to pay in full such 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; provided, however, that money derived from the rights of the Trustee under a Credit Facility shall not be applied to the payment of the principal of or premium, if any, or interest on any Bonds held of record by the Authority, by the obligor under a Credit Facility or by any Tender Agent or other person for the account of the Authority or other person if a Credit Facility prohibits by its terms a drawing thereunder for such purpose.

(c) If the principal of all Senior Bonds shall have become due and payable, all such money shall be applied (i) first to the payment of the principal and interest then due and unpaid upon Senior Bonds, with interest on overdue interest and principal, as aforesaid, without preference or priority of principal over interest or of interest over principal, or of any installment of interest over any other installment of interest, or of any Senior Bond

over any other Senior Bond, ratably, according to the amounts due respectively for principal and interest, to the persons entitled thereto without any discrimination or privilege; and (ii) second, to the payment of the principal and interest then due and unpaid upon Junior Bonds whether or not the principal of all Junior Bonds shall have become due and payable, with interest on overdue interest and principal, as aforesaid, without preference or priority of principal over interest or of interest over any other installment of interest, or of any Junior Bond over any other Junior Bond, ratably, according to the amounts due respectively for principal and interest, to the persons entitled thereto without any discrimination or privilege; provided, however, that money derived from the rights of the Trustee under a Credit Facility shall not be applied to the payment of the principal of or premium, if any, or interest on Bonds held of record by the Authority, by the obligor under a Credit Facility or by any Tender Agent for the account of the Authority if the applicable Credit Facility prohibits by its terms a drawing thereunder for such purpose.

(d) If the principal of all Junior Bonds shall have become due and payable and there are no Senior Bonds Outstanding, all such money shall be applied as set forth in clauses (b)(iii) and (b)(iv) above.

(e) If the principal of all the Bonds of a series shall have come due and payable, and if acceleration of the maturity of said Bonds by reason of such Event of Default shall thereafter have been rescinded and annulled under the provisions of Article IX (“Defaults and Remedies”) of the Agreement, then, subject to the provisions of clause (c) of this Section which shall be applicable in the event that the principal of all the Bonds shall later become due and payable, the money shall be applied in accordance with the provisions of clause (b) of this Section.

**Trustee's Notice of Event of Default.** The Trustee shall not be required to take notice, or be deemed to have notice, of any default or Event of Default under the Agreement (i) other than an Event of Default under clause (a), (b) or (c) of the first paragraph of Section 9.01 (“Events of Default”) of the Agreement or (ii) unless an officer of the Trustee assigned by the Trustee to administer its corporate trust matters has been specifically notified in writing of such default or Event of Default by holders of at least 25% in principal amount of the Bonds then Outstanding of any series, by the Authority, by the obligor under a Credit Facility ensuring payment of principal or interest on any series of Bonds, by a Tender Agent or in the case of an Event of Default under clause (h) or (i) of the first paragraph of Section 9.01 of the Agreement, by any holder. The Trustee may, however, at any time, in its discretion, require of the Authority full information and advice as to the performance of any of the covenants, conditions and agreements contained in the Agreement.

**Action by Trustee.** The Trustee shall be under no obligation to take any action in respect of any default or Event of Default under the Agreement with respect to Bonds of any series other than an Event of Default described in clause (f) of Section 9.01 (“Events of Default”) of the Agreement, or toward the execution or enforcement of any of the trusts thereby created, or to institute, appear in or defend any suit or other proceeding in connection therewith, unless requested in writing so to do by holders of at least 25% in principal amount of the Outstanding Bonds of such Series and, if in its opinion such action may tend to involve it in expense or liability, unless furnished, from time to time as often as it may reasonably require, with security and indemnity satisfactory to it (including reasonable counsel fees and expenses); but the foregoing provisions are intended only for the protection of the Trustee, and shall not affect any discretion or power given by any provisions of the Agreement to the Trustee to take action in respect to any default or Event of Default without such notice or request from the holders of Bonds or the obligor under a Credit Facility or without such security or indemnity.

**Notice to Owners of Event of Default.** If an Event of Default occurs of which the Trustee has notice within the meaning of Section 10.05 (“Notice of Event of Default”) of the Agreement and any such Event of Default shall continue for at least two days after the Trustee has notice thereof within the meaning of Section 10.05 of the Agreement, unless the Trustee shall have theretofore given a notice of acceleration pursuant to Section 9.01 (“Events of Default”) of the Agreement, the Trustee shall give prompt notice thereof to the Authority, any Tender Agent, any Remarketing Agent and any obligor under a Credit Facility and give notice by Publication and by Mail to all holders of Outstanding Bonds for which it is acting as Trustee. Such Trustee shall also give notice of any Event of Default to any other Trustee appointed pursuant to the Agreement and such Trustee shall likewise give prompt notice to all holders of Outstanding Bonds for which it is acting as Trustee.

## **Trustee; Paying Agents**

**Acceptance of Trusts.** The Trustee accepts and agrees to execute the trusts created by the Agreement, but only upon the additional terms set forth in Article X (“Trustee; Paying Agent and Co-Paying Agents; Registrar”) of the Agreement, to all of which the Authority agrees and the respective holders of the Bonds agree by their acceptance of delivery of any of the Bonds. By accepting and agreeing to act as Trustee for holders of Senior Bonds and/or Junior Bonds, the Trustee is agreeing to act for holders of Bonds of all series of Senior Bonds and/or Junior Bonds, as the case may be, subject to the rights of the Trustee to resign and be discharged of the trusts created by the Agreement.

**Paying Agent; Co-Paying Agents; Depositary.** The Authority shall appoint the Paying Agent for the Bonds and may at any time or from time appoint one or more Co-Paying Agents for a series of Bonds and one or more Depositaries for the receipt of Revenue and Receipts pledged to the Trustee under the Agreement, subject to the conditions set forth in Section 10.22 (“Qualifications of Paying Agent, Co-Paying Agents and Depositary; Resignation; Removal”) of the Agreement.

## **Responsibility of Fiduciaries**

Notwithstanding any other provisions of Article X of the Agreement, the Trustee shall, during the existence of an Event of Default of which the Trustee has actual notice, exercise such of the rights and powers vested in it by the Agreement and use the same degree of skill and care in their exercise as a prudent man would use and exercise under the circumstances in the conduct of his own affairs.

**Limitation on Liability.** The Trustee may execute any of the trusts or powers created under the Agreement and perform the duties required of it thereunder by or through attorneys, agents, receivers, or employees, and shall be entitled to advice of counsel concerning all matters of trust and its duty thereunder, and the Trustee shall not be answerable for the default or misconduct of any such attorney, agent, or employee selected by it with reasonable care. The Trustee shall not be answerable for the exercise of any discretion or power under the Agreement or for anything whatsoever in connection with the trust created thereby, except only for its own negligence, willful misconduct or bad faith or for failure to exercise reasonable care in the selection of any attorney, agent or employee acting thereunder. The Trustee shall notify the Authority before selecting any agent to act on behalf of the Trustee in order to permit the Authority reasonable opportunity to join in any contract with such agent. The Authority shall, from the Receipts and Revenue of the Authority, indemnify and save the Trustee harmless against any liabilities which the Trustee may incur in the exercise and performance of its powers and duties under the Agreement, except for liabilities arising out of the negligence, willful misconduct or bad faith of the Trustee.

**Good Faith Reliance.** The Trustee shall be protected and shall incur no liability in acting or proceeding in good faith upon any resolution, notice, telegram, telex, facsimile transmission, request, consent, waiver, certificate, statement, affidavit, voucher, bond, requisition or other paper or document which it shall in good faith believe to be genuine and to have been passed or signed by the proper board, body or person or to have been prepared and furnished pursuant to any of the provisions of the Agreement, or upon the written opinion of any attorney, engineer, accountant or other expert believed by the Trustee to be qualified in relation to the subject matter, and the Trustee shall be under no duty to make any investigation or inquiry as to any statements contained or matters referred to in any such instrument, but may accept and rely upon the same as conclusive evidence of the truth and accuracy of such statements.

## **Defeasance**

If the Authority shall pay or cause to be paid to the holder of any Bond secured by the Agreement the principal of and premium, if any, and interest due and payable, and thereafter to become due and payable, upon such Bond or portion of such Bond, such Bond or portion thereof shall cease to be entitled to any lien, benefit or security under the Agreement. If the Authority shall pay or cause to be paid to the holders of all the Bonds secured thereby the principal and premium, if any, and interest due and payable, and thereafter to become due and payable, thereon, and shall pay or cause to be paid all other sums payable thereunder by the Authority, including but not limited to Subordinate Indebtedness, if any, then, and in that case, the right, title and interest of the Trustee in and to the Trust Estate shall thereupon cease, terminate and become void. In such event, the Trustee shall assign, transfer and turn over to the Authority the Trust Estate, including, without limitation, any balance remaining in any Fund; provided, however, that prior to any such assignment, transfer and turning over to the Authority as aforesaid, the Trustee shall pay to any

obligor under a Credit Facility an amount equal to the lesser of (i) the total amount which the Credit Facility obligor informs the Trustee in writing is owed by the Authority to the obligor under such Credit Facility and (ii) the total amount remaining in all Funds.

All or any portion of Outstanding Bonds or portions of Bonds shall prior to the maturity or redemption date thereof be deemed to have been paid within the meaning and with the effect expressed in this Section when:

(a) in the event said Bonds or portions thereof have been selected for redemption in accordance with Section 3.02 (“Selection of Bonds to be Redeemed”) of the Agreement, the Trustee shall have given, or the Authority shall have given to the Trustee in form satisfactory to it, irrevocable instructions to give, on a date in accordance with the provisions of Section 3.03 (“Procedure for Redemption”) of the Agreement, notice of redemption of such Bonds or portions thereof; and

(b) there shall have been deposited with the Trustee either moneys in an amount which shall be sufficient, or Government Obligations which shall not contain provisions permitting the redemption thereof at the option of the issuer, the principal of and the interest on which, when due, and without any regard to reinvestment thereof, will provide moneys which, together with the moneys, if any deposited with or held by the Trustee, shall be sufficient to pay when due the principal of and premium, if any, and interest (at the maximum rate permitted, if such deposit shall be made with respect to Bonds bearing interest at the Short-Term Rate reflecting however any period during which the Short-Term Rate has been fixed at a rate or rates less than the maximum permitted rate) due and to become due on said Bonds or portions thereof on and prior to the redemption date or maturity date thereof, as the case may be; provided, however, that, if required by the Supplemental Agreement pursuant to which the Bonds were issued, such moneys shall constitute Available Moneys and that such Government Obligations either shall have been purchased with Available Moneys, or, shall otherwise qualify as Available Moneys; and

(c) in the event said Bonds or portions thereof do not mature and are not to be redeemed within the next succeeding sixty (60) days, the Authority shall have given the Trustee in form satisfactory to it irrevocable instructions to give, as soon as practicable in the same manner as a notice of redemption is given pursuant to Section 3.03 (“Procedure for Redemption”) of the Agreement, a notice to the holders of said Bonds or portions thereof that the deposit required by clause (b) above has been made with the Trustee and that said Bonds or portions thereof are deemed to have been paid in accordance with Article VIII of the Agreement and stating the maturity or redemption date upon which moneys are to be available for the payment of the principal of and premium, if any, and interest on said Bonds or portions thereof.

Neither the Government Obligations nor moneys deposited with the Trustee pursuant to Article VIII of the Agreement nor principal or interest payments on any such Government Obligations shall be withdrawn (unless a substitution is made with other Government Obligations) or used for any purpose other than, and such Government Obligations, moneys and principal or interest payments shall be held in trust for, the payment of the principal of and premium, if any, and interest on said Bonds or portions thereof, or for the payment of the purchase of said Bonds in accordance with any applicable agreement with a Tender Agent or other person; provided, that, during an Interest Period which is not a fixed rate period with respect to Bonds bearing interest at a Short-Term Rate or with respect to any Bonds bearing interest at the Long-Term Rate, such moneys, if not then needed for such purposes, shall, at the direction of an Authorized Authority Representative and to the extent practicable, be invested and reinvested in Government Obligations maturing on or prior to the earlier of (a) the date moneys shall be required for the purchase of Bonds pursuant to any applicable agreement with a Tender Agent or other person; and (b) the Interest Payment Date next succeeding the date of investment or reinvestment, and interest earned from such investments shall be paid over to the Authority, as received by the Trustee, free and clear of any trust, lien or pledge under the Agreement, unless there are insufficient other funds to redeem said Bonds; and provided, further, that, during a fixed rate period with respect to Bonds bearing interest at a Short-Term Rate or with respect to any Bonds bearing interest at the Long-Term Rate, any cash received from such principal or interest payments on such Government Obligations deposited with the Trustee, if not then needed for such purposes, shall, at the direction of an Authorized Authority Representative and to the extent practicable, be invested in Government Obligations of the type described in clause (b) of the next preceding paragraph maturing at times and in amounts sufficient to pay when due the principal of and premium, if any, and interest to become due on said Bonds or portions thereof on or prior to such redemption date or maturity date thereof, as the case may be, and interest earned from such reinvestments shall be paid over to the Authority, as received by the Trustee, free and clear of any trust, lien or pledge under the Agreement unless there are insufficient other funds to redeem said

Bonds. If payment of less than all the Bonds is to be provided for in the manner and with the effect provided in this Section, the Authority shall select such Bonds or portions of Bonds in the manner specified by Section 3.02 (“Selection of Bonds to be Redeemed”) of the Agreement for selection for redemption of less than all Bonds in the principal amount designated to the Trustee by the Authority.

### **Modification of The Agreement**

**Limitations.** The Agreement shall not be modified or amended in any respect subsequent to the first issuance of the Bonds except as provided in and in accordance with and subject to the provisions of Article XII (“Modification of This Agreement”) of the Agreement.

**Supplemental Agreements without Consent of Holders of Bonds.** The Authority and the Trustee may, from time to time and at any time, without the consent of or notice to the holders of the Bonds, enter into Supplemental Agreements as follows:

- (a) to cure any formal defect, omission, inconsistency or ambiguity in the Agreement;
- (b) to grant to or confer or impose upon the Trustee for the benefit of the holders of the Bonds any additional rights, remedies, powers, authority, security, liabilities or duties which may lawfully be granted, conferred or imposed and which are not contrary to or inconsistent with the Agreement as theretofore in effect;
- (c) to add to the covenants and agreements of, and limitations and restrictions upon, the Authority in the Agreement, other covenants, agreements, limitations and restrictions to be observed by the Authority which are not contrary to or inconsistent with the Agreement as theretofore in effect, including, but not limited to, agreements to pledge Additional Revenues to the Trustee for the benefit of the holders of the Bonds;
- (d) to confirm, as further assurance, any pledge under, and the subjection to any claim, lien or pledge created or to be created by, the Agreement, of the Receipts and Revenues of the Authority pledged or to be pledged under the Agreement or of any other moneys, securities or funds;
- (e) to authorize the issuance of additional Bonds pursuant to the Agreement, to authorize a different denomination or denominations of the Bonds or to permit the issuance of the Bonds in the form of coupon Bonds and to make correlative amendments and modifications to the Agreement regarding exchangeability of Bonds of different denominations and forms, redemptions of portions of Bonds of particular denominations and forms and similar amendments and modifications of a technical nature;
- (f) to modify, alter, amend or supplement the Agreement in any and all respects which may be necessary, desirable or appropriate in connection with any supplement to the Agreement relating to the priority of sources of funds derived from a Credit Facility to be used for the payment of the principal of and premium, if any, and interest on the Bonds, changes to the provisions relating to the priority of sources of funds derived from a Credit Facility to be used for the purchase of Bonds and, changes to the default provisions referred to in Section 9.01(c) or (f) (“Events of Default”) of the Agreement;
- (g) to modify, alter, supplement or amend the Agreement in such manner as shall permit the qualification thereof under the Trust Indenture Act of 1939, as from time to time amended;
- (h) to modify, alter, supplement or amend the Agreement in such manner as shall be necessary, desirable or appropriate in order to provide for the registration and registration of transfer of the Bonds through a book-entry or similar method, whether or not the Bonds are evidenced by certificates;
- (i) to provide a method for the determination of a Short-Term Rate; and
- (j) to modify, alter, amend or supplement the Agreement in any other respect which is not materially adverse to the holders of the Bonds and which does not involve a change described in clause (i), (ii), (iii) or (iv) of Section 12.03(a) (“Supplemental Agreements with Consent of Holders of Bonds”) of the Agreement.

Before the Authority and the Trustee shall enter into any Supplemental Agreement pursuant to this Section, there shall have been delivered to the Trustee an opinion of Bond Counsel stating that such Supplemental Agreement is authorized or permitted by the Agreement and the Act, complies with their respective terms, will, upon the execution and delivery thereof, be valid and binding upon the Authority in accordance with its terms and does not adversely affect the exclusion from gross income of the interest on the Bonds for purposes of Federal income taxation.

**Supplemental Agreements with Consent of Holders of Bonds.** (a) Except for any Supplemental Agreement entered into pursuant to Section 12.02 (“Supplemental Agreements without Consent of Holders of Bonds”) of the Agreement, subject to the terms and provisions contained in this Section and not otherwise, the holders of not less than fifty-one (51) percent in aggregate principal amount of the Bonds then Outstanding which would be adversely affected thereby shall have the right from time to time to consent to and approve the execution and delivery by the Authority and the Trustee of any Supplemental Agreement deemed necessary or desirable by the Authority for the purposes of modifying, altering, amending, supplementing or rescinding, in any particular, any of the terms or provisions contained in the Agreement; provided, however, that, unless approved in writing by the holders of all the Bonds then Outstanding which would be adversely affected thereby, nothing therein contained shall permit, or be construed as permitting, (i) a change in the times, amounts or currency of payment of the principal of or premium, if any, or interest on any Outstanding Bond, a change in the purchase price or time of purchase of Bonds put pursuant to the terms thereof, a reduction in the principal amount or redemption price of any Outstanding Bond or a change in the method of determining the rate of interest thereon, or (ii) the creation of a claim or lien upon, or a pledge of, the Receipts and Revenues of the Authority pledged under the Agreement ranking prior to or on a parity with the claim, lien or pledge created by the Agreement, or (iii) a preference or priority of any other Bond or Bonds over any other Bond or Bonds, or (iv) a reduction in the aggregate principal amount of Bonds the consent of the holders of the Bonds of which is required for any such Supplemental Agreement.

(b) If at any time the Authority shall request the Trustee to enter into any Supplemental Agreement for any of the purposes of this Section, the Trustee shall cause notice of the proposed Supplemental Agreement to be given by Publication at least once a week for two successive weeks, and by Mail to all holders of Outstanding Bonds. Such notice shall briefly set forth the nature of the proposed Supplemental Agreement and shall state that a copy thereof is on file at the office of the Trustee for inspection by all holders of Bonds.

(c) Within two years after the date of the first publication of such notice, the Authority and the Trustee may enter into such Supplemental Agreement in substantially the form described in such notice only if there shall have first been delivered to the Trustee (i) the required consents, in writing, of the holders of the Bonds and (ii) an opinion of Bond Counsel stating that such Supplemental Agreement is authorized or permitted by the Agreement and the Act, complies with their respective terms and, upon the execution and delivery thereof, will be valid and binding upon the Authority in accordance with its terms and will not adversely affect the exclusion from gross income of the interest on the Bonds for purposes of Federal income taxation.

(d) If the holders of not less than the percentage of Bonds required by this Section shall have consented to and approved the execution and delivery thereof, no holder of a Bond shall have any right to object to the execution and delivery of such Supplemental Agreement, or to object to any of the terms and provisions contained therein or the operation thereof, or in any manner to question the propriety of the execution and delivery thereof, or to enjoin or restrain the Authority or the Trustee from executing and delivering the same or from taking any action pursuant to the provisions thereof.

(e) Subject to the terms and provisions contained in this subsection (e) of this Section, the holders of all the Bonds at any time Outstanding shall have the right, and the Authority and the Trustee by their execution and delivery of the Agreement expressly confer upon such holders the right to modify, alter, amend or supplement the Agreement in any respect, including without limitation in respect of the matters described in clauses (i), (ii), (iii) and (iv) of the proviso contained in subsection (a) of this Section, by delivering to the Authority and the Trustee a written instrument or instruments, executed by or on behalf of such holders, containing a form of Supplemental Agreement which sets forth such modifications, alterations, amendments and supplements, and, upon the expiration of a thirty (30) day period commencing on the date of such delivery during which no notice of objection shall have been delivered by the Authority and the Trustee to such holders at an address specified in such written instrument, such Supplemental Agreement shall be deemed to have been approved and confirmed by the Authority and the Trustee, to the same extent as if actually executed and delivered by the Authority and the Trustee and such

Supplemental Agreement shall thereupon become and be for all purposes in full force and effect without further action by the Authority and the Trustee. The foregoing provisions are, however, subject to the following conditions:

(i) no such Supplemental Agreement shall in any way affect the limited nature of the obligations of the Authority under the Agreement as set forth in Sections 2.06 (“Security for the Bonds”) and 7.01 (“Payment of Bonds”) thereof or shall adversely affect any of its rights thereunder;

(ii) no such Supplemental Agreement shall be to the prejudice of the obligor under any Credit Facility, the Paying Agent or Co-Paying Agent, any Depository, the Registrar, any Tender Agent, or any Remarketing Agent; and

(iii) there shall have been delivered to the Authority and the Trustee an opinion of Bond Counsel stating that such Supplemental Agreement is authorized or permitted by the Agreement and the Act, complies with their respective terms, will, upon the expiration of the aforesaid thirty (30) day period, be valid and binding upon the Authority in accordance with its terms and will not adversely affect the exclusion from gross income of the interest on the Bonds for the purposes of Federal income taxation.

**Effect of Supplemental Agreement.** Upon the execution and delivery of any Supplemental Agreement pursuant to the provisions of the preceding Sections, the Agreement shall be, and be deemed to be, modified, altered, amended or supplemented in accordance therewith, and the respective rights, duties and obligations under the Agreement of the Authority, the Trustee and all holders of Bonds then Outstanding shall thereafter be determined, exercised and enforced under the Agreement subject in all respects to such modifications, alterations, amendments and supplements.

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APPENDIX B

Form of Continuing Disclosure Agreement

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**DELAWARE TRANSPORTATION AUTHORITY  
TRANSPORTATION SYSTEM SENIOR REVENUE BONDS, SERIES 2019**

**CONTINUING DISCLOSURE AGREEMENT**

This Continuing Disclosure Agreement dated as of September 10, 2019 (the “**Disclosure Agreement**”) is executed and delivered by THE DELAWARE TRANSPORTATION AUTHORITY (as more fully defined below, the “**Authority**”) in connection with the issuance of the Authority’s \$137,135,000 Transportation System Senior Revenue Bonds, Series 2019 (the “**2019 Bonds**”). The Authority, intending to be legally bound, hereby covenants and agrees as follows:

SECTION 1. Purpose of the Disclosure Agreement. This Disclosure Agreement is being executed and delivered by the Authority for the benefit of the Holders from time to time of the Bonds (as defined below) and in order to assist the Participating Underwriters in complying with S.E.C. Rule 15c2-12(b)(5).

SECTION 2. Definitions. In addition to the definitions set forth in the Trust Agreement, which apply to any capitalized terms used in this Disclosure Agreement unless otherwise defined in this Section, the following capitalized terms shall have the following meanings:

“**Additional Bonds**” shall mean any indebtedness of the Authority issued subsequent to the 2019 Bonds which the Authority has declared in writing to be covered by this Disclosure Agreement.

“**Annual Report**” shall mean any Annual Report provided by the Authority pursuant to, and as described in, Sections 3 and 4 of this Disclosure Agreement.

“**Authority**” shall mean The Delaware Transportation Authority, or any successor Obligated Person that assumes either by operation of law or by contract or both (i) the obligation to pay debt service on the Bonds and (ii) the obligations of the Authority under this Disclosure Agreement.

“**Bonds**” shall mean the 2019 Bonds and any Additional Bonds, if any.

“**Dissemination Agent**” shall mean any agent of the Authority designated in writing by the Authority which has filed with the Authority a written acceptance of such designation.

“**EMMA**” shall mean the Electronic Municipal Market Access System maintained by the MSRB at <http://emma.msrb.org/>, which serves as the sole nationally recognized municipal securities information repository under the Rule.

“**Financial Obligation**” means a (i) debt obligation; (ii) derivative instrument entered into in connection with, or pledged as security or a source of payment for, an existing or planned debt obligation; or (iii) guarantee of (i) or (ii). The term Financial Obligation shall not include municipal securities as to which a final official statement has been provided to the MSRB consistent with the Rule.

“**Holder**” means any person (a) having the power, directly or indirectly, to vote or consent with respect to, or to dispose of ownership of, any Bonds (including persons holding Bonds through nominees, depositories or other intermediaries) or (b) treated as the owner of any Bonds for federal income tax purposes.

“**MSRB**” shall mean the Municipal Securities Rulemaking Board, or any successor organization.

“**Notice Event**” shall mean any of the events listed in Section 5(a) of this Disclosure Agreement.

“**Obligated Person**” shall have the meaning set forth in the Rule, provided that the sole objective criteria used to select the Obligated Person shall be the entity obligated to repay all debt service with respect to the relevant Bonds.

“**Official Statement**” shall mean the final Official Statement relating to the 2019 Bonds or a Series of Additional Bonds, as applicable.

“**Participating Underwriter**” shall mean any of the original underwriters of any Bonds required to comply with the Rule in connection with the offering of such Bonds.

“**Repository**” shall mean each nationally recognized municipal securities information repository under the Rule. **As of the date hereof, the Securities and Exchange Commission has appointed the MSRB through EMMA to act as the sole Repository.** Any information filed in connection with this Disclosure Agreement shall be filed with EMMA at <http://emma.msrb.org/>, any State Repository and any future Repository as may be required under the Rule.

“**Rule**” shall mean Rule 15c2-12 adopted by the Securities and Exchange Commission under the Securities Exchange Act of 1934, as heretofore amended, and as such Rule may be hereafter amended from time-to-time.

“**State**” shall mean the Department of Finance of the State of Delaware, to the attention of the Director of Bond Finance.

“**State Repository**” shall mean any public or private repository or entity designated by the State of Delaware as a state repository for the purpose of the Rule and with which the Authority is legally required to file the Annual Report. Currently, there is no State Repository in Delaware. The list of state information repositories maintained by the United States Securities and Exchange Commission shall be conclusive as to the existence of a State Repository.

“**Trust Agreement**” shall mean the Trust Agreement dated as of August 1, 1988 between the Authority and Wilmington Trust Company, as amended.

“**2019 Bonds**” shall mean the Authority’s \$137,135,000 aggregate principal amount General Obligation Bonds, Series 2019 dated September 10, 2019.

### SECTION 3. Provision of Annual Reports.

(a) The Authority shall, or shall cause the Dissemination Agent to, not later than the first day of the eighth calendar month immediately following the end of the Authority's fiscal year, provide to the State and each Repository an Annual Report which is consistent with the requirements of Section 4 of this Disclosure Agreement. Not later than fifteen (15) Business Days prior to said date, the Authority shall provide the Annual Report to the Dissemination Agent, if any. The Annual Report may be submitted as a single document or as separate documents comprising a package, and may cross-reference other information as provided in Section 4 of this Disclosure Agreement;

provided, however, that audited financial statements of the Authority may be submitted separately from the balance of the Annual Report.

(b) If the Authority is unable to provide the Annual Report to Repositories by the date required in subsection (a), a Notice Event pursuant to Section 5(a)(17) shall be deemed to have occurred and the Authority shall report to the Repository electronically in accordance with the provisions of Section 5(b) hereof.

(c) The Dissemination Agent, if any, shall (i) determine each year prior to the date for providing the Annual Report the name and address of each Repository; and (ii) file a report with the Authority certifying that the Annual Report has been filed pursuant to this Disclosure Agreement, stating the date it was provided and listing all the Repositories to which it was provided.

(d) Audited financial statements of the Authority not submitted as part of the Annual Report shall be provided to each Repository, if and when available to the Authority, and in any event not more than thirty (30) days after receipt thereof from the Authority's auditors. In the event that audited financial statements are not submitted as part of the Annual Report, the Authority shall provide in lieu thereof unaudited financial statements for the relevant fiscal year.

(e) The Authority shall promptly provide written notice of any change in its fiscal year to the MSRB and to each Repository.

#### SECTION 4. Content of Annual Reports

(a) The Authority's Annual Report shall contain or incorporate by reference the information listed in Exhibit A with respect to the relevant fiscal year.

(b) Any or all of the information required may be incorporated by reference from other documents, including official statements of debt issues of the Authority or related public entities, which have been submitted to each of the Repositories or the Securities and Exchange Commission. If the document incorporated by reference is a final official statement, it must be available from the MSRB. The Authority shall clearly identify each such other document so incorporated by reference.

(c) If any information described in Section 4(a) above can no longer be generated because the operations to which such information relates have been materially changed or discontinued, a statement to that effect shall satisfy the obligations of the Authority under this Section 4, provided however that the Authority shall, to the greatest extent feasible, provide in lieu thereof similar information with respect to any substitute or replacement operations.

#### SECTION 5. Reporting of Significant Events.

(a) This Section 5 shall govern the giving of notices of the occurrence of any of the following events with respect to the Bonds:

1. Principal and interest payment delinquencies;
2. Non payment-related defaults, if material;
3. Unscheduled draws on debt service reserves reflecting financial difficulties;

4. Unscheduled draws on credit enhancements reflecting financial difficulties;
5. Substitution of credit or liquidity providers, or their failure to perform;
6. 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 security, or other material events affecting the tax status of the security;
7. Modifications to rights of Bondholders, if material;
8. Bond calls (other than mandatory sinking fund redemption), if material, and tender offers;
9. Defeasance of Bonds;
10. Release, substitution, or sale of property securing repayment of any Bonds, if material;
11. Rating changes;
12. Bankruptcy, insolvency, receivership or similar event of the Authority (for the purposes of the event identified in subsection 5(a)(12), the event is considered to occur when any of the following occur: the appointment of a receiver, fiscal agent or similar officer for the Authority 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 Authority, 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 Authority);
13. The consummation of a merger, consolidation, or acquisition involving the Authority or the sale of all or substantially all of the assets of the Authority, 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;
14. Appointment of a successor or additional trustee or the change of name of a trustee, if material;
15. Incurrence of a Financial Obligation of the Authority, if material, or agreement to covenants, events of default, remedies, priority rights, or

other similar terms of a Financial Obligation of the Authority, any of which affect security holders, if material;

16. Default, event of acceleration, termination event, modification of terms, or other similar events under the terms of the Financial Obligation of the Authority, any of which reflect financial difficulties; and
17. Failure to provide annual financial information as required.

(b) Upon the occurrence of a Notice Event, the Authority shall file, or cause the Dissemination Agent to file, a notice of such occurrence with the MSRB via EMMA in a timely manner not in excess of ten (10) Business Days after the occurrence of the Notice Event.

SECTION 6. Accounting Standards. The financial statements described in Section 4(a)(i) above shall be audited in accordance with generally accepted accounting principles applicable in the preparation of financial statements of the Authority as promulgated by the Financial Accounting Standards Board, the Governmental Accounting Standards Board, or such other body recognized as authoritative by the American Institute of Certified Public Accountants or any successor body, as applicable (“GAAP”), and shall also comply with applicable federal and state auditing statutes, regulations, standards and/or guidelines. The Authority may from time-to-time modify its accounting principles to the extent necessary or desirable to comply with changes in either GAAP or applicable federal and state statutes, regulations, standards and/or guidelines. Any such modification of accounting standards or principles to conform to changes in either GAAP or applicable federal or state auditing statutes, regulations, standards or guidelines shall not constitute an amendment to this Disclosure Agreement within the meaning of Section 9 hereof, but such modifications shall be disclosed in the first Annual Report to be provided subsequent to such modifications.

SECTION 7. Termination of Reporting Obligation. The Authority's obligations under this Disclosure Agreement shall terminate upon (a) the legal defeasance, prior redemption or payment in full of all of the Bonds or (b) the assumption by a successor Obligated Person of all of the obligations of the prior Obligated Person both hereunder and under the Bonds. The prior Obligated Person shall provide timely written notice to each Depository of any termination of its obligations hereunder.

SECTION 8. Dissemination Agent. The Authority may, from time to time, appoint or engage a Dissemination Agent to assist it in carrying out its obligations under this Disclosure Agreement, and may discharge any such agent, with or without appointing a successor Dissemination Agent.

SECTION 9. Amendments.

(a) Notwithstanding any other provision of this Disclosure Agreement, the Authority may modify or amend this Disclosure Agreement. The Authority acknowledges and agrees that the current SEC interpretation of the Rule requires satisfaction of the following preconditions for any amendment:

(i) the modification or amendment is being made in connection with a change of circumstances that arises from a change in legal requirements, change in law, change in the identity, nature or status of the Authority, or change in the type of business conducted by the Authority;

(ii) this Disclosure Agreement, as amended, would have complied with the requirements of the Rule as of the date of issuance of the relevant Bonds, after

taking into account any amendment or interpretations of the Rule, as well as any change in circumstances; and

(iii) the modification or amendment does not materially adversely affect the interests of Holders, as determined either by a party unaffiliated with the Authority (such as the Trustee or nationally recognized bond counsel) or by an approving vote of a majority of Holders.

(b) The Authority shall report any modification or amendment of this Disclosure Agreement as required by the Rule. To the extent required by the Rule, the Authority shall include as a component of the first Annual Report to be provided subsequent to the relevant amendment, a copy of the amendment, together with a notice explaining in narrative form both (i) the reasons for the amendment, and (ii) the impact of the change in the type of operating data or financial information being provided. To the extent required by the Rule, if the amendment relates to changes in accounting principles to be followed in preparing financial statements, the first Annual Report to be provided subsequent to the relevant amendment shall also include a comparison between the financial statements or information prepared on the basis of the new accounting principles and those prepared on the basis of the former accounting principles and a qualitative (and to the extent reasonably feasible, quantitative) discussion of the differences in the accounting principles and the impact of the change in the accounting principles upon the presentation of the financial information. Written notice of any such change in accounting principles shall be provided in a timely fashion to each Repository.

(c) Neither a supplement to this Disclosure Agreement to declare that it is applicable to Additional Bonds or a modification of accounting principles or standards pursuant to Section 6 shall be considered an amendment for purposes of this Section 9.

SECTION 10. Additional Information. Nothing in this Disclosure Agreement shall be deemed to prevent the Authority from disseminating any other information, using the means of dissemination set forth in this Disclosure Agreement or any other means of communication, or including disclaimers or any other information in any Annual Report or notice of occurrence of a Notice Event, in addition to that which is required by this Disclosure Agreement. If the Authority chooses to include any information in any Annual Report or notice of occurrence of a Notice Event in addition to that which is specifically required by this Disclosure Agreement, the Authority shall have no obligation under this Agreement to update such information or include it in any future Annual Report or notice of occurrence of a Notice Event.

SECTION 11. Submission of Information to the MSRB. The information required to be disclosed pursuant to this Disclosure Agreement shall be submitted to the MSRB through EMMA. Subject to future changes in submission rules and regulations, such submissions shall be provided to the MSRB, through EMMA, in portable document format (“PDF”) files configured to permit documents to be saved, viewed, printed and retransmitted by electronic means. Such PDF files shall be word-searchable (allowing the user to search for specific terms used within the document through a search or find function available in a software package).

Subject to future changes in submission rules and regulations, at the time that such information is submitted through EMMA, the Authority, or any Dissemination Agent engaged by the Authority, shall also provide to the MSRB information necessary to accurately identify the category of information being provided and other identifying descriptions required by MSRB rules and regulations.

SECTION 12. Default. In the event of a failure of the Authority to comply with any provisions of this Disclosure Agreement, the Trustee, any Participating Underwriter or any Holder may



take such actions as may be necessary and appropriate, including seeking a writ of mandamus or specific performance by court order to cause the Authority to comply with its obligations under this Disclosure Agreement. A default under this Disclosure Agreement shall not be deemed an Event of Default under the Trust Agreement, and the sole remedy under this Disclosure Agreement in the event of any failure of the Authority to comply with this Disclosure Agreement shall be an action to compel performance; provided however that nothing herein shall limit any Holder's rights under applicable federal securities law.

SECTION 13. Severability. In case any section or provision of this Disclosure Agreement or any covenant, stipulation, obligation, agreement, or action, or any part thereof, made, assumed, entered into or taken under this Disclosure Agreement, or any application thereof, is for any reason held to be illegal or invalid or is at any time inoperable, such illegality, invalidity or inoperability shall not affect the remainder thereof or any other section or provision of the Disclosure Agreement, or any other covenant, stipulation, obligation, agreement, act or action, or part thereof, made, assumed, entered into or taken under this Disclosure Agreement, which shall at the time be construed and enforced as if such illegal or invalid or inoperable portion were not contained therein.

SECTION 14. Entire Agreement. This Disclosure Agreement contains the entire agreement of the Authority with respect to the subject matter hereof and supersedes all prior arrangements and understandings with respect thereto, provided, however, that this Disclosure Agreement shall be interpreted and construed with reference to and in *pari materia* with the Rule.

SECTION 15. Captions. The captions or headings herein shall be solely for convenience of reference and shall in no way define, limit or describe the scope or intent of any provisions or sections hereof.

SECTION 16. Beneficiaries. This Disclosure Agreement is being entered into solely for the benefit of the Participating Underwriters and Holders from time to time of the Bonds, and nothing in this Disclosure Agreement expressed or implied is intended to or shall be construed to give to any other person or entity any legal or equitable right, remedy or claim under or in respect to this Disclosure Agreement or any covenants, conditions or provisions contained herein.

SECTION 17. Governing Law. This Disclosure Agreement shall be deemed to be a contract made under the laws of the State of Delaware, and all provisions hereof shall be governed and construed in accordance with the laws of the State of Delaware, without reference to the choice of law principles thereof.

IN WITNESS WHEREOF, the Delaware Transportation Authority has caused this Disclosure Agreement to be duly executed as of the day and year first above written.

DELAWARE TRANSPORTATION AUTHORITY

(SEAL)

By: \_\_\_\_\_  
Transportation Trust Fund Administrator

**EXHIBIT A****CONTENTS OF ANNUAL REPORT**

The Annual Report shall contain the following with respect to the prior fiscal year:

1. Audited financial statements in form and content substantially the same as those incorporated by reference to the Authority's Official Statement with respect to the Bonds;
2. An update of the type of information included in the below-listed tables in the Official Statement:
  - (a) Summary of Revenue Dedicated to the Trust Fund (p. 7);
  - (b) Summary Results (p. 11);
  - (c) History of Gallonage and Revenue from Motor Fuel Taxes (p. 27);
  - (d) Vehicle Trips and Delaware Turnpike Revenue (p. 32);
  - (e) Delaware Turnpike Barrier Tolls (p. 34);
  - (f) Route 1 Toll Schedule and the amount of toll revenue received from the Route 1 Toll Road during the prior fiscal year (pp. 36-37);
  - (g) History of Motor Vehicle Document Fees (p. 38);
  - (h) History of Motor Vehicle Registrations and Revenue (p. 42); and
  - (i) History of Miscellaneous Transportation Revenue (p. 46);
3. A statement of the proposed capital authorizations which have been approved for the current fiscal year (p. 52).

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APPENDIX C

Proposed Form of Opinion of Bond Counsel

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September 10, 2019

DELAWARE TRANSPORTATION AUTHORITY  
TRANSPORTATION SYSTEM SENIOR REVENUE BONDS, SERIES 2019

TO THE PURCHASERS OF THE ABOVE-CAPTIONED BONDS:

We have acted as bond counsel in connection with the issuance on the date hereof by the Delaware Transportation Authority (the "Authority"), a body politic and corporate constituting a public instrumentality of The State of Delaware (the "State"), of its \$137,135,000 Delaware Transportation Authority Transportation System Senior Revenue Bonds, Series 2019 (the "Bonds"). The Bonds are dated the date of issuance, and are subject to redemption, in whole or in part, at the times, in the manner and upon the terms set forth in the Bonds.

The Bonds are issued pursuant to Chapter 13, Title 2, Delaware Code, as amended, and Chapter 14, Title 2, Delaware Code, as amended (collectively, the "Act"), a Trust Agreement dated as of August 1, 1988, by and between the Authority and Wilmington Trust Company, a State banking corporation ("WTC") (WTC, not in its individual capacity but solely as trustee, the "Trustee"), as amended and supplemented, including by Supplemental Agreement No. 30, dated September 10, 2019 (the "Trust Agreement"), and a resolution of the Authority dated August 28, 2019 (the "Resolution"), and other laws of the State, for the purposes of paying the costs of certain capital projects, funding a deposit to the debt serve reserve fund and paying the costs of issuing the Bonds.

As bond counsel, we have examined an executed counterpart of the Trust Agreement, a certified copy of the Resolution, the form of the Bonds and applicable laws. In addition, we have examined originals (or copies certified or otherwise identified to our satisfaction) of such other instruments, certificates and documents as we have deemed necessary for the purposes of the opinion rendered below, including the Authority's Tax Certificate (the "Tax Certificate"). In such examination, we have assumed the genuineness of all signatures, the authenticity of all documents submitted to us as originals and the conformity to the original documents of all documents submitted to us as copies. We have relied upon the aforesaid instruments, certificates and documents as to any facts material to our opinion, when relevant facts were not independently established and on the performance of the covenants of the Authority contained in the Resolution. We have relied, as to the execution, authentication and delivery of, and payment for, the Bonds, on certificates of the Authority and the Trustee.

Based on the foregoing, we are of the opinion, on the date hereof, that:

- (1) The Authority is a body politic and corporate constituting a public instrumentality of the State duly created and validly existing under and by virtue of the Act.
- (2) The Resolution has been duly adopted by the Authority, is in full force and effect and is a legal, valid and binding obligation of the Authority, enforceable in accordance with its terms.
- (3) The Authority has duly authorized, executed and delivered the Trust Agreement and the Trust Agreement constitutes a legal, valid and binding obligation of the Authority enforceable against the Authority in accordance with its terms.

(4) The Bonds constitute legal and valid limited obligations of the Authority enforceable against the Authority in accordance with their terms. The Bonds are entitled to the benefits and the security, and are subject only to the terms and conditions, set forth in the Resolution and the Trust Agreement.

(5) Interest on the Bonds is not includable in gross income for purposes of federal income taxation under existing statutes, regulations, rulings and court decisions. The opinion set forth in the preceding sentence is subject to the condition that the Authority comply with all applicable federal income tax law requirements that must be satisfied subsequent to the issuance of the Bonds in order that interest thereon continues to be excluded from gross income for purposes of federal income taxation. Failure to comply with certain of such requirements could cause the interest on the Bonds to be includable in gross income retroactive to the date of issuance of the Bonds. The Authority has covenanted to comply with all such requirements. Interest on the Bonds is not treated as an item of tax preference for purposes of federal alternative minimum taxes. We express no opinion regarding other federal tax consequences relating to the Bonds or the receipt of interest thereon.

(6) Under existing statutes, the Bonds, interest on the Bonds and their transfer shall be exempt from taxation by the State and its political subdivisions, except for estate, inheritance or gift taxes imposed by the State.

The foregoing opinions relating to the enforceability against the Authority of the Resolution, the Trust Agreement and the Bonds are qualified to the extent that enforceability may be limited by bankruptcy, insolvency, reorganization, moratorium or other similar laws affecting the rights and remedies of creditors generally, and general principles of equity.



APPENDIX D

“Update Letter” dated July 2, 2019 to “Traffic & Revenue Report, I-95/Delaware Turnpike and SR 1 Toll Road” dated September 27, 2016

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Stantec Consulting Services Inc.  
400 Davis Drive Suite 400, Plymouth Meeting PA 19462-1718

July 2, 2019  
File: 193410449

**Ms. Jennifer Cohan**  
Secretary of Transportation  
Delaware Department of Transportation  
800 Bay Road/Route 113  
Dover, DE, 19903

**Attn: Mr. Brian Motyl, Assistant Director of Finance**

Reference: Update-Letter, Traffic & Revenue Forecasts, I-95/Delaware Turnpike and SR 1 Toll Road

At your request, Stantec Consulting Services Inc. (“Stantec”) has prepared this letter to update the Traffic and Revenue Report for the Delaware Turnpike and Route 1 Toll Road (the “September 2016 Report”) prepared by Stantec. The September 2016 Report was prepared in connection with the issuance by the Delaware Transportation Authority Revenue Bond Series 2017.

This Update-Letter compares the anticipated change in traffic and revenue for FY 2017-2019 from the September 2016 Report against the actual FY 2017-2019 results and provides an assessment of the previous forecast along with any necessary adjustments based on the latest unaudited transaction and revenue data provided by DelDOT. Note that this Update-Letter should be read in conjunction with the September 2016 Report for the descriptive material on the two toll projects and the traffic and revenue detail that it contains.

### **I-95/Delaware Turnpike Update**

A summary of the monthly change in traffic and toll revenue on the Delaware Turnpike from FY 2016 to FY 2019 is shown in Tables A and B on the following page. The change across different years is described in the following sections:

- For FY 2017, traffic increased 2.0 percent from FY 2016 and toll revenue has increased 1.9 percent. The average toll rate remains unchanged from FY 2016 to FY 2017 at \$4.57. The E-ZPass participation rate increased from 73.1 percent in FY 2016 to 75.0 percent in FY 2017.
- For FY 2018, traffic decreased 0.6 percent from FY 2017 and toll revenue increased 0.1 percent. The revenue increase is mostly due to the slight increase in truck share, which also contributed to the slight increase in average toll rate to \$4.60. The E-ZPass participation rate increased to 77.6 percent.

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**Table A: I-95/Delaware Turnpike Monthly Traffic and Toll Revenue (Total), FY 2016-19**

Month	Transaction						Revenue									
	FY 2016	FY 2017	YOY Growth	FY 2018	YOY Growth	FY 2019 <sup>(1)</sup>	YOY Growth	FY 2016-19 CAGR	FY 2016	FY 2017	YOY Growth	FY 2018	YOY Growth	FY 2019 <sup>(1)</sup>	YOY Growth	FY 2016-19 CAGR
July	2,661,249	2,787,231	4.7%	2,728,822	-2.1%	2,616,464	-4.1%	-0.3%	\$11,963,243	\$12,445,196	4.0%	\$12,248,932	-1.6%	\$11,850,880	-3.2%	-0.3%
August	2,720,921	2,698,240	-0.8%	2,697,070	0.0%	2,652,038	-1.7%	-0.9%	\$12,166,295	\$12,188,757	0.2%	\$12,222,479	0.3%	\$12,041,286	-1.5%	-0.3%
September	2,099,591	2,203,199	4.9%	2,252,357	2.2%	2,189,332	-2.8%	1.4%	\$9,674,306	\$10,123,347	4.5%	\$10,347,462	2.2%	\$10,100,875	-1.4%	1.4%
October	2,180,924	2,259,454	3.6%	2,265,692	0.2%	2,193,855	-3.2%	0.2%	\$10,054,184	\$10,206,369	1.5%	\$10,498,003	2.3%	\$10,267,826	-1.7%	0.7%
November	2,261,931	2,296,883	1.5%	2,305,909	0.4%	2,288,424	-0.8%	0.4%	\$10,265,858	\$10,443,183	1.7%	\$10,584,294	1.4%	\$10,535,573	-0.5%	0.9%
December	2,268,036	2,296,574	1.3%	2,279,889	-0.7%	2,215,079	-2.8%	-0.8%	\$10,316,532	\$10,472,698	1.0%	\$10,442,083	-0.3%	\$9,900,547	-5.2%	-1.5%
January	1,742,539	1,911,232	9.7%	1,776,014	-2.1%	1,711,343	-3.6%	-0.6%	\$8,118,464	\$8,903,861	9.7%	\$8,415,572	-5.5%	\$8,105,421	-3.2%	-0.1%
February	1,722,808	1,669,066	-3.4%	1,716,514	2.8%	1,678,889	-2.3%	-1.3%	\$8,097,703	\$7,798,320	-3.7%	\$8,094,083	3.8%	\$7,961,222	-1.5%	-0.6%
March	2,217,842	2,039,122	-8.0%	2,190,528	4.5%	2,070,706	-3.3%	-2.8%	\$10,246,466	\$9,572,053	-6.6%	\$9,917,313	3.5%	\$9,664,153	-2.6%	-1.3%
April	2,200,331	2,466,247	12.1%	2,314,688	-6.1%	2,136,354	-8.1%	2.0%	\$10,074,310	\$11,187,766	11.1%	\$10,670,329	-4.6%	\$10,798,982	1.2%	2.3%
May	2,460,066	2,413,590	-2.3%	2,405,047	-0.4%	2,385,587	-0.8%	-1.0%	\$11,194,972	\$11,101,324	-0.8%	\$11,144,015	0.2%	\$11,053,107	-0.8%	-0.4%
June	2,459,949	2,477,855	0.7%	2,474,614	-0.1%	2,421,587	-2.1%	-0.4%	\$11,207,261	\$11,339,964	1.2%	\$11,524,032	2.5%	\$11,696,511	1.5%	0.1%
<b>Total</b>	<b>26,992,001</b>	<b>27,518,693</b>	<b>2.0%</b>	<b>27,346,944</b>	<b>-0.6%</b>	<b>26,763,328</b>	<b>-2.1%</b>	<b>-0.4%</b>	<b>\$123,430,614</b>	<b>\$125,782,838</b>	<b>1.9%</b>	<b>\$125,888,567</b>	<b>0.1%</b>	<b>\$123,376,383</b>	<b>-2.0%</b>	<b>-0.1%</b>
<b>Avg Toll</b>									<b>\$4.57</b>	<b>\$4.57</b>	<b>0.0%</b>	<b>\$4.60</b>	<b>0.7%</b>	<b>\$4.61</b>	<b>0.1%</b>	<b>0.3%</b>

**Table B: I-95/Delaware Turnpike Monthly Traffic and Toll Revenue (Truck Only), FY 2016-19**

Month	Transaction						Revenue									
	FY 2016	FY 2017	YOY Growth	FY 2018	YOY Growth	FY 2019 <sup>(1)</sup>	YOY Growth	FY 2016-19 CAGR	FY 2016	FY 2017	YOY Growth	FY 2018	YOY Growth	FY 2019 <sup>(1)</sup>	YOY Growth	FY 2016-19 CAGR
July	304,291	300,420	-1.3%	309,135	2.9%	320,320	3.6%	1.7%	\$2,537,411	\$2,497,952	-1.6%	\$2,570,184	2.9%	\$2,666,304	3.7%	1.7%
August	296,987	321,996	8.4%	350,429	2.6%	329,576	-0.3%	3.5%	\$2,470,559	\$2,683,781	8.6%	\$2,755,915	2.7%	\$2,751,438	-0.2%	3.7%
September	292,018	301,550	3.3%	307,885	2.1%	309,317	0.5%	1.9%	\$2,444,014	\$2,516,751	3.0%	\$2,569,574	2.1%	\$2,580,815	0.4%	1.8%
October	304,254	265,957	-12.0%	329,513	23.9%	343,702	4.3%	4.1%	\$2,547,504	\$2,232,381	-12.4%	\$2,754,087	23.4%	\$2,868,814	4.2%	4.0%
November	279,202	283,115	1.4%	310,580	9.7%	318,131	2.4%	4.4%	\$2,334,942	\$2,388,111	2.3%	\$2,602,978	9.0%	\$2,654,401	2.0%	4.4%
December	295,791	293,535	-0.8%	300,118	2.2%	242,159	-19.3%	-6.5%	\$2,476,596	\$2,460,542	-0.6%	\$2,522,959	2.5%	\$2,008,867	-20.4%	-6.7%
January	257,918	285,430	10.7%	293,043	2.7%	284,664	-2.9%	3.3%	\$2,179,980	\$2,400,653	10.1%	\$2,483,688	3.5%	\$2,398,705	-3.4%	3.2%
February	266,534	251,872	-5.5%	274,892	9.1%	280,671	2.1%	1.7%	\$2,252,697	\$2,129,544	-5.3%	\$2,327,595	9.3%	\$2,368,350	1.8%	1.7%
March	313,713	320,808	2.3%	316,362	-1.4%	315,175	-0.4%	0.2%	\$2,630,750	\$2,698,797	2.6%	\$2,660,649	-1.4%	\$2,642,029	-0.7%	0.1%
April	292,662	304,689	4.1%	323,353	6.1%	332,347	2.8%	4.3%	\$2,443,554	\$2,541,534	4.0%	\$2,704,989	6.4%	\$2,782,954	2.9%	4.4%
May	311,361	332,915	6.9%	345,735	3.9%	343,533	-0.6%	3.3%	\$2,600,132	\$2,778,624	6.9%	\$2,886,767	3.9%	\$2,868,611	-0.6%	3.3%
June	322,867	328,734	1.8%	328,818	0.0%	326,768	-0.6%	0.4%	\$2,694,933	\$2,743,480	1.8%	\$2,740,818	-0.1%	\$2,717,236	-0.9%	0.3%
<b>Total</b>	<b>3,537,598</b>	<b>3,591,021</b>	<b>1.5%</b>	<b>3,769,863</b>	<b>5.0%</b>	<b>3,746,363</b>	<b>-0.6%</b>	<b>1.9%</b>	<b>\$29,613,002</b>	<b>\$30,072,150</b>	<b>1.6%</b>	<b>\$31,580,243</b>	<b>5.0%</b>	<b>\$31,308,524</b>	<b>-0.9%</b>	<b>1.9%</b>
<b>Avg Toll</b>									<b>\$8.37</b>	<b>\$8.37</b>	<b>0.0%</b>	<b>\$8.38</b>	<b>0.0%</b>	<b>\$8.36</b>	<b>-0.2%</b>	<b>-0.1%</b>

Notes:

(1) - June of FY 2019 value estimated from 11 months of fiscal year



- For the first 11 months of FY 2019, traffic has decreased 2.1 percent from the same period in FY 2018 and toll revenue has decreased 2.0 percent. The average toll rate has increased to \$4.61 which is due to a slightly higher share of truck transactions. The E-ZPass participation rate has increased to 79.8 percent.

Note that the data for June 2019 toll transactions and revenue was not available during the preparation of this letter update. Since it is the last month of the FY 2019, the first eleven months' data was used to estimate the data for June.

The pattern of more recent declines toll transactions and revenue could be in response to both the declining economy (mostly in FY 2019) and the effect of higher fuel prices over the last several years (as discussed in a following section of this document). While GDP has held relatively steady over the past year, there are several indicators indicating that the economy is slowing. As an example, the manufacturing growth tracked by Purchasing Managers' Index (PMI) has declined to a borderline value of 50 in June 2019. It is assumed that a PMI value higher than 50 signals that the economy is expanding, while PMI values below 50 signals the economy is contracting. Another example is that the trucking shipments have continued to decline according the Cass Freight Index – Shipments. A few additional items that had transitory impacts on performance are:

- March and April fluctuate as a function of the Easter holiday. However, when comparing the composite value of both months together, the combined values follow the overall trend for each fiscal year.
- Traffic interruptions due to continuous construction activities on I-95 for the following corridor projects: SR 1/I-95 Interchange Project, the Newport Viaduct Project, and US 202/I-95 Interchange Project.

The auto transactions and revenue trend are consistent with the total transactions as they are the dominant portion of the total. When reviewing truck transactions and revenue only, as shown in Table B, December of 2018 (FY 2019) had a significant drop of 19.3 percent in traffic and 20.4 percent in revenue. This could be related to the uncertainty about trade and potential tariffs, to the extent that manufacturers and suppliers attempted to stockpile components and finished goods prior to the planned implementation of tariffs on January 1, 2019.

Over the full three-year period from 2016 to 2019, the annual compounded growth rate for transactions from the September 2016 Report was projected to be 1.4 percent, which is higher than the actual compounded change of -0.3 percent. Similarly, the compounded revenue growth was projected to be 1.4 percent, which is higher than actual compounded change of -0.01 percent. The actual compounded change percent is listed in Table A.

Since FY 2017 and 2018 are complete and FY 2019 is largely complete, it is possible to compare the estimates from the September 2016 Report with the actual data for each fiscal year. Table C



Reference: Update-Letter, Traffic & Revenue Forecasts, I-95/Delaware Turnpike and SR 1 Toll Road

provides a summary of the estimated FY 2017-2019 transactions and toll revenue from the September 2016 Report with the actual data.

**Table C: I-95/Delaware Turnpike Traffic and Revenue, Actual and Forecast, FY 2017-19**

Revenue Statistics	FY 2017			FY 2018			FY 2019		
	Actual (000)	Sept. 2016 Forecasts (000)	Percent Diff Actual vs Report	Actual (000)	Sept. 2016 Forecasts (000)	Percent Diff Actual vs Report	Actual <sup>(1)</sup> (000)	Sept. 2016 Forecasts (000)	Percent Diff Actual vs Report
Transactions	27,519	27,424	0.3%	27,347	27,863	-1.9%	26,763	28,140	-4.9%
Revenue	\$125,783	\$125,406	0.3%	\$125,889	\$127,412	-1.2%	\$123,376	\$128,680	-4.1%
Average Toll Per Transactions	\$4.57	\$4.57	0.0%	\$4.60	\$4.57	0.7%	\$4.61	\$4.57	0.8%

As shown in Table C, for FY 2017, the actual full year revenue of approximately \$125,783,000 is 0.3 percent higher than the value estimated in the September 2016 Report as a result of higher than anticipated transactions. The actual average toll is approximately the same as the forecasted value. For FY 2018, the actual full year revenue of approximately \$125,889,000 is 1.2 percent lower than the value estimated. For FY 2019, the actual full year revenue of approximately \$123,376,000 is 4.1 percent lower than the value estimated. Both FY 2018 and 2019 estimates were the result of lower than anticipated transactions although with a slightly higher actual average toll.

In addition to toll revenue, Turnpike concession revenue for period FY 2017 through FY 2019 was also provided by DelDOT. The actual value \$2,475,000 for FY 2017 was very close to the forecasted value, but the values for FY 2018 (\$2,348,000) and FY 2019 (\$2,345,000) are lower than the forecasted values. Note that the actual value for FY 2019 is estimated based on the 11 months of actual data through May of 2019. Table D provides a summary of actual concession revenue for the period of FY 2017 through FY 2019, along with the estimated values from the September 2016 Report.

**Table D: FY 2017-19 Concession Revenue, Actual and Forecast**

Concession Revenue Values	FY 2017			FY 2018			FY 2019		
	Actual (000)	Sept. 2016 Report (000)	Percent Diff Actual vs Report	Actual (000)	Sept. 2016 Report (000)	Percent Diff Actual vs Report	Actual <sup>(1)</sup> (000)	Sept. 2016 Report (000)	Percent Diff Actual vs Report
Transactions	27,519	27,424	0.3%	27,347	27,863	-1.9%	26,763	28,140	-4.9%
Concession Revenue	\$2,475	\$2,479	-0.2%	\$2,348	\$2,519	-6.8%	\$2,345	\$2,544	-7.8%
Revenue per Transaction	\$0.090	\$0.090	-0.5%	\$0.086	\$0.090	-5.0%	\$0.088	\$0.090	-3.1%

Notes:

(1) - FY 2019 actual value estimated from 11 months of fiscal year

Actual concession revenue is approximately 7 percent less than the estimated FY 2018 value and approximately 8 percent less than the FY 2019 value from the September 2016 Report. The lower revenue is attributed two factors: first, the actual transactions for FY 2018 and FY 2019 is approximately 2 percent and 5 percent lower than estimated in the forecasts and second, the lower than estimated concession charge per transaction rate. While the actual concession revenue per transaction for FY 2017 matched the estimated value of 9.0 cents per transaction, the actual values declined to 8.6 cents and 8.8 cents in FY 2018 and FY 2019, respectively.



## SR 1 Toll Road Update

Over the last three fiscal years, SR 1 has exhibited growth that is significantly different from I-95. In FY 2017, SR 1 total transactions increased by 4.4 percent to a value of 44,213,081 from the FY 2016 value of 42,331,638 transactions. Revenue increased 3.9 percent from \$60,811,147 to \$63,188,869. In FY 2018, total transactions increased a further 0.7 percent to a value of 44,520,191 and revenue increased 0.5 percent to \$63,482,461. In FY 2019, for the full fiscal year it is estimate that there will be 45,566,517 total transactions which would be an increase of 2.4 percent over the previous fiscal year. Revenue is anticipated to increase by 1.2 percent to \$64,262,828. Monthly transaction and revenue performance for the FY 2016-2019 period is shown in Table E.

Overall, the toll transactions and revenue increased from FY 2016 through FY 2019, with a relatively slower pace for FY 2018. The slower pace could be attributed to periodic closures and/or detours that diverted traffic off of portions of SR 1 because of the US 301 Mainline Toll Road construction. On January 10, 2019 the new US 301 Mainline Toll Road opened to traffic and toll operations were initiated.

At the aggregate level from Table E, the traffic and revenue on SR 1 shows a mixed reaction with some months increasing while others decreasing. As the majority of total transactions, auto transactions exhibit an overall positive growth with fluctuations, similar to the pattern of total transactions.

When evaluating the truck traffic, as shown in Table F, there was a consistent decline over the same period in the previous fiscal year starting from December 2018. In February and March, the decline peaked at more than 10 percent. Analyzing the decline in detail, traffic at the Biddles Plaza experienced a much larger impact compared to that at the Dover Plaza, possibly due to its closer proximity to the new US 301 Mainline Toll Road. The reduction in truck traffic could be related to the completion of construction on the US 301 Mainline Toll Road, if construction-related trucks were using the northern section of SR 1 to haul materials to the project.

Regarding transponder usage, the E-ZPass participation rate increased from 72.7 percent in FY 2016 to 76.7 percent in FY 2019. The average toll rate decreased from \$1.44 in FY 2016 to \$1.41 in FY 2019 indicating that auto transactions were an increasing share of total transactions. Similar to I-95, the data for June 2019 transactions and revenue was not available when this letter update was being prepared. The trends for the first 11 months of FY 2019 were used to estimate the data for June.

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**Table E: SR 1 Toll Road Monthly Traffic and Toll Revenue (Total), FY 2016-19**

Month	Transaction					Revenue									
	FY 2016	FY 2017	YOY Growth	FY 2018	YOY Growth	FY 2016-19 CAGR	FY 2016	FY 2017	YOY Growth	FY 2018	YOY Growth	FY 2019 <sup>(1)</sup>	YOY Growth	FY 2016-19 CAGR	
July	4,401,932	4,580,617	4.1%	4,538,285	-0.9%	4,571,650	0.7%	\$6,697,515	\$7,390,085	10.3%	\$7,280,134	-1.5%	\$7,029,935	-3.4%	1.6%
August	4,441,592	4,602,974	3.5%	4,662,086	1.3%	4,830,890	3.6%	\$7,293,242	\$6,974,075	-4.4%	\$7,035,132	0.9%	\$7,231,404	2.8%	-0.3%
September	3,628,533	3,771,199	3.9%	3,875,452	2.8%	3,943,487	-0.5%	\$5,234,360	\$5,418,912	3.5%	\$5,642,562	4.1%	\$5,754,725	2.0%	3.2%
October	3,440,518	3,561,410	3.5%	3,725,442	4.6%	3,922,960	5.3%	\$4,376,110	\$5,168,467	6.0%	\$5,201,917	0.6%	\$5,321,814	2.3%	3.0%
November	3,159,498	3,191,505	1.0%	3,432,808	1.2%	3,596,630	4.8%	\$4,408,195	\$4,601,058	4.4%	\$4,383,290	-0.3%	\$4,828,668	5.3%	3.1%
December	3,192,217	3,270,623	2.5%	3,244,034	-0.8%	3,486,250	7.5%	\$4,246,031	\$4,389,683	3.4%	\$4,414,024	0.6%	\$4,792,713	8.0%	4.1%
January	2,705,166	2,964,876	9.6%	2,906,924	-2.0%	3,133,332	7.8%	\$3,657,449	\$3,858,030	5.5%	\$3,737,064	-3.1%	\$3,873,424	3.6%	1.9%
February	2,799,131	2,903,166	3.7%	2,906,390	0.1%	2,869,063	-1.3%	\$3,752,633	\$3,867,855	3.1%	\$3,807,554	-1.6%	\$3,781,408	-0.7%	0.3%
March	3,309,656	3,364,213	1.6%	3,309,940	-1.6%	3,400,465	2.7%	\$4,432,448	\$4,521,247	2.0%	\$4,602,646	1.8%	\$4,760,596	3.4%	2.4%
April	3,241,922	3,571,397	6.9%	3,594,331	0.6%	3,609,586	0.4%	\$4,742,918	\$5,252,630	10.7%	\$5,116,384	-2.0%	\$4,943,552	-3.4%	1.4%
May	3,795,056	3,909,074	3.0%	4,026,577	3.0%	3,902,436	-3.1%	\$5,500,759	\$5,438,338	-1.1%	\$5,624,347	3.4%	\$5,403,937	-3.5%	-0.4%
June	4,110,377	4,322,027	5.1%	4,297,922	-0.6%	4,399,778	2.4%	\$5,969,488	\$6,308,468	5.7%	\$6,435,008	2.0%	\$6,516,654	1.3%	3.0%
<b>Total</b>	<b>42,331,638</b>	<b>44,213,081</b>	<b>4.4%</b>	<b>44,520,191</b>	<b>-0.7%</b>	<b>45,566,517</b>	<b>2.4%</b>	<b>\$60,811,147</b>	<b>\$63,188,869</b>	<b>3.9%</b>	<b>\$63,482,461</b>	<b>0.5%</b>	<b>\$64,262,828</b>	<b>1.2%</b>	<b>1.9%</b>
<b>Avg Toll</b>								<b>\$1.44</b>	<b>\$1.43</b>	<b>-0.5%</b>	<b>\$1.43</b>	<b>-0.2%</b>	<b>\$1.41</b>	<b>-1.1%</b>	<b>-0.8%</b>

**Table F: SR 1 Toll Road Monthly Traffic and Toll Revenue (Truck Only) FY 2016-19**

Month	Transaction					Revenue									
	FY 2016	FY 2017	YOY Growth	FY 2018	YOY Growth	FY 2016-19 CAGR	FY 2016	FY 2017	YOY Growth	FY 2018	YOY Growth	FY 2019 <sup>(1)</sup>	YOY Growth	FY 2016-19 CAGR	
July	271,986	280,128	3.0%	280,765	0.2%	287,163	2.3%	\$850,368	\$883,307	3.9%	\$896,545	1.5%	\$872,538	-2.7%	0.9%
August	269,428	296,658	10.1%	300,773	1.4%	308,970	2.7%	\$870,118	\$906,518	4.2%	\$904,178	-0.3%	\$913,890	1.1%	1.6%
September	250,895	259,628	3.5%	269,003	3.6%	252,664	-6.1%	\$757,316	\$765,342	1.1%	\$740,779	-3.2%	\$754,615	1.9%	-0.1%
October	248,630	256,535	3.2%	270,555	5.4%	283,386	4.8%	\$717,107	\$728,759	1.6%	\$717,507	-1.5%	\$778,338	8.5%	2.8%
November	216,577	243,666	12.5%	242,353	-0.5%	237,829	-1.9%	\$606,221	\$665,481	9.8%	\$636,632	-4.1%	\$626,258	-1.6%	1.1%
December	211,138	221,233	4.8%	221,894	0.3%	215,193	-3.0%	\$583,838	\$596,965	2.2%	\$595,917	-0.2%	\$563,143	-5.8%	-1.7%
January	189,127	214,732	13.5%	213,624	-0.5%	206,673	-3.3%	\$525,092	\$573,904	9.3%	\$578,511	0.8%	\$532,189	-8.0%	0.4%
February	191,416	212,572	10.9%	207,919	-2.1%	186,442	-10.3%	\$537,106	\$555,046	3.3%	\$557,302	0.4%	\$485,116	-12.2%	-3.1%
March	235,913	245,981	4.3%	234,620	-4.6%	210,818	-10.1%	\$663,093	\$693,404	4.6%	\$667,181	-3.8%	\$583,428	-12.6%	-4.2%
April	237,262	248,729	5.3%	254,775	2.0%	243,866	-4.3%	\$681,139	\$723,954	6.3%	\$725,634	0.6%	\$679,188	-5.1%	-0.1%
May	254,665	276,259	8.5%	282,457	2.2%	254,702	-9.8%	\$747,412	\$813,086	8.8%	\$825,707	1.6%	\$721,464	-12.6%	-1.2%
June	271,423	287,727	6.0%	281,399	-2.2%	272,200	-3.3%	\$797,360	\$868,072	8.9%	\$839,857	-3.3%	\$804,549	-4.3%	0.3%
<b>Total</b>	<b>2,846,460</b>	<b>3,044,648</b>	<b>6.9%</b>	<b>3,059,937</b>	<b>0.5%</b>	<b>2,959,906</b>	<b>-3.3%</b>	<b>\$8,336,170</b>	<b>\$8,773,539</b>	<b>5.3%</b>	<b>\$8,683,790</b>	<b>-1.0%</b>	<b>\$8,318,716</b>	<b>-4.2%</b>	<b>0.3%</b>
<b>Avg Toll</b>								<b>\$2.93</b>	<b>\$2.88</b>	<b>-1.5%</b>	<b>\$2.84</b>	<b>-1.5%</b>	<b>\$2.81</b>	<b>-1.0%</b>	<b>-1.3%</b>

Notes:

(1) - June of FY 2019 value estimated from 11 months of fiscal year



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**Reference:** Update-Letter, Traffic & Revenue Forecasts, I-95/Delaware Turnpike and SR 1 Toll Road



Actual results for FY 2017-2019 are compared to the estimated transactions and toll revenue for the SR 1 Toll Road from the September 2016 Report in Table G. The transactions of FY 2017 are 1.9 percent greater than forecast. Similarly, the toll revenue is 1.4 percent greater than forecast. The transactions of FY 2018 are 0.1 percent greater than forecast and the toll revenue is 0.7 percent lower than forecast. The transactions of FY 2019 are 0.4 percent greater than forecast and the toll revenue is 1.5 percent lower than forecast.

Over the full three-year period from 2016 to 2019, the annual compounded growth rate for transactions from the September 2016 Report was projected to be 2.4 percent, which is slightly lower than the actual compounded change of 2.5 percent. The compounded revenue growth was projected to be 2.4 percent, which is higher than actual compounded change of 1.9 percent. The actual compounded change percent is listed in Table E.

**Table G: SR 1 Toll Road FY 2017-19 Traffic and Toll Revenue, Actual and Forecast**

Revenue Statistics	FY 2017			FY 2018			FY 2019		
	Actual (000)	Sept. 2016 Forecasts (000)	Percent Diff Actual vs Report	Actual (000)	Sept. 2016 Forecasts (000)	Percent Diff Actual vs Report	Actual <sup>(1)</sup> (000)	Sept. 2016 Forecasts (000)	Percent Diff Actual vs Report
Transactions	44,213	43,400	1.9%	44,520	44,496	0.1%	45,567	45,397	0.4%
Revenue	\$63,189	\$62,346	1.4%	\$63,482	\$63,920	-0.7%	\$64,263	\$65,214	-1.5%
Average Toll Per Transactions	\$1.43	\$1.44	-0.5%	\$1.43	\$1.44	-0.7%	\$1.41	\$1.44	-1.8%

Notes:

(1) - FY 2019 actual value estimated from 11 months of fiscal year

### Updated Revenue Forecasts, FY 2019 – 2025

Stantec has prepared revised traffic and revenue forecasts for the I-95/ Delaware Turnpike and SR 1 Toll Road, using the actual data and trends from historical performance and taking into consideration the following factors.

*US 301 Mainline Toll Road:* As mentioned earlier, DelDOT opened the new US 301 Mainline Toll Road which provides a direct connection from US 301 in Maryland, to SR 1, effectively bypassing the local arterial routes through Middletown. As this roadway is a new toll facility, the characteristics of this facility are summarized here in order to understand the potential impacts. The US 301 Mainline Toll Road uses all-electronic tolling, where tolls are paid with E-ZPass or toll-by-plate, which uses automatic license plate recognition to record an image of the vehicle's license plate. Toll rates are then invoiced to the vehicle owner. The road has a mainline toll gantry north of the Maryland border and ramp toll gantries on the southbound exits and northbound entrances at the SR 299, SR 71, and Jamison Corner Road interchanges. The auto toll rates are listed below:

- The mainline toll gantry tolls are \$4.00 with E-ZPass and \$5.60 using toll-by-plate for passenger vehicles.



Reference: Update-Letter, Traffic & Revenue Forecasts, I-95/Delaware Turnpike and SR 1 Toll Road

- For ramp toll gantries:
  - At the SR 299 interchange, E-ZPass tolls are \$1.00 and \$1.40 using toll-by-plate for passenger vehicles;
  - At the SR 71 interchange, E-ZPass tolls are \$0.75 and \$1.05 using toll-by-plate for passenger vehicles;
  - At the Jamison Corner Road interchange, E-ZPass tolls are \$0.50 and \$0.70 using toll-by-plate for passenger vehicles.

The toll-by-plate rates include a 40 percent surcharge on base rates charged to E-ZPass users. In addition, DelDOT offers frequent user discounts for those vehicles equipped with DelDOT E-ZPass transponders. Vehicles with those transponders are automatically enrolled in both the SR-1 and US 301 Frequent User Plan. The Delaware Frequent User Plan requires 30 or more qualifying trips within a 30-day rolling discount period on Delaware SR 1 or US 301. The 30 trips must be made on the same transponder in order to qualify and the transactions on SR 1 cannot be combined with the trips on the US 301 Mainline Toll Road. This plan is for individual accounts only where 2-axle vehicles receive a 50 percent discount. Commercial E-ZPass account users also get up to a 16 percent automatic discount for trips made by vehicles with 3 or more axles on the US 301 Mainline Toll Road.

The E-ZPass toll rates at the mainline gantry are the same as the rates for traffic at the Newark Plaza on I-95, but traffic using the US 301 Mainline Toll Road to travel to locations south of Baltimore would have a lower overall toll cost since the toll rates for the JFK Expressway in Maryland and the tolled Baltimore Harbor crossings are higher than the tolls for US 301 routing which has tolls only at the Bay Bridge (US 50/301). Therefore, the US 301 Mainline Toll Road could potentially divert a minimal amount of traffic from the Newark plaza. As this new facility has only been in operation for approximately 5 months, a comprehensive assessment of impacts is not yet available. A preliminary assessment of the data available indicates that the facility is still in a ramp-up period.

*Improvements to I-95 Delaware Turnpike corridor:* In the past couple of years, several construction projects have occurred on I-95, most of which are completed. Currently there is one project under construction in the I-95 Delaware Turnpike Corridor which is nearing completion and one project planned for SR 1 that could enhance the competitiveness of the US 301 Corridor that parallels I-95:

- DelDOT has on-going construction at the SR 141 and I-95 interchange between the Christina River and Commons Boulevard. The improvements are focused along SR 141 and the ramps leading to and from the interstate, with minor improvements taking place on northbound I-95. The construction is anticipated to be completed by fall/winter of FY 2020.
- DelDOT is planning a widening of SR 1 between Route 273 in the vicinity of Christiana south to the Roth Bridge over the C&D Canal. The project includes widening SR 1 by adding

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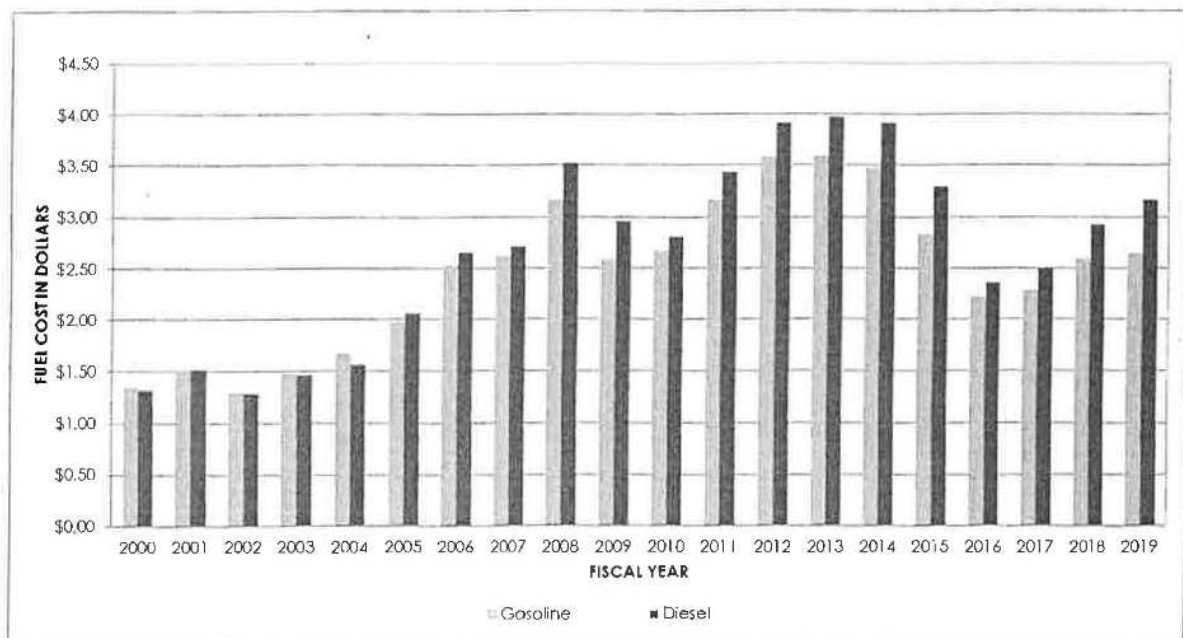
Reference: Update-Letter, Traffic & Revenue Forecasts, I-95/Delaware Turnpike and SR 1 Toll Road

a travel lane in each direction, widening bridges to accommodate the additional travel lanes and reconfiguring the supporting interchanges at SR 273, US 40, US 13/Tybouts Corner and SR 72. Construction funding has been indefinitely delayed due to current transportation funding constraints. Environmental work is continuing in order to complete the Environmental Assessment document.

*Fuel Prices:* Fuel prices have been increasing steadily since FY 2016 after gradual decline from FY 2013, as shown in Figure A. While FY 2019 is not yet complete, the nationwide annual average value through June 17, 2019 for regular grade gasoline was \$2.67 per gallon (source: U.S. Energy Information Agency).

In terms of fuel prices near-term, it seems likely that fuel prices will remain at the current levels (unless there is a supply interruption due to hurricanes, etc.). The world economy in general is slowing down and several other issues affecting global oil production in Venezuela and Iran are already reflected in current prices. Assuming no other prolonged political unrest in the Middle East that would impact oil prices, the weakening demand would tend to dampen prices with the only upward pressure coming from continued federal stimulus. Accordingly, any reduction in travel due to fuel prices is probably already reflected in the results for FY 2019.

**Figure A: Recent Fuel Cost Trends**



Source: U.S. Energy Information Agency

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Reference: Update-Letter, Traffic & Revenue Forecasts, I-95/Delaware Turnpike and SR 1 Toll Road

**Toll Changes on Maryland Facilities:** Effective in July 1, 2015, the Maryland Transportation Authority (MDTA) decreased tolls on many facilities, including I-95 (Express Toll Lanes and John F. Kennedy Memorial Hwy toll plaza), Bay Bridge (US 50/301), Nice Bridge (US 301) and Intercounty Connector/MD 200. In addition, starting on January 1, 2016, vehicles with a valid E-ZPass Maryland account and transponder pay reduced tolls at \$2.00 per axle for 3, 4, 5 and 6+ axle vehicles to use the I-895/Childs Street ramps at the Baltimore Harbor Tunnel or the I-695/Broening Highway turnaround at the Francis Scott Key Bridge. For the Chesapeake Bay Bridge, effective on July 1, 2015, the cash passenger car toll was reduced to \$4.00 with the corresponding E-ZPass toll reduced to \$2.50 and commuter tolls reduced to \$1.40. Note that tolls on the Chesapeake Bay Bridge are collected in the eastbound direction only.

**General Economic Conditions:** Current economic forecasts for the period through 2025 included in this updated forecast indicate uncertainty regarding employment and unemployment levels, growth in gross domestic product and other economic factors influencing travel. The current economic expansion is now 10 years in length and a recession is likely to occur at some point before 2025. Accordingly, the forecasts are conservative and anticipate relatively slow growth over the next five years, largely tracking the expected rate of population growth in the regions served by the Delaware Turnpike and SR-1.

The revenue forecasts for the I-95 Delaware Turnpike and SR 1 Toll Road are shown in Table H. The estimates from the September 2016 Report are also included in the table for comparison purposes. All revenue estimates assumed no changes to the existing toll schedule.

**Table H: Updated Revenue Forecasts**

Fiscal Year	Estimated Revenue(000)												
	I-95/Delaware Turnpike							SR 1 Toll Road			I-95 and SR 1 Toll Road		
	Toll Revenue		Concession Revenue		Total Revenue			Toll Revenue			Combined Total Revenue		
	Sept. 2016 Report	Updated	Sept. 2016 Report	Updated	Sept. 2016 Report	Updated	Percent Change	Sept. 2016 Report	Updated	Percent Change	Sept. 2016 Report	Updated	Percent Change
2019 <sup>(1)</sup>	\$128,680	\$123,377	\$2,544	\$2,355	\$131,224	\$125,732	-4.2%	\$65,214	\$64,262	-1.5%	\$196,438	\$189,994	-3.3%
2020	\$129,597	\$123,377	\$2,562	\$2,328	\$132,159	\$125,705	-4.9%	\$66,210	\$65,547	-1.0%	\$198,369	\$191,252	-3.6%
2021	\$130,521	\$123,994	\$2,580	\$2,340	\$133,101	\$126,334	-5.1%	\$67,221	\$66,530	-1.0%	\$200,322	\$192,864	-3.7%
2022	\$131,452	\$124,614	\$2,599	\$2,351	\$134,051	\$126,965	-5.3%	\$68,248	\$67,528	-1.1%	\$202,299	\$194,493	-3.9%
2023	\$132,389	\$125,237	\$2,617	\$2,363	\$135,006	\$127,600	-5.5%	\$69,290	\$68,541	-1.1%	\$204,296	\$196,141	-4.0%
2024	-	\$125,863	-	\$2,375	-	\$128,238	-	-	\$69,569	-	-	\$197,807	-
2025	-	\$126,492	-	\$2,387	-	\$128,879	-	-	\$70,613	-	-	\$199,492	-

**Notes:**

(1) - FY 2019 actual value estimated from 11 months of fiscal year

For FY 2019 the updated forecasts are based on 11 months of actual data through May and these new forecasts are approximately 4.2 percent lower for I-95 and 1.5 percent lower for SR 1. The updated I-95 forecasts are anticipated to grow at a slower rate such that the difference from the prior forecast increases to 5.5 percent by 2023, which is the final year in the September 2016 Report. In contrast, growth on SR 1 remains more consistent with the prior forecasts, such that updated forecast

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Reference: Update-Letter, Traffic & Revenue Forecasts, I-95/Delaware Turnpike and SR 1 Toll Road

by 2023 is lower by only 1.1 percent. While the updated forecasts for both toll roads are lower, the impacts of the weaker economic conditions and fuel costs would likely have more of an impact on the longer distance regional travel patterns on I-95. The combined revenue for both toll roads is estimated to increase slowly over the six-year forecast period so that by 2023, they are 4.0 percent less than those presented in the September 2016 Report. Note that these updated forecasts were extended for two years out to FY 2025 using the updated trends.

As this is an updated forecast, we refer the reader to the summary of assumptions provided in the September 2016 Report on page 40 as well as additional information regarding recent traffic and revenue trends for the Turnpike and the SR 1 Toll Road.

While the projections in this Update-Letter are stated year-by-year, they are intended to show the trends that may reasonably be anticipated on the basis of the assumptions listed in the September 2016 Report. It is our opinion that the updated revenue projections are reasonable and that they have been prepared in accordance with accepted practice for investment-grade studies. However, given the uncertainties within the current international and economic climate, Stantec and DelDOT acknowledge that:

- The updated revenue forecast in Table H presents the results of our consideration of the information available to Stantec 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.
- The traffic and revenue forecasts will be subject to future economic and demographic trends in Delaware and the Northeast Corridor that cannot be predicted with certainty.
- The projections contained in this Update-Letter, while presented with numerical specificity, are based on a number of estimates and assumptions that, though considered reasonable, are inherently subject to significant economic and competitive uncertainties and contingencies, many of which will be beyond our control. In many instances, a broad range of alternative assumptions could be considered reasonable. Changes in the assumptions used could result in material differences in projected outcomes.
- if, for any reason, any of these conditions should change due to changes in the economy or competitive environment, or other factors, Stantec's opinions or estimates may require amendment or further adjustments.

The report contains forward-looking statements, revenue projections, and statements of opinion based upon certain information. These forward-looking and opinions statements and projections include statements relating to preexisting conditions not caused or created by Stantec and external conditions beyond our control. We believe that our expectations are reasonable and are based on reasonable assumptions. However, such forward-looking statements, projections and opinions, by their nature involve risks and uncertainties beyond our control. We caution that a variety of factors could cause the actual revenue associated with the I-95/Delaware Turnpike and SR 1 Toll Road to

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Reference: Update-Letter, Traffic & Revenue Forecasts, I-95/Delaware Turnpike and SR 1 Toll Road

differ from that expressed or implied in this document. We assume no obligation with respect to the differences between this document and the actual performance of the two toll facilities. This document was prepared solely for the use of DelDOT that commissioned it and the Delaware Transportation Authority. It may only be relied upon by third parties at their own risk. Under no circumstance shall Stantec be liable to third parties for claims or damage arising out of this document. Any unauthorized use of this document is at the user's sole risk.

We acknowledge with thanks the cooperation of the DelDOT staff during the course of this study.

Regards,

Stantec Consulting Services Inc.

A handwritten signature in black ink, appearing to read "DS", with a long horizontal line extending to the right.

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## Traffic & Revenue Report



**I-95/Delaware Turnpike**



**SR 1 Toll Road**

*Prepared for:*



Delaware Department of Transportation

*Prepared by:*



September 27, 2016

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File: 193410350

**Ms. Jennifer Cohan**

Delaware Department of Transportation

800 Bay Road/Route 113

Dover, DE 19903

**Attn: Mr. Brian Motyl, Assistant Director, Finance**

Reference: Traffic & Revenue Report, I-95/Delaware Turnpike and SR 1 Toll Road

In accordance with your request, Stantec Consulting Services Inc. (Stantec) has developed estimates of traffic and revenue for the Delaware Turnpike (I-95) and the State Route (SR) 1 Toll Road through Fiscal Year 2023, about the issuance by the Delaware Transportation Authority Revenue Bond Series 2017.

As described in this letter report, the estimates for the Turnpike are based on its actual traffic and earnings record from its opening in 1963 through June 2016 (FY 2016), and on a series of comprehensive studies of traffic patterns and revenue trends undertaken over the course of the Turnpike's 53 years of operation. For SR 1 Toll Road, the estimates are based on its actual traffic and revenue record since the opening of the first section of the project in December 1993; its staged completion through May 2003; and, as with the Turnpike, the results through June 2016.

Several factors have had a significant impact on traffic on the toll roads in the last twelve years. These include the recession of 2007 – 2009 and its lingering effects; the 2005 and 2007 toll increases; severe weather events such as Superstorm Sandy in October 2012 and harsh winter storms over the last few years; and the increase in fuel prices in 2008 and 2011.

Traffic volumes on I-95/Delaware Turnpike decreased from a high of 28.6 million in FY 2004 to 24.5 million in FY 2011. Since then, traffic volumes have been fluctuating due to the factors noted. In FY 2012, traffic increased 2.5 percent, but decreased 0.9 percent in FY 2013. Since then, traffic volumes have been steadily increasing; in FY 2014 traffic is 0.4 percent higher than FY 2013, despite a 3.2 percent decrease in January 2014 due to harsh winter weather conditions. With the reduction in fuel prices and implementation of the reinforcement program for toll evasion in November of FY 2015, traffic volumes were up by 3.2 percent from last year and in FY 2016 the traffic volume is 4.8 percent higher than FY 2015.

On SR 1 Toll Road, traffic volumes have increased consistently, apart from the impacts of the 2007 toll increase in FY 2008 and the effects of the recession in FY 2009. In 2004, there were 32.3 million transactions on the toll road and this increased to 39 million in FY 2014. In FY 2015 there was a weekend toll increase at the mainline plazas and yet the traffic volume is 1.7 percent higher than FY 2014. Traffic volumes further increased by 6.5 percent in FY 2016.

In March 2014, Stantec estimated revenue totals on the I-95/Delaware Turnpike and SR 1 Toll Road. Actual toll revenue on I-95 was 1.0 percent lower and concession revenue was 0.8 percent higher than FY 2014 projections; SR 1 actual toll revenue was 0.6 percent higher. Overall for both roadways, actual revenues were 0.5 percent below Stantec estimates.

FY 2015 toll revenue on both roadways was higher than Stantec estimates; 1.9 percent higher on I-95 and 16.5 percent higher on SR 1. The August 2014 (FY 2015) weekend toll increase on SR 1 had a lesser impact than expected, resulting in higher revenue. I-95 concession revenue was 3.5 percent lower than Stantec projected for FY 2015. This was likely due to the six percent drop in non-fuel sales at the rest area, which account for approximately 63 percent of concession revenue. Removing non-fuel sales from the revenue equation, Stantec estimates would have been two percent lower than actual.

FY 2016 toll revenues were also higher than projected; 6.8 percent higher on I-95 and 22.9 percent higher on SR 1. The lower-estimated FY 2015 revenue on SR 1 exacerbated the difference from actual in FY 2016, although regional traffic growth was strong in 2016 overall. I-95/Delaware Turnpike concession revenue was 2.2 percent lower than projected in FY 2016, again due to the anomaly in FY 2015 non-fuel sales. **Table 1** shows the percent differences between Stantec estimated and actual revenue values from FY 2014 to FY 2016.

**Table 1: Stantec Estimate vs. Actual Revenue (in thousands), FY 2014 – 2016**

Fiscal Year		I-95/Delaware Turnpike		SR 1	Total
		Toll Revenue	Concession Revenue	Toll Revenue	
2014	Report	\$ 114,240	\$ 2,464	\$ 48,037	\$ 164,741
	Actual	\$ 113,051	\$ 2,484	\$ 48,338	\$ 163,873
	% Diff	-1.0%	0.8%	0.6%	-0.5%
2015	Report	\$ 114,928	\$ 2,479	\$ 48,834	\$ 166,241
	Actual	\$ 117,055	\$ 2,393	\$ 56,868	\$ 176,316
	% Diff	1.9%	-3.5%	16.5%	6.1%
2016	Report	\$ 115,621	\$ 2,494	\$ 49,471	\$ 167,586
	Actual	\$ 123,431	\$ 2,440	\$ 60,811	\$ 186,682
	% Diff	6.8%	-2.2%	22.9%	11.4%

## 1.0 I-95/Delaware Turnpike

The Delaware Turnpike is an integral part of the transportation network in the Northeast Corridor. The 11-mile Delaware Turnpike is a key link in the Northeast Corridor's I-95 route from New England, New York, Philadelphia and Wilmington to Baltimore, Washington and the South. It forms the trunk of the system, whose branches include I-95 (north to Wilmington, Philadelphia and Trenton), I-295 and the New Jersey Turnpike (north to Trenton and New York), and I-495 (north toward Philadelphia via the Port of Wilmington). To the south, it connects directly with Maryland's Turnpike (I-95) for service to Baltimore and beyond.

Delaware Turnpike interchanges in the northern New Castle County are located, from north (east) to south (west), at SR 141, combined SR 1/7, SR 273 and SR 896. The SR 1/7 connection leads to the SR 1 Toll Road at Tybouts while SR 896 connects with US 301 which leads to the Chesapeake Bay Bridge at Annapolis.

The Turnpike serves both long-distance Northeast Corridor traffic and commuter traffic between Wilmington and Newark (via SR 896) where the volumes are highest. The Turnpike currently consists of 10 lanes from SR 141 to SR 1 and then transitions down to eight lanes between SR 1 and the Newark toll plaza. South (west) of the Newark plaza, the number of lanes drops to six, coinciding with the six Turnpike lanes on I-95 in Maryland.

A single Turnpike toll plaza (the Newark plaza) is located between SR 896 and the Maryland line. The Newark toll plaza currently has a total of 18 toll lanes, of which four are dedicated E-ZPass lanes and four are high speed E-ZPass lanes. The high speed E-ZPass lanes, constructed in July 2011, reduced delays at the toll plaza due to capacity constraints.

A service plaza with fuel and restaurant facilities is located in the median of the Turnpike between the SR 273 and SR 896 interchanges, producing concession revenue for the Authority. The service plaza was reconstructed in FY 2010 and was reopened to patrons on June 25, 2010.

### 1.1 TOLL COLLECTION

The Delaware Turnpike was opened to traffic in 1963. When the toll collection system was established at that time, it consisted of a single mainline plaza (the Newark plaza) near the Maryland line and ramp tolls at SR 896, SR 273 and SR 7, resulting in a "closed" toll system with all users paying at one point or another. The ramp tolls were removed in 1976; local users who do not travel into Maryland can use the Turnpike toll-free.

Tolls at the Newark plaza have increased periodically (in 1977, 1981, 1984, 1989, 1993, 1999, 2005 and 2007) since the initial and prior 30-cent toll (for autos, higher for trucks) in 1963. **Table 1.1** provides a summary of the current toll schedule. Note that cash and E-ZPass patrons are charged the same rate.

**Table 1.1: Tolls on I-95/Delaware Turnpike**

Vehicle Type	Tolls		Percent Change
	Through 9/30/07	Effective 10/1/07	
Passenger Cars (2-Axle)	\$ 3.00	\$ 4.00	33%
3-Axle	\$ 5.00	\$ 6.00	20%
4-Axle	\$ 6.00	\$ 7.00	17%
5-Axle	\$ 8.00	\$ 9.00	13%
6-Axle	\$ 10.00	\$ 11.00	10%
Permit	\$ 10.00	\$ 11.00	10%

For the full-length, 11-mile stretch from SR 141 to the Maryland line, the two-axle toll rate for cash patrons is 36 cents per mile. While this seems high, the 13-mile section of I-95 north of SR 141 is toll-free, thereby reducing the overall (24-mile) rate to 16.7 cents per mile.

Since the Delaware Turnpike section of I-95 connects directly with the Maryland section of I-95, it is useful to compare the two toll schedules. For passenger vehicles, round trip cash toll rates are equal. There is no commuter discount rate at Newark Plaza. Truck tolls vary significantly between the two toll plazas. After the last revision of the I-95 Delaware Turnpike toll rates in 2007, MdTA increased truck tolls significantly at all toll facilities, including I-95 in Maryland in May 2009. Following this, a series of toll rate increases was implemented on I-95 whereby tolls increased by 60 percent for all classification types. Passenger car cash tolls initially increased from \$5.00 to \$8.00 although effective July 1, 2015, the passenger car E-ZPass discount rate at JFK/Susquehanna Plaza decreased from \$7.20 to \$6.00. 5-axle cash and E-ZPass tolls increased from \$30.00 to \$48.00 and effective July 1, 2013, video tolling (pay by plate) was implemented for multi-axle trucks. The video toll price for 5-axle trucks is \$63.00 compared to \$48.00 for cash and E-ZPass.

Tolls on I-95 in Delaware and Maryland for autos and for the predominant long-distance five-axle trucks are compared in **Table 1.2**. Round-trip tolls are shown because Maryland tolls are collected in the northbound direction only, while Delaware Turnpike tolls are collected in both directions.

**Table 1.2: Comparative I-95 Tolls, DE vs. MD**

Vehicle Class	Representative Round Trip Tolls		
	Newark Plaza <sup>(1)</sup>	JFK/Susquehanna Plaza <sup>(2)</sup>	
		Through 6/30/2015	Effective 7/1/2015
2-Axle	\$8.00	\$8.00 cash/ \$7.20 E-ZPass <sup>(3)</sup>	\$8.00 cash/ \$6.00 E-ZPass <sup>(3)</sup>
5-Axle	\$18.00	\$48.00 cash/ \$63.00 video <sup>(4)</sup>	\$48.00 cash/ \$63.00 video <sup>(4)</sup>

Notes: (1) Tolls effective October 1, 2007; round trip tolls shown

(2) Tolls effective July 1, 2015; collected northbound only

(3) Commuter discount plan available for 2-axle vehicles using MD EZ-Pass, \$70 for 25 trips within 45 days; commuter northbound-only toll is \$2.80

(4) 5-axle video toll collection rates effective July 1, 2013

One-way tolls have been considered at Delaware's Newark plaza and rejected due to the network of alternative routes crossing the state line between Delaware and Maryland. There is no natural barrier between Delaware and Maryland as there is at the Susquehanna River in Maryland. A doubling of the toll at the Newark plaza in one direction could induce significant traffic diversions, particularly by trucks.

The Delaware toll facilities are members of the E-ZPass Interagency Group (IAG). IAG was founded in 1993 to enable customers of the member IAG agencies to use their E-ZPass tags on any E-ZPass-equipped toll facility operated by another IAG member. The IAG now encompasses 38 toll agencies in 16 states and processes 2.9 billion toll transactions in 2015. There are more than 30 million E-ZPass devices in circulation and 18 million accounts. As the IAG has grown, the E-ZPass customer base has increased, thereby increasing E-ZPass usage on the Delaware toll facilities.

## 1.2 HISTORICAL TRAFFIC, TOLL REVENUE AND CONCESSION REVENUE

With the opening of the Delaware Turnpike in 1963, the Turnpike has a 53-year record at the Newark toll plaza of traffic and revenue growth. During its first 25 years of operation, traffic<sup>1</sup> through the Newark plaza increased by a factor of 3.4, from 5.9 million vehicles in 1964, its first full year of operation, to 19.9 million vehicles in FY 1989. During this same period, toll revenues collected at the Newark plaza increased by a factor of 13.7 – from \$1.9 million to \$26.1 million. The increase reflects the completion I-95 between Maine and Florida and the Turnpike's toll increase from \$0.30 (for passenger cars, higher for trucks) to \$1.00. Early in the period, tolls were also collected on the Turnpike ramps at SR 7, SR 273, and SR 896, but as mentioned previously, these tolls were discontinued in 1976. Commensurate with the increasing traffic over the years,

<sup>1</sup> References to *traffic* or *transactions* throughout the report are intended to mean toll-paying traffic.

concession revenues from the two service stations and restaurant facility increased from \$690,000 in 1964 to \$1,556,000 in FY 1989<sup>2</sup>.

Turnpike traffic and revenue from FY 1990 through FY 2016 are listed in **Table 1.3** and shown graphically in **Figure 1.1**. From 1989 to 2004, traffic, toll revenue and concession revenue grew despite the 25 percent toll increase in September 1993 (FY 1994) from \$1.00 to \$1.25 for passenger cars and other two-axle vehicles, and the 60 percent increase in January 1999 (FY 1999) from \$1.25 to \$2.00 for passenger car cash tolls. For FY 2005, traffic and revenue did decrease slightly in response to higher fuel prices in the wake of Hurricane Katrina, although concession revenue did increase. This increase was attributed to rising fuel sales.

Revenues for FY 2006 increased significantly due to the increased toll rates for all vehicles that went into effect on October 1, 2005 along with discontinuing the EZ-Pass discount for autos. Revenue increased significantly again in FY 2008 in response to the toll increase in October 2007, although the number of patrons using the facility in FY 2008 was seven percent less than the number of patrons in FY 2005. Similarly, revenue increased in FY 2009 while transactions declined due to increased tolls in effect for an entire fiscal year. As the effects of the 2009 recession continued into FY 2010, both transactions and revenue declined. Toll revenue decreased by two percent from FY 2009 and the average toll rate decreased to \$4.57 per transaction, reflecting a lower overall share of truck transactions.

In FY 2011, traffic was 4.2 percent lower and toll revenue was 4.1 percent lower than FY 2010 in response to the declining economy and higher fuel prices. Also, in November 2010, construction required closures at the Turnpike toll plaza during the Thanksgiving holiday weekend. If the \$86,600 estimated revenue loss due to the closure had not occurred, revenue would have decreased by only four percent for the year.

In FY 2012, the number of passenger and commercial vehicles increased 2.5 percent from FY 2011, showing some recovery from the recession. Higher volumes in January 2012 were the result of improved weather compared to heavy snow and cold weather in 2011. Also, 2012 was a leap year and monthly transactions for February showed an increase over 2011 due to the additional day.

Traffic decreased 0.9 percent in FY 2013, likely caused by the effects of Superstorm Sandy, which suspended tolls for one day at the Newark plaza and caused reduced traffic all along the East Coast in October and November 2012.

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<sup>2</sup> The source of all traffic and revenue data is from DelDOT Toll Operations.

**Table 1.3: I-95/Delaware Turnpike Traffic and Revenue, FY 1990 – 2016**

Fiscal Year	Annual Transactions		Toll Revenue			Concession Revenue		Total Revenue (000)
	Volume (000)	Percent change	Amount (000)	Percent change	Average per vehicle	Amount (000)	Average per vehicle	
1990	20,526	--	\$ 28,316	--	\$ 1.380	\$ 1,567	\$ 0.076	\$ 29,883
1991	20,950	2.1%	\$ 28,996	2.4%	\$ 1.384	\$ 1,545	\$ 0.074	\$ 30,541
1992	21,789	4.0%	\$ 29,476	1.7%	\$ 1.353	\$ 1,669	\$ 0.077	\$ 31,145
1993	22,305	2.4%	\$ 30,418	3.2%	\$ 1.364	\$ 1,842	\$ 0.083	\$ 32,260
1994 <sup>(1)</sup>	22,251	-0.2%	\$ 36,748	20.8%	\$ 1.652	\$ 1,853	\$ 0.083	\$ 38,601
1995	23,451	5.4%	\$ 40,258	9.6%	\$ 1.717	\$ 2,047	\$ 0.087	\$ 42,305
1996	23,848	1.7%	\$ 40,580	0.8%	\$ 1.702	\$ 2,075	\$ 0.087	\$ 42,655
1997	25,091	5.2%	\$ 41,795	3.0%	\$ 1.666	\$ 2,124	\$ 0.085	\$ 43,919
1998	25,649	2.2%	\$ 43,276	3.5%	\$ 1.687	\$ 2,216	\$ 0.086	\$ 45,492
1999 <sup>(2)</sup>	25,837	0.7%	\$ 51,258	18.4%	\$ 1.984	\$ 2,265	\$ 0.088	\$ 53,523
2000	26,138	1.2%	\$ 60,187	17.4%	\$ 2.303	\$ 2,313	\$ 0.088	\$ 62,500
2001	26,724	2.2%	\$ 60,243	0.1%	\$ 2.254	\$ 2,304	\$ 0.086	\$ 62,547
2002	27,633	3.4%	\$ 60,165	-0.1%	\$ 2.177	\$ 2,302	\$ 0.083	\$ 62,467
2003 <sup>(3)</sup>	27,727	0.3%	\$ 59,099	-1.8%	\$ 2.131	\$ 2,332	\$ 0.084	\$ 61,431
2004	28,553	3.0%	\$ 59,986	1.5%	\$ 2.101	\$ 2,465	\$ 0.086	\$ 62,451
2005 <sup>(4)</sup>	28,411	-0.5%	\$ 59,346	-1.1%	\$ 2.089	\$ 2,591	\$ 0.091	\$ 61,937
2006 <sup>(5)</sup>	27,527	-3.1%	\$ 84,723	42.8%	\$ 3.078	\$ 2,698	\$ 0.098	\$ 87,421
2007	27,110	-1.5%	\$ 94,195	11.2%	\$ 3.475	\$ 2,800	\$ 0.103	\$ 96,995
2008 <sup>(6)</sup>	26,410	-2.6%	\$ 113,989	21.0%	\$ 4.316	\$ 2,499	\$ 0.095	\$ 116,488
2009	25,812	-2.3%	\$ 119,105	4.5%	\$ 4.614	\$ 2,408	\$ 0.093	\$ 121,513
2010	25,542	-1.0%	\$ 116,727	-2.0%	\$ 4.570	\$ 2,161	\$ 0.085	\$ 118,888
2011	24,460	-4.2%	\$ 111,932	-4.1%	\$ 4.576	\$ 1,782	\$ 0.073	\$ 113,714
2012	25,079	2.5%	\$ 114,729	2.5%	\$ 4.575	\$ 2,024	\$ 0.081	\$ 116,753
2013	24,858	-0.9%	\$ 113,769	-0.8%	\$ 4.577	\$ 2,377	\$ 0.096	\$ 116,146
2014	24,948	0.4%	\$ 113,051	-0.6%	\$ 4.532	\$ 2,484	\$ 0.100	\$ 115,535
2015	25,751	3.2%	\$ 117,055	3.5%	\$ 4.546	\$ 2,393	\$ 0.093	\$ 119,448
2016	26,992	4.8%	\$ 123,431	5.4%	\$ 4.573	\$ 2,440	\$ 0.090	\$ 125,871

Notes: (1) Toll increase September 1993, impact reflected in FY 1994

(2) Toll increase January 1999, impact reflected in FY 1999

(3) Growth affected by severe winter weather

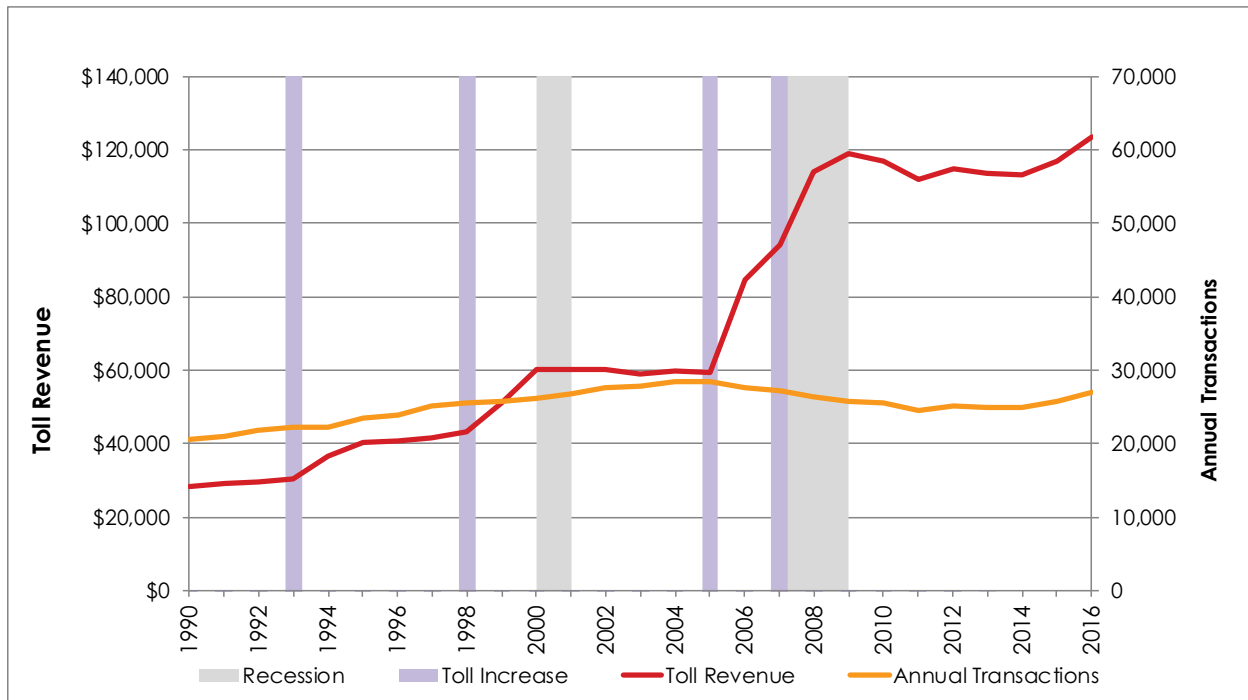
(4) Growth affected by increased fuel prices

(5) Toll increase October 2005 impact reflected in FY 2006

(6) Toll increase in October 2007 and increased fuel prices impact reflected in FY 2008



**Figure 1.1: I-95/Delaware Turnpike Traffic and Revenue, FY 1990 – 2016**



In FY 2014, traffic volumes were 0.4 percent higher than FY 2013. Traffic increased in FY 2014 due to the gradually improving economy and the recovery from Superstorm Sandy. This growth was partially offset by severe weather conditions in January 2014. Between June and August 2014, the I-495 bridge over the Christiana River was closed due to unsafe conditions.

FY 2015 traffic increased 3.2 percent from FY 2014. Severe weather conditions in February and March 2015 constrained the potential growth in FY 2015.

Traffic increased 4.8 percent in FY 2016. A year over year comparison of monthly data provides mixed results in terms of change in transactions. Factors that could influence this are:

- The truck toll evasion program was in place to reduce evasion – i.e. increase truck traffic on I-95 – for the entirety of FY 2016 but only eight months in FY 2015;
- Due to severe weather conditions in February and March 2015, the growth for the same months in FY 2016 was much higher than usual;
- Traffic volumes were higher in February 2016 when compared to the previous year due to the extra leap year day;
- A system communication problem occurred in the high speed E-ZPass lanes from April 27-29, 2016, resulting in a loss of 59,000 transactions.

The final set of columns in **Table 1.3** includes concession revenues earned from the fuel sales and sales of convenience items as well as the restaurant operated by Marriott at the previous service plaza. Due to its location midway between New York and Washington, the Delaware Turnpike service plaza is one of the busiest turnpike service plazas in the Northeast Corridor.

Historical concession revenue has varied due to increased fuel prices and the impacts of the recession and weak recovery, as well as the period when the service plaza was reconstructed. Note that the reduced concession revenue for FY 2010 includes primarily temporary rent payments made during reconstruction of the service plaza between Labor Day 2009 and June 2010. Concession revenue in FY 2011 was 17 percent less than the previous year due to two factors: the 4.2 percent reduction in traffic and the low transaction rate per vehicle. In FY 2012, the rate per vehicle rebounded and concession revenue increased 13.6 percent over FY 2011. In contrast to toll revenue and traffic on I-95, there was a large increase in concession revenue in FY 2013 – 17 percent. Concession revenue varied only slightly in the following years, increasing 4.5 percent in FY 2014, decreasing 3.7 percent in FY 2015 and increasing two percent in FY 2016.

Over the last several years, traffic on the I-95/Delaware Turnpike has fluctuated in response to economic contraction, declining fuel prices, roadway construction and severe weather events. Using the monthly data provided by the Delaware Department of Transportation (DelDOT), a monthly comparison of transactions by vehicle type was prepared for fiscal years 2014, 2015 and 2016 to determine if the current data provide an indication of recent overall travel patterns. The comparison is provided in **Table 1.4**. Since 2-axle vehicles account for more than 85 percent of total transactions on the I-95/Delaware Turnpike, the trend for passenger cars is similar to the trend for total transactions. Annual passenger car growth has steadily increased from FY 2014 to FY 2016 – at 1.5, 2.8 and 4.0 percent – as a result of roadway construction completions around I-95; the extra leap year day in 2016; the number of weekdays, weekend days and holidays in individual months; and the improving economy. The spike in transactions in February and March 2016 is due to inclement weather in 2015 that caused a reduction in traffic.

**Table 1.4: I-95/Delaware Turnpike, Passenger Transactions, FY 2014 – 2016**

Month	Passenger Cars					
	FY 2014	FY 13-14 change	FY 2015	FY 14-15 Change	FY 2016	FY 15-16 Change
July	2,170,380	-1.0%	2,310,463	6.5%	2,356,958	2.0%
August	2,323,830	4.5%	2,411,255	3.8%	2,423,934	0.5%
September	1,722,040	-1.1%	1,709,737	-0.7%	1,807,573	5.7%
October	1,688,020	4.5%	1,779,518	5.4%	1,876,670	5.5%
November	1,782,950	2.4%	1,865,875	4.7%	1,982,729	6.3%
December	1,864,160	1.3%	1,863,947	0.0%	1,972,239	5.8%
January	1,381,350	-3.2%	1,462,213	5.9%	1,484,621	1.5%
February	1,208,980	-5.6%	1,275,894	5.5%	1,461,274	14.5%
March	1,643,380	-9.3%	1,642,991	0.0%	1,903,929	15.9%
April	1,955,550	12.0%	1,999,845	2.3%	1,907,689	-4.6%
May	2,083,350	5.7%	2,180,000	4.6%	2,148,705	-1.4%
June	2,099,800	5.0%	2,046,353	-2.5%	2,128,082	4.0%
Total Year	21,923,790	1.5%	22,548,091	2.8%	23,454,403	4.0%

Commercial traffic trends, however, have not been as steady as shown in **Table 1.5**. Volumes generally declined from November FY 2014 to August FY 2015, dropping 37 percent in June and 7.5 percent annually in FY 2014. Since July and August FY 2015 when commercial traffic decreased 37.6 and 7.7 percent, the trend has only grown (with the exception of April FY 2016 which dropped only 0.3 percent). Overall truck volumes increased by 5.9 and 10.5 percent in FY 2015 and FY 2016, growing by as much as 73.7 and 73.0 percent in June and July. There are several reasons why commercial volume trends have been so volatile, including weather-related issues as previously discussed and:

- Due to unsafe conditions, the I-495 bridge span over the Christiana River connecting Wilmington to I-95 and I-295 was fully closed from June to August 2014 (FY 2015), reducing total interstate capacity traveling through Delaware and increasing demand on the remaining interstate roadways (I-95 and I-295). The resulting congestion may have forced vehicles to find a different route around Delaware;
- Congestion due to construction causing trucks to divert to or away from I-95;
- Roadway project completions creating improved capacity and operations (increase); and
- Newark Plaza toll evasion (decrease) and the subsequent police enforcement program (increase).

**Table 1.5: I-95/Delaware Turnpike Commercial Vehicle Transactions, FY 2014 – 2016**

Month	Commercial Vehicles					
	FY 2014	FY 13-14 change	FY 2015	FY 14-15 Change	FY 2016	FY 15-16 Change
July	281,920	1.7%	175,900	-37.6%	304,290	73.0%
August	283,720	-0.6%	261,970	-7.7%	296,990	13.4%
September	265,470	3.3%	269,440	1.5%	292,020	8.4%
October	286,920	5.6%	290,960	1.4%	304,250	4.6%
November	260,790	-10.0%	261,380	0.2%	279,200	6.8%
December	255,370	1.0%	272,400	6.7%	295,790	8.6%
January	248,460	-6.0%	253,110	1.9%	257,920	1.9%
February	225,440	-5.8%	237,040	5.1%	266,530	12.4%
March	239,830	-13.6%	281,250	17.3%	313,710	11.5%
April	255,760	-9.1%	293,530	14.8%	292,660	-0.3%
May	244,740	-16.8%	301,190	23.1%	311,360	3.4%
June	175,330	-36.6%	304,570	73.7%	322,870	6.0%
Total Year	3,023,750	-7.5%	3,202,740	5.9%	3,537,590	10.5%

### 1.2.1 Truck Enforcement Program

Historical truck traffic on the I-95/Delaware Turnpike has consistently ranged from about 11 to 16 percent of total traffic. However, during the summer of 2014, truck trends varied from the norm, dropping to 7.7 and 7.1 percent of total traffic in June and July. **Table 1.6** shows this unusual decrease in commercial vehicles as well as the general trend in truck traffic and revenue from FY 2014 to FY 2016.

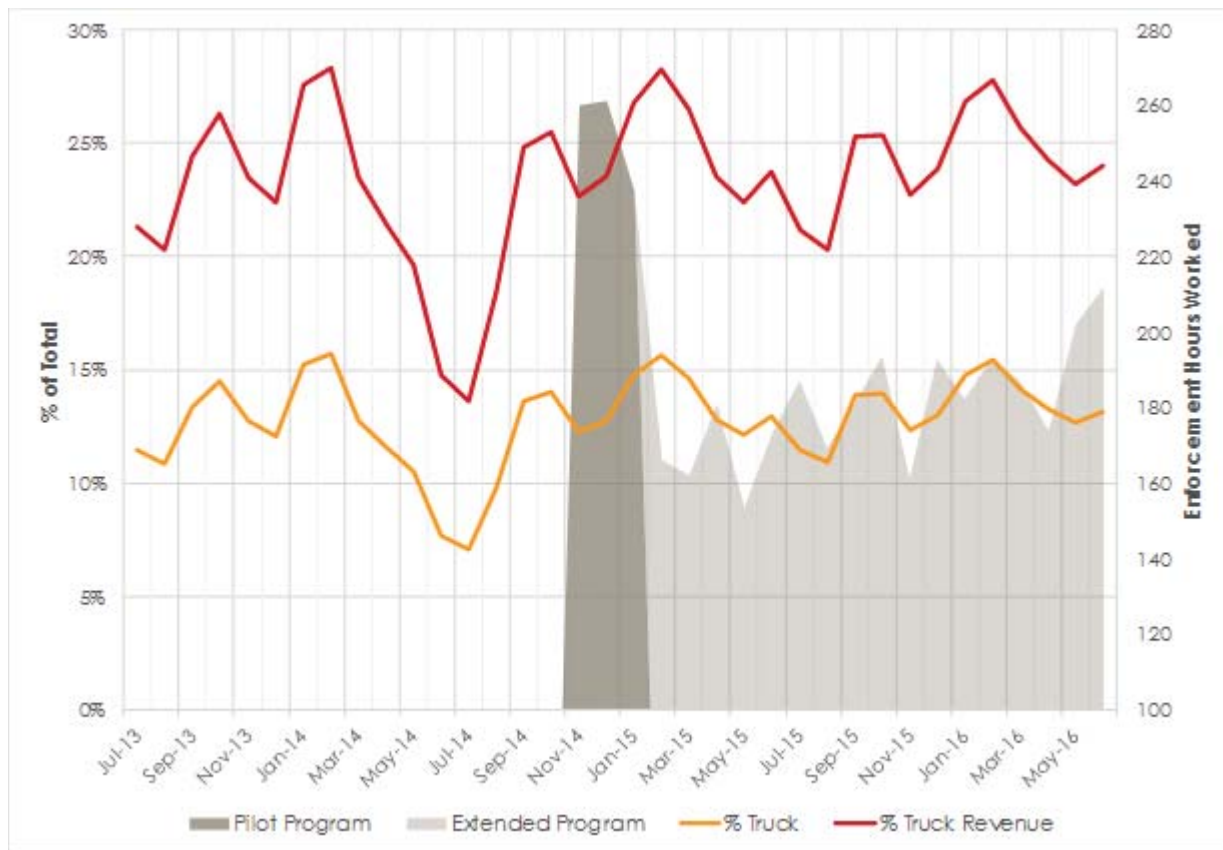
**Table 1.6: I-95/Delaware Turnpike Truck Statistics, FY 2014 – 2016**

Month	FY-14			FY-15			FY-16		
	Total Vehicles	% Truck	Truck % Revenue	Total Vehicles	% Truck	Truck % Revenue	Total Vehicles	% Truck	Truck % Revenue
JUL	2,452,299	11.5%	21.3%	2,486,360	7.1%	13.6%	2,661,249	11.4%	21.2%
AUG	2,607,552	10.9%	20.3%	2,673,228	9.8%	18.4%	2,720,921	10.9%	20.3%
SEP	1,987,511	13.4%	24.4%	1,979,175	13.6%	24.8%	2,099,591	13.9%	25.3%
OCT	1,974,934	14.5%	26.3%	2,070,475	14.1%	25.5%	2,180,924	14.0%	25.3%
NOV	2,043,740	12.8%	23.5%	2,127,256	12.3%	22.7%	2,261,931	12.3%	22.7%
DEC	2,119,530	12.0%	22.4%	2,136,348	12.8%	23.5%	2,268,030	13.0%	23.9%
JAN	1,629,813	15.2%	27.6%	1,715,318	14.8%	26.8%	1,742,539	14.8%	26.9%
FEB	1,434,413	15.7%	28.3%	1,512,938	15.7%	28.2%	1,727,808	15.4%	27.8%
MAR	1,883,213	12.7%	23.5%	1,924,238	14.6%	26.5%	2,217,642	14.1%	25.7%
APR	2,211,311	11.6%	21.5%	2,293,371	12.8%	23.5%	2,200,351	13.3%	24.3%
MAY	2,328,084	10.5%	19.7%	2,481,188	12.1%	22.4%	2,460,066	12.7%	23.2%
JUN	2,275,128	7.7%	14.8%	2,350,918	13.0%	23.8%	2,450,949	13.2%	24.0%
<b>TOTAL</b>	<b>24,947,528</b>	<b>12.1%</b>	<b>22.4%</b>	<b>25,750,813</b>	<b>12.4%</b>	<b>22.9%</b>	<b>26,992,001</b>	<b>13.1%</b>	<b>24.0%</b>

Many factors contributed to the drastic decrease in commercial traffic on I-95 in FY 2014 and FY 2015, one of which being full closure of I-495 over the Christiana River from June through August 2014. While these effects on I-95 are very apparent during those same months, truck traffic was already declining prior to I-495 closures, dropping from 15.7 percent in February to 12.7, 11.6 and 10.5 percent in March, April and May of FY 2014.

Due to the decrease in commercial traffic at Newark Plaza, Delaware Department of Transportation instituted a pilot program to enforce Newark Plaza toll evasion by commercial vehicles along competing toll-free roadways surrounding I-95. Starting November 2014, police heavily enforced 9-ton weight restrictions by stopping oversized vehicles sighted on the Christiana Parkway and SR 896. The program was extended in February FY 2015 but to a lesser degree and will continue through FY 2017. **Figure 1.2** shows the relationship between the number of enforcement program (pilot and extended) hours worked and truck statistics on I-95. There was a noticeable spike in commercial traffic and revenue in the months following enforcement program inception, as can be seen between December 2014 and February 2015. Toll evasion was not the sole contributor to declining truck traffic on I-95, but the problem was compounded by aforementioned roadway closures and construction in the area.

**Figure 1.2: I-95 Truck Statistics vs. Enforcement Program Hours Worked**



### 1.3 TRAFFIC CHARACTERISTICS

Traffic on the I-95/Delaware Turnpike is characterized by method of toll payment (cash, E-ZPass), type of vehicle (auto, truck) and monthly traffic patterns.

#### 1.3.1 Toll Payment Method

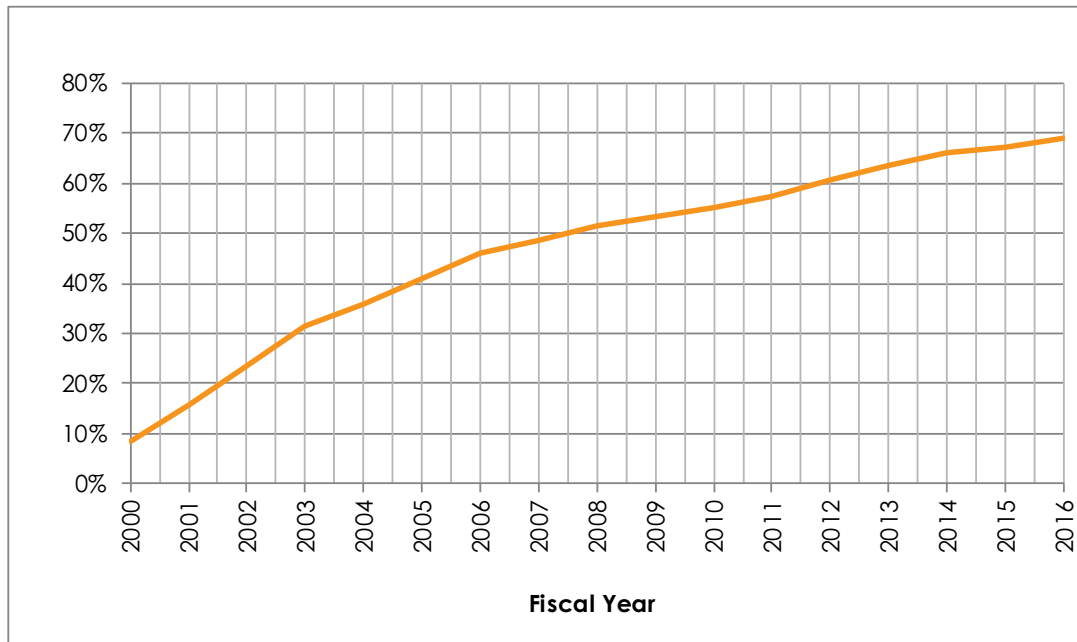
Transactions for two-axle vehicles by payment type (cash versus E-ZPass) since FY 2000, the first full year following the implementation of E-ZPass on the Turnpike in January 1999, are listed in **Table 1.7** and shown graphically in **Figure 1.3**. Only the two-axle/E-ZPass users were eligible for the E-ZPass discount (\$1.25 E-ZPass versus \$2.00 cash) between January 1999 and September 30, 2005. The table indicates that the two-axle E-ZPass market share consistently increased during the six years when a deep discount was offered on the Delaware Turnpike, reaching the 41 percent level in FY 2005.

E-ZPass usage has continued to increase although at a slower rate than the period when the discount was in place. Part of this increase can be attributed to the regional aspect of E-ZPass convenience and cost savings in the Northeast Corridor, where other toll road operators have offered a discount for E-ZPass users and have introduced All Electronic Toll (AET) collection. E-ZPass exceeds 80 percent on some facilities in the New York metropolitan area. On I-95/Delaware Turnpike, E-ZPass transaction share has steadily increased over the past ten years. Two-axle, E-ZPass transaction share has grown from one to three percent per year, reaching 69 percent E-ZPass transaction share in FY 2016.

**Table 1.7: I-95/Delaware Turnpike Passenger Car E-ZPass Usage, FY 2000 – 2016**

Fiscal Year	Two-Axle Transactions (000)			Percent E-ZPass
	Cash	E-ZPass	Total	
2000	20,306	1,907	22,213	9%
2001	19,057	3,568	22,625	16%
2002	18,297	5,615	23,912	23%
2003	16,524	7,589	24,113	31%
2004	15,965	8,841	24,806	36%
2005	14,434	10,061	24,495	41%
2006	12,786	10,835	23,621	46%
2007	11,908	11,294	23,202	49%
2008	10,960	11,590	22,550	51%
2009	10,378	11,858	22,236	53%
2010	9,949	12,291	22,240	55%
2011	9,102	12,159	21,261	57%
2012	8,619	13,181	21,800	60%
2013	7,868	13,723	21,591	64%
2014	7,465	14,459	21,924	66%
2015	7,406	15,142	22,548	67%
2016	7,308	16,146	23,454	69%

**Figure 1.3: I-95/Delaware Turnpike Passenger Cars E-ZPass Usage  
FY 2000 – 2016**



Commercial vehicles have a higher level of E-ZPass use, reaching 86 percent in FY 2016 as shown in **Table 1.8**. This is due to the increased accountability available by using E-ZPass instead of cash and the ease of usage. In addition to the acceptance of E-ZPass toll payment on toll facilities throughout the Northeast and Midwest states, many facilities have introduced AET.

**Table 1.8: I-95/Delaware Turnpike E-ZPass Usage by Commercial Vehicles  
FY 2010 – 2016**

Fiscal Year	Commercial Vehicle Transactions (000)			Percent E-ZPass
	Cash	E-ZPass	Total	
2010	784	2,519	3,303	76%
2011	708	2,491	3,199	78%
2012	638	2,642	3,280	81%
2013	588	2,680	3,268	82%
2014	511	2,510	3,021	83%
2015	498	2,705	3,203	84%
2016	478	3,060	3,538	86%

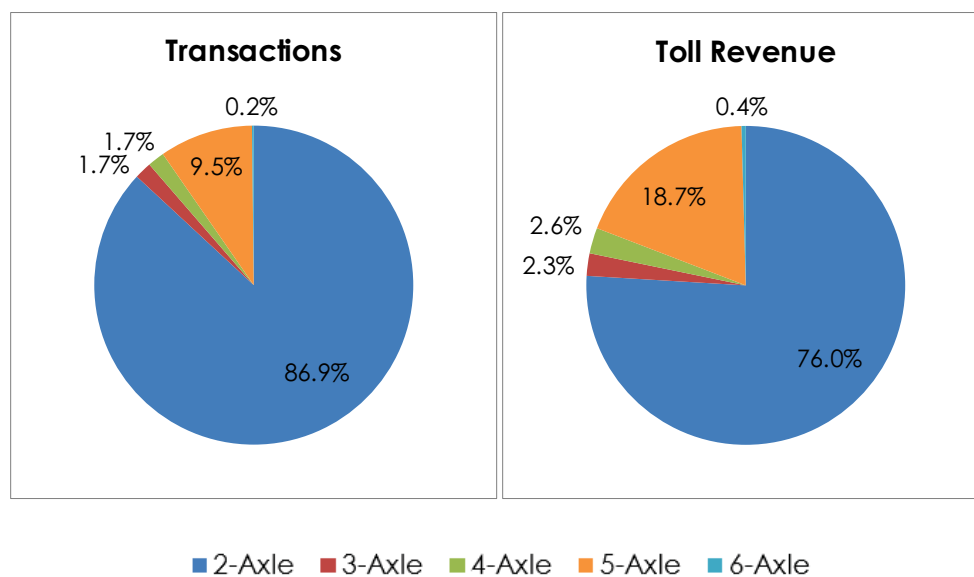
### 1.3.2 Vehicle Types

Traffic and revenue results for FY 2016 by vehicle toll classification are summarized in **Table 1.9** and shown graphically in **Figure 1.4**. While two-axle vehicles are 86.9 percent of total transactions, they are only 76.0 percent of toll revenue. The second highest toll classification category is five-axle vehicles which account for 9.5 percent of transactions and 18.7 percent of revenue. The remaining commercial vehicle categories account for 3.6 percent of transactions and 5.3 percent of toll revenue.

**Table 1.9: I-95/Delaware Turnpike Traffic and Revenue by Toll Classification, FY 2016**

Vehicle Class	Transactions		Toll	Toll Revenue	
	Volume (000)	Percent of Total		Amount (000)	Percent of Total
2-Axle	23,454	86.9%	\$ 4.00	\$ 93,818	76.0%
3-Axle	469	1.7%	\$ 6.00	\$ 2,813	2.3%
4-Axle	460	1.7%	\$ 7.00	\$ 3,222	2.6%
5-Axle	2,557	9.5%	\$ 9.00	\$ 23,017	18.7%
6-Axle	48	0.2%	\$ 11.00	\$ 529	0.4%
Permit	3	0.0%	\$ 11.00	\$ 32	0.0%
<b>Total</b>	<b>26,992</b>	<b>100.0%</b>		<b>\$ 123,431</b>	<b>100.0%</b>

**Figure 1.4: I-95/Delaware Turnpike Traffic and Revenue by Vehicle Class, FY 2016**



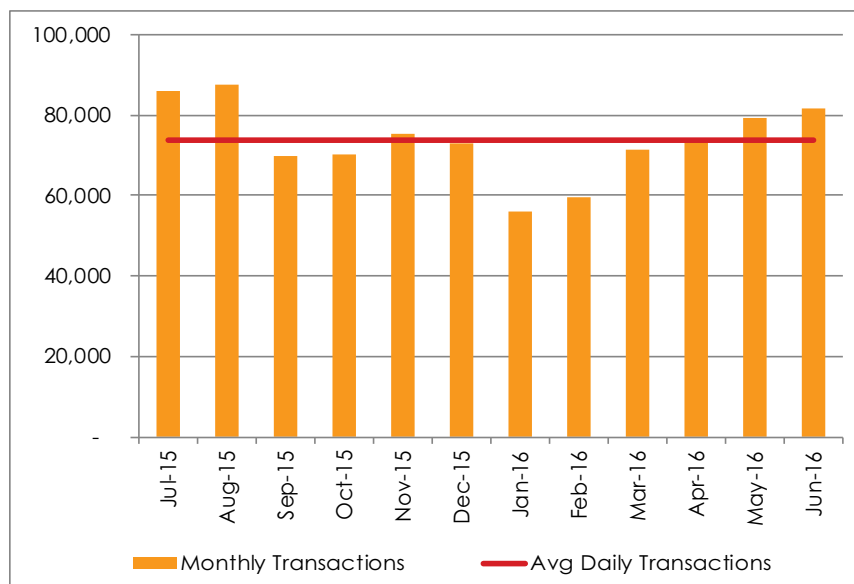


### 1.3.3 Monthly Traffic Patterns

Monthly average daily toll transactions ranged from 24 percent below the Average Annual Daily Traffic (AADT) volumes in January to 19 percent above the average in August. The January data reflect the winter conditions while July and August traditionally have the highest traffic volumes due to the influences of recreational travel in the Northeast Corridor. The noticeable spike in November traffic is due to Thanksgiving weekend travel. December results reflect additional traffic associated with the Christmas/New Year holiday period. January and February have the lowest travel levels due to common inclement weather conditions. Traffic volumes in April and December were closest to AADT. Monthly variations in traffic at the Newark Plaza are presented in **Table 1.10** and shown graphically in **Figure 1.5**.

**Table 1.10: I-95/Delaware Turnpike Monthly Traffic, FY 2016**

Month	Monthly Transactions		Average Daily Transactions	
	Volume (000)	Percent of Year	Volume	Ratio to Annual Avg
Jul-15	2,661	9.9%	85,847	1.16
Aug-15	2,721	10.1%	87,772	1.19
Sep-15	2,100	7.8%	69,986	0.95
Oct-15	2,181	8.1%	70,352	0.95
Nov-15	2,262	8.4%	75,398	1.02
Dec-15	2,268	8.4%	73,162	0.99
Jan-16	1,743	6.5%	56,211	0.76
Feb-16	1,728	6.4%	59,580	0.81
Mar-16	2,218	8.2%	71,537	0.97
Apr-16	2,200	8.2%	73,345	0.99
May-16	2,460	9.1%	79,357	1.08
Jun-16	2,451	9.1%	81,698	1.11
<b>Total</b>	<b>26,992</b>	<b>100.0%</b>	<b>73,749</b>	<b>1.00</b>

**Figure 1.5: I-95/Delaware Turnpike Monthly Traffic, FY 2016**

## 1.4 FACTORS AFFECTING I-95 TRAFFIC GROWTH

As an established route within the region, Delaware Turnpike traffic growth depends on population trends in the Northeast Corridor and their relationship to traffic growth, the price of gasoline, and highway improvements in the regional transportation network.

### 1.4.1 Northeast Corridor Population

With the Delaware Turnpike serving as a central link in I-95 between Washington and New York, the population of the five states and District of Columbia provide the base from which most of the traffic passing through the Newark Plaza is generated.

The values in **Table 1.11** include historical population by state from the Census Bureau for years up to and including 2010. Census Bureau, state, and Metropolitan Planning Organization (MPO) data sources forecast growth from 2011-2040. As expected, the low level of annual growth reflects the extensive existing development of the regions served by the Delaware Turnpike. The compounded average growth rate of the corridor population from 2000 to 2010 is 0.3 percent per year, while the compounded growth rate for Delaware is 1.3 percent. Population in the region is estimated to grow at an average annual rate of 0.3 percent through 2025, which includes the period of the traffic and revenue forecasts included in this report.

**Table 1.11: Northeast Corridor Population**

Year	Population (000)							Compound Annual Growth Rate (CAGR)
	DC	MD	DE	PA*	NJ	NY	Total	
2000	572	5,311	786	12,286	8,431	18,976	46,362	-
2005	582	5,583	838	12,418	8,622	19,336	47,379	0.4%
2010	602	5,774	900	12,702	8,792	19,378	48,147	0.3%
2015	661	6,010	944	12,706	8,973	19,547	48,841	0.3%
2020	716	6,225	982	12,872	9,166	19,697	49,657	0.3%
2025	764	6,430	1,015	13,031	9,377	19,787	50,404	0.3%
2030	809	6,612	1,041	13,190	9,584	19,795	51,031	0.2%
2035	852	6,762	1,060	13,353	9,789	19,729	51,546	0.2%
2040	884	6,890	1,075	13,517	9,998	19,624	51,987	0.2%

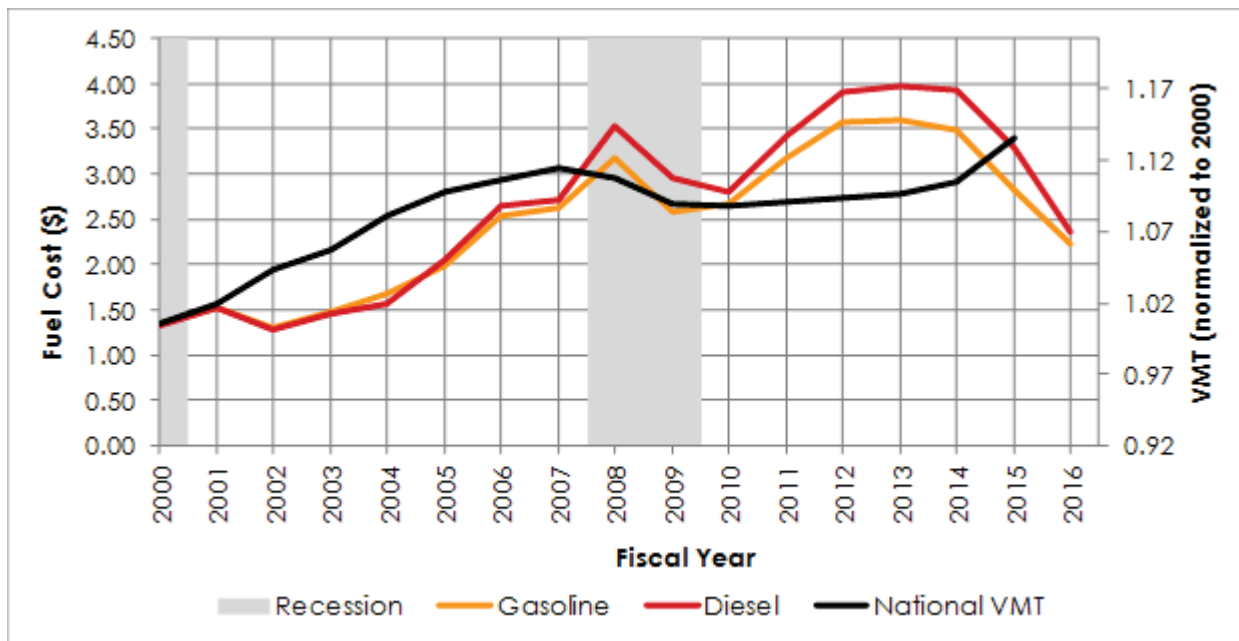
\*Five-year population data interpolated

Source: Delaware Population Consortium, State of Maryland, Metropolitan Washington Council of Governments, State of New Jersey, Cornell University

## 1.4.2 Fuel Prices and Vehicle Miles of Travel

Over the last several years, the cost of fuel and the recession have had significant impacts on travel patterns not only in the Delaware Turnpike corridor but across the nation. As shown in **Figure 1.6**, the cost of gasoline and diesel fuel increased by 135 and 167 percent over the 9-year period from FY 2000-2008, reflecting the impact of Hurricane Katrina in FY 2005, while the increases through FY 2008 reflected strong worldwide demand, particularly in developing nations. In FY 2009, the price of fuel declined as the impact of the recession slowed the demand for travel and reduced fuel consumption. From 2010 to 2012, recovery from the global recession has increased demand for fuel and the corresponding cost until 2012 when the cost stabilized. Within the past two years, the cost of gasoline and diesel fuel has decreased by 27 and 40 percent.

Figure 1.6: Fuel Cost Trends



Source: U.S. Energy Information Agency

In July 2008, the average price of gasoline was the highest recorded, \$4.143 per gallon on the east coast of the U.S. Prices then dropped in the second half of 2008, remaining steady through 2009 and increasing through 2010. In May, 2011, the next peak, prices were \$4.02 per gallon on the east coast. February 2016 had the lowest average gas prices since the recession at \$1.92 per gallon. As of August 2016, the U.S. Energy Information Administration reports that the price of gasoline averaged \$2.18 per gallon nationally. Since 2014 fuel price have declined, national vehicle miles traveled (VMT) has increased, which has historically been the trend as depicted in **Figure 1.6**.

Factors contributing to changes in the price and availability of gasoline are both upward and downward and each has an unknown element that contributes to uncertainty. These factors include:

- Dependency on imported crude oil - U.S. dependency on imported fuel has decreased as a result of continued domestic development of light oil and increased development of offshore resources in the Gulf of Mexico. The U.S. Energy Information Administration (EIA) of the Department of Energy anticipates that, by 2020, domestic crude oil production will be at the high levels previously seen in 1994;
- Use of substitute fuels – The use of biofuels has increased in the US, thus reducing the need for gasoline;
- Supply – domestic oil drilling has increased in the Gulf of Mexico;

- Level of demand – According to the EIA International Energy Outlook 2016, “almost no increase in transportation energy consumption is projected... as continued fuel economy improvements offset growth in vehicles miles traveled”;
- Motor vehicle fuel efficiency – Preliminary adjusted composite model year 2014 fuel economy of 24.2 miles per gallon (mpg) is the highest level of fuel efficiency since the US Environmental Protection Agency (EPA) began its analysis of light-duty automotive vehicles in 1975, and the trend continues upward. In 2012, the US Department of Transportation and the EPA issued standards that will increase fuel economy to the equivalent of 54.5 mpg for cars and light trucks by Model Year 2025;
- National Highway Traffic Safety Administration and the EPA raised the fleet wide federal Corporate Average Fuel Economy (CAFE) requirements to 34.1 mpg for 2016, which is an average of passenger cars (37.8 mpg) and light trucks (28.8 mpg).

In the near term September 2016 Short-Term Energy Outlook, the Energy Information Agency (EIA) indicates that the price of regular grade gasoline will average about \$2.08 in 2016 and increase to \$2.26 in 2017. It is assumed that the on-going increases of fuel economy will help offset the periodic spikes in fuel prices that will occur sporadically during the forecast period out to 2020.

Sharp increases in the price of gasoline in 2008 and 2011 resulted in decreases in Vehicle Miles of Travel (VMT) in the US and in the region served by the I-95/Delaware Turnpike. Data from the U.S. Federal Highway Administration shown in **Table 1.12** indicate that VMT on a national level decreased 2.5 percent between 2007 and 2008 and 2.2 percent between 2010 and 2011. Similar patterns can be seen in data for Delaware and the neighboring states of New Jersey, Pennsylvania and Maryland. VMT in Delaware decreased from a high of 9.5 billion miles in 2006 down to 8.9 billion in 2011. Since then, travel has increased reaching an annual level of 9.9 billion in 2015.

**Table 1.12: Vehicle Miles of Travel in U.S. and States Served by I-95/Delaware Turnpike**

Annual VMT (millions)				
Year	US	NJ	DE	PA
2010	2,996,295	73,538	9,118	104,217
2011	2,931,080	71,944	8,936	100,235
2012	2,954,205	73,864	9,125	99,318
2013	2,972,233	73,786	9,180	98,978
2014	3,030,893	73,750	9,340	98,747
2015	3,141,863	75,383	9,787	100,901
2016**	1,018,595	23,931	2,995	30,501
Percent Change over Previous Year				
2011	-2.2%	-2.2%	-2.0%	-3.8%
2012	0.8%	2.7%	2.1%	-0.9%
2013	0.6%	-0.1%	0.6%	-0.3%
2014	2.0%	0.0%	1.7%	-0.2%
2015	3.7%	2.2%	4.8%	2.2%
2016**	3.7%	3.3%	4.6%	3.4%

\*\* First Quarter

Source: US Federal Highway Administration

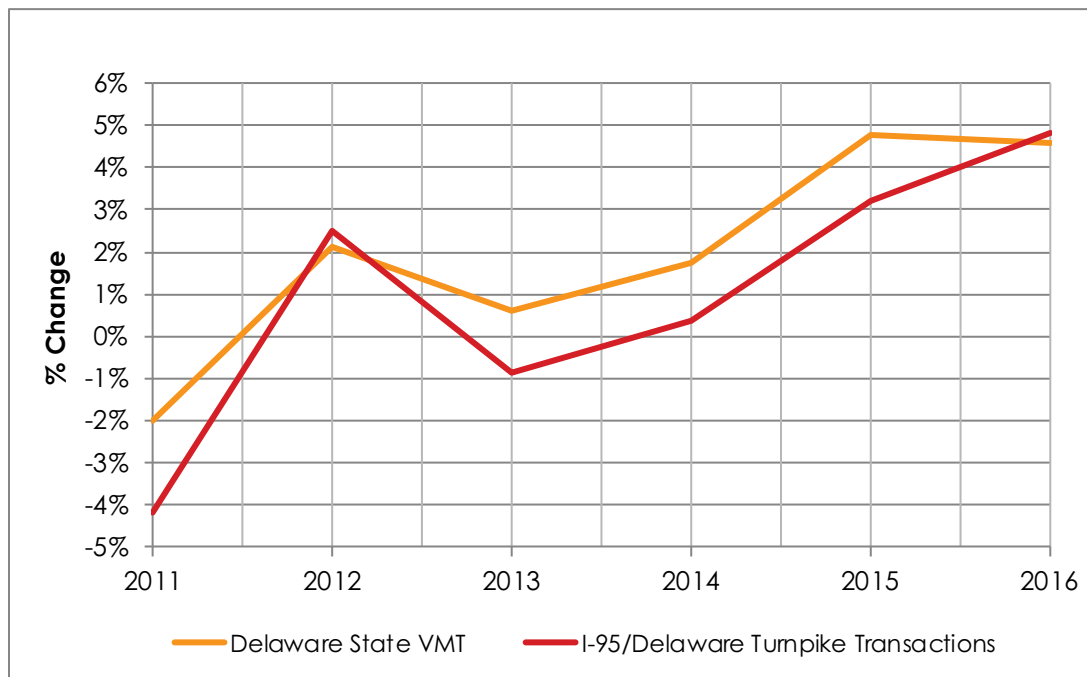
The percent change for Delaware VMT and I-95/Delaware Turnpike transactions are shown in **Table 1.13**. The patterns of change are similar even though the data sets are off by six months since the VMT data are on a calendar year basis while the Turnpike data are reported for the fiscal year. Also, the effect of the October 2007 toll increase can be seen in the decrease in Turnpike transactions for FY 2008. Despite these differences, the comparison does indicate that the growth trend for Turnpike traffic follows the general travel pattern for the State.

**Table 1.13: Comparison of VMT Changes in Delaware and on I-95**

Year*	Percent Change over Previous Year	
	Delaware State VMT	I-95/Delaware Turnpike Transactions
2011	-2.0%	-4.2%
2012	2.1%	2.5%
2013	0.6%	-0.9%
2014	1.7%	0.4%
2015	4.8%	3.2%
2016	4.6%	4.8%

\*Fiscal year for I-95/Delaware Turnpike data and Calendar Year for VMT data.

Sources: Delaware Department of Transportation and U.S. Federal Highway Administration.

**Figure 1.7: Comparison of Changes in VMT in Delaware and I-95 Transactions**

Overall, regional traffic growth has been strong. **Table 1.14** shows the growth comparison from 2014 to 2015 at Delaware and Maryland toll plazas.

**Table 1.14: I-95 Toll Plaza Growth Comparison, 2014 – 2015**

Plaza Name	Percent Change
I-95 Newark Plaza (DE)	3.2%
JFK/Susquehanna Plaza (MD)	4.0%

### 1.4.3 Highway Network Improvements

As for the existing roadway network, the local toll-free routes that are parallel to the Delaware Turnpike in the Newark area (SR 4, Old Baltimore Pike and US 40) have existed for many years. Their traffic patterns and toll impacts are well established and an accomplished fact. The traffic regulations restricting through trucks over nine tons from using SR 4 or Old Baltimore Pike (west of SR 896, near the Turnpike's Newark plaza) have been in place for more than 20 years and are well enforced as noted above.

Similarly, on a more regional basis, SR 896 south into US 301, and from there to the Chesapeake Bay Bridge, was (except for a 10-mile section north and west of Middletown, Delaware) upgraded to a four-lane, at-grade facility with good control of access. This is another route with established traffic patterns vis-a-vis the Delaware Turnpike. US 301 has been improved from SR 299 in Middletown southward to Levels Road just to the east of the Maryland state line, but the remaining sections above and below this localized improvement remain as two-lane roadways providing some restriction on travel flow through Middletown.

DelDOT has been implementing a series of major improvements to I-95/Delaware Turnpike. Projects completed to date include widening between the SR 1 interchange and the I-95/I-295 junction; the conversion of the Newark toll plaza to include two high-speed E-ZPass lanes in each direction (completed 2011); reconfiguring of the I-95/SR 1 interchange at the Christiana Mall (completed around March 2014); rehabilitation of the Newport Viaduct at SR 141 (completed September 2014). Further north I-95 northeast of the I-95/Delaware Turnpike, the US 202/I-95 interchange reconstruction was completed November 2015.

Delaware DOT proposes widening SR 1 between Route 273 in the vicinity of Christiana south to the Roth Bridge over the C&D Canal. The project includes widening SR 1 by adding a travel lane in each direction, widening bridges to accommodate the additional travel lanes and reconfiguring the supporting interchanges at SR 273, US 40, US 13/Tybouts Corner and SR 72. After projected 2020 completion, the SR 1 Toll Road will have additional capacity and improved access, making it a possible competitor to I-95.

Projects currently under construction include improvements to the SR 141/I-95 interchange (anticipated to be completed by the end of 2018); the Carr Road/Marsh Road/I-95 ramps (scheduled to be completed by 2019); and US 301 four-lane, access-controlled and tolled extension from the MD/DE state line to SR 1 south of the C&D Canal (estimated completion January 2019).

The US 301 extension opening is expected to have an impact on I-95 traffic. Contingent on the toll plan and anticipated time savings of the US 301 Mainline Toll Road, it could be expected to divert a minimal amount of traffic from the Newark plaza. The impacts of the opening of the US 301 Toll Road on the Newark Plaza are included in the forecasts presented in this report.

Future planned projects include I-95 and SR 896 interchange improvements to address congestion and safety (anticipated completion through 2023).



## 1.5 TRAFFIC AND REVENUE FORECAST, FY 2017 – 2023

Using the growth rate trends along with anticipated future economic conditions, Stantec developed the forecast of Turnpike traffic, toll revenue and concession revenue through FY 2023 as presented in **Table 1.15**.

**Table 1.15: I-95/Delaware Turnpike Traffic and Revenue Forecast, FY 2017 – 2023**

Fiscal Year	Annual Transactions		Toll Revenue		Concession Revenue		Total Revenue	
	Volume (000)	Percent Change	Total (000)	Avg per Vehicle <sup>(1)</sup>	Total (000)	Avg per Vehicle <sup>(1)</sup>	Total (000)	Percent Change
2014	24,948	-	\$ 113,051	\$ 4.532	\$ 2,484	\$ 0.100	\$ 115,535	-
2015	25,751	3.2%	\$ 117,055	\$ 4.546	\$ 2,393	\$ 0.093	\$ 119,448	3.4%
2016	26,992	4.8%	\$ 123,431	\$ 4.573	\$ 2,440	\$ 0.090	\$ 125,871	5.4%
2017	27,424	1.6%	\$ 125,406	\$ 4.573	\$ 2,479	\$ 0.090	\$ 127,885	1.6%
2018	27,863	1.6%	\$ 127,412	\$ 4.573	\$ 2,519	\$ 0.090	\$ 129,931	1.6%
2019	28,140	1.0%	\$ 128,680	\$ 4.573	\$ 2,544	\$ 0.090	\$ 131,224	1.0%
2020	28,341	0.7%	\$ 129,597	\$ 4.573	\$ 2,562	\$ 0.090	\$ 132,159	0.7%
2021	28,543	0.7%	\$ 130,521	\$ 4.573	\$ 2,580	\$ 0.090	\$ 133,102	0.7%
2022	28,746	0.7%	\$ 131,452	\$ 4.573	\$ 2,599	\$ 0.090	\$ 134,051	0.7%
2023	28,951	0.7%	\$ 132,389	\$ 4.573	\$ 2,617	\$ 0.090	\$ 135,007	0.7%

Notes: (1) Rate per vehicle for FY 2017 through FY 2023 estimated to be same as rate for FY 2016  
 2014 – 2016: actual values received from DelDOT  
 2017 – 2023: Stantec estimates

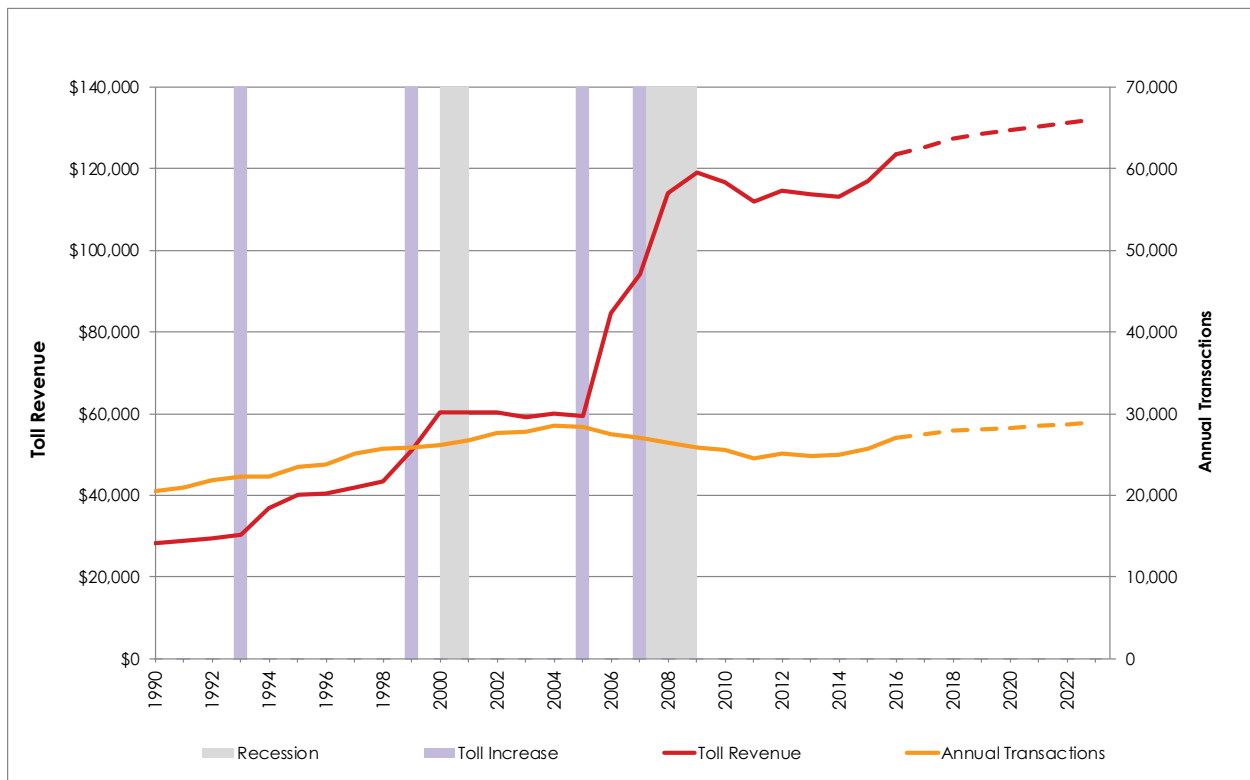
Transactions for FY 2016 increased 4.8 percent from FY 2015. This reflects the effects of ongoing construction on US 301 among other factors noted previously. For the forecast beyond FY 2016, I-95/Delaware Turnpike traffic was estimated based on the historical relationship between the historical Turnpike traffic growth, population growth and future regional roadway conditions. The average annual growth rate from FY 2013 to 2016, with weather conditions and other anomalies removed, was 1.6 percent per year. The reasons for this strong growth include the strong economy, low gas prices, enhanced operations after construction as well as traffic diversion to I-95 due to construction-related congestion on US 301. The I-95/Delaware Turnpike is expected to grow at the same rate for the duration of US 301 construction; from FY 2017 through US 301 opening in the first half of FY 2019.

Between 1990 and 2016, population in the region served by the Turnpike increased at an average annual rate of 0.44 percent. During the same period, Turnpike transactions increased at an average annual rate of 1.06 percent. Using these data, a general growth trend relating corridor population growth to transaction growth was established. Dividing the transaction growth rate (1.06 percent) by the population growth rate (0.44 percent) yields a factor of 2.39. Applying that factor to the expected population growth rate from 2020 to 2025 of 0.30 percent yields an expected transaction growth of 0.71 percent annually from FY 2019 through the forecast period. Although, as previously discussed, the US 301 extension is expected to divert

some traffic away from Newark Plaza on I-95 in its opening year from January through December 2019 – which straddles the second half of FY 2019 and the first half of FY 2020. Therefore, the anticipated volume decrease caused by US 301 opening was split between FY 2019 and FY 2020. US 301 opening diversion impacts on I-95 were based on Stantec's September 2012 US 301 Mainline Toll Road T&R Forecast calculations.

The toll forecast is based on the continuation of the truck enforcement program and toll schedule implemented on October 1, 2007 throughout the forecast period. The average toll rate per transaction was derived from FY 2016 revenue and transactions. Historical and projected transactions and toll revenue are shown in **Figure 1.8**. Note that the concession revenue is based on the estimated traffic volumes and a rate per vehicle of 9.0 cents per vehicle, the same value as the rate for FY 2016.

**Figure 1.8: Historical and Projected I-95 Transactions and Revenue, FY 1990 – 2023**



## 2.0 SR 1 TOLL ROAD

The SR 1 Corridor extends 100 miles, nearly the full length of the state, from the I-95/Delaware Turnpike in New Castle County southward to the Maryland state line (at Fenwick Island in Sussex County) on the approach to Ocean City. Within the corridor, SR 1 Toll Road has three distinct components:

- The six-mile freeway section from the Delaware Turnpike to the junction with the US 13 at Tybouts;
- The 41-mile toll road section from Tybouts to the junction with US 113 south of Dover Air Force Base; and
- The 50-mile at-grade divided arterial section (except for the freeway by-pass of Milford) from Dover AFB to the Maryland line.

It is the middle segment that is the SR 1 Toll Road.

### 2.1 TRANSPORTATION INFRASTRUCTURE IN DELAWARE'S N-S CORRIDOR

Until the openings of the freeway and toll road sections between the Turnpike and Dover, US 13 was essentially the only direct arterial route down the middle of the state (straight through the congested portions of Odessa, Smyrna and Dover), serving both inter-city traffic and local traffic within each community. There was only limited right-of-way to significantly increase the capacity of SR 13, and levels of service were already intolerable, especially on summer weekends. The solution was a new expressway on separate right-of-way, with toll financing for the middle section. This section, the SR 1 Toll Road, is the highway "spine" of the north-south corridor. It consists of two lanes in each direction with room for expansion to three lanes in each direction.

The SR 1 Toll Road, from Tybouts to US 113 south of Dover AFB, was constructed in stages over a period of 10 years:

- The first (southern) section opened to traffic was the 17 miles from US 13 north of Smyrna to US 113 south of Dover, in December 1993. This section, which provides a bypass of both Dover and Smyrna, contains one main-line toll plaza (the Dover plaza) and tolls on the northerly interchange ramps at Denneys Road (Dover-north) and Smyrna-south.
- The next (northern) section that was opened, in December 1995, was the five miles from the existing freeway section at Tybouts, over the Chesapeake and Delaware (C&D) Canal to a temporary tie-in to US 13 (at that time) south of the canal. No tolls were collected on this section of the SR 1 Toll Road while the temporary tie-in was still in operation.
- The two-mile extension from the temporary southern terminus south of Dover (north of Dover AFB) to south of Dover AFB was opened to traffic in January 1999. No additional

tolls are collected in this section, because traffic on the extension funnels through the Dover plaza.

- The northern section of the SR 1 Toll Road was extended another nine miles in November 1999, from just south of the C&D Canal, bypassing Odessa and tying back into US 13 south of Odessa. This section has a main-line toll plaza (the Biddles plaza) two miles south of the canal and tolls on the southerly interchange ramps at SR 896 (Boyd's Corner). West of Odessa (on the bypass), an interchange is provided at SR 299, where the southerly ramps are currently toll-free. A toll-free outlet is provided just south of the canal (as was provided previously via the tie-in to US 13) at Road 412, allowing motorists to use the canal bridge without paying a toll; the Biddles plaza is located south of Road 412. (The Road 412 ramps are also known as the Scott Run ramps.)
- The Puncheon Run Connector, a two-mile spur connecting SR 1 with US 13 south of Dover, was opened to traffic in December 2000. While there is no toll collection on the spur itself, the Connector has induced greater usage of SR 1 Toll Road through the Dover plaza.
- The last section, the seven-mile gap between Smyrna-north and Odessa-south, was opened in May 2003, completing the 41-mile toll road.

The SR 1 Toll Road, as mentioned previously, provides the key link in Delaware's north-south corridor, with some 15 interchanges serving local as well as through travel between Tybouts and Dover. US 13 remains available for local traffic within and between the cities that are bypassed by SR 1. However, it is estimated that, since US 13 is the main arterial street through Dover, Smyrna, and Odessa, with its shopping malls and strip development, most of the traffic growth in the corridor has and will occur on SR 1.

The north-south corridor is also served, marginally, by three other routes that cross the C&D Canal: SR 9 to the east; SR 896-71/US 301 (via the Summit Bridge) to the west; and SR 213 in Maryland. Currently none of these routes is a significant competitor to SR 1; in fact, SR 71 merges back into US 13 at Blackbird, midway between Odessa and Smyrna.

## 2.2 TOLL COLLECTION

The barrier/ramp setup on the SR 1 Toll Road includes a combination of two mainline plazas – Biddles near the north end and Dover near the south end; and three sets of ramp tolls in between the two main-line plazas – SR 896/Boyd's Corner (to/from south); Smyrna/south (to/from north); and Denneys Road/north Dover (to/from north). Tolls are collected in each direction at each of these locations. With the implementation of E-ZPass on the SR 1 Toll Road in April 1999, DelDOT established a system that allows for the per-mile tolling of E-ZPass users through transponder detection at all entry/exit points instead of only at the toll plaza/toll ramp location.

Weekend toll rates were increased by \$1.00 for all vehicle types except passenger car frequent travelers at the mainline plazas (Biddles and Dover) on August 1, 2014. Under the current ramp

plaza toll plan implemented in 2007, the tolls for cash and E-ZPass transactions are the same as the previous level. At the mainline Biddles and Dover toll plazas, tolls on weekends (7 PM Friday to 11 PM Sunday) are \$1.00 higher than weekday tolls.

The Frequent Traveler toll discount program provides a 50 percent discount off the cash tolls for two-axle vehicles using E-ZPass on SR 1 Toll Road for 30 or more trips during a 30-day period. A trip is defined in which a toll is charged against a customer's account, regardless of entry and exit. These adjustments are made through the toll calculation process at the Customer Service Center. The frequency-of-use provision only applies to non-commercial two-axle vehicles.

The commercial vehicle E-ZPass program provides a 25 percent discount for vehicles of three or more axles without having to make a minimum number of trips. The discounted tolls for passenger cars and trucks are available during weekends. The current tolls at the five toll locations are listed in **Table 2.1**.

**Table 2.1: SR 1 Toll Rates**

Vehicle Class	Mainline Plazas (Biddles and Dover)			Ramp Plazas			
	Weekday <sup>(1)</sup>	Weekend <sup>(2)</sup>		Boyds and Denneys		South Smyrna	
	Effective 10/1/07	Through 7/31/14	Effective 8/1/14	Through 9/30/07	Effective 10/1/07	Through 9/30/07	Effective 10/1/07
2-Axle <sup>(3)</sup>	\$ 1.00	\$ 2.00	\$ 3.00	\$ 0.50	\$ 0.50	\$ 0.25	\$ 0.25
3-Axle <sup>(4)</sup>	\$ 3.00	\$ 4.00	\$ 5.00	\$ 1.00	\$ 1.50	\$ 0.50	\$ 0.75
4-Axle <sup>(4)</sup>	\$ 4.00	\$ 5.00	\$ 6.00	\$ 1.50	\$ 2.00	\$ 0.70	\$ 1.00
5-Axle <sup>(4)</sup>	\$ 5.00	\$ 6.00	\$ 7.00	\$ 2.00	\$ 2.50	\$ 1.00	\$ 1.25
6-Axle <sup>(4)</sup>	\$ 6.00	\$ 7.00	\$ 8.00	\$ 2.50	\$ 3.00	\$ 1.25	\$ 1.50
Permit	\$ 11.00	\$ 10.00	\$ 11.00				

Notes: (1) Cash and E-ZPass

(2) Cash and E-ZPass, 7PM Friday to 11PM Sunday

(3) Frequent Traveler Program – 50 percent discount for passenger vehicles making 30 trips in 30 days

(4) Commercial Vehicle E-ZPass discount – 25 percent per transaction

For the full-length 41-mile trip between Dover Air Force Base and I-95, the weekday two-axle toll rate is 4.9 cents per mile and for weekends the cost is 14.6 cents per mile. The rate for some shorter trips is higher, depending on the entry-exit locations. The discounted rate for frequent users is 2.4 cents per mile on weekdays and 4.9 cents on weekends.

For a five-axle truck traveling the full length of the facility during a weekday and paying cash, the effective toll rate is 24.4 cents per mile. If the same trip used E-ZPass, the 25 percent commercial discount would reduce the toll to 18.3 cents per mile. The toll rates for passenger cars and for 5-axle trucks for a full-length trip are shown in **Table 2.2**.

**Table 2.2: SR1 Full-Length Tolls, Passenger Cars and 5-Axle Trucks**

Vehicle Class and Time Period	Full-Length Toll Rates <sup>(1)</sup>		Rate per Mile <sup>(2)</sup>	
	Through 7/31/2014	Effective 8/1/2014	Through 7/31/2014	Effective 8/1/2014
<b>Passenger Car</b>				
Weekday <sup>(2)</sup>	\$ 2.00	\$ 2.00	\$ 0.049	\$ 0.049
Weekend <sup>(3)</sup>	\$ 4.00	\$ 6.00	\$ 0.098	\$ 0.146
<b>Passenger Car Frequent Traveler Rate<sup>(4)</sup></b>				
Weekday	\$ 1.00	\$ 1.00	\$ 0.024	\$ 0.024
Weekend	\$ 2.00	\$ 2.00	\$ 0.049	\$ 0.049
<b>5-Axle Truck</b>				
Weekday <sup>(2)</sup>	\$ 10.00	\$ 10.00	\$ 0.244	\$ 0.244
Weekend <sup>(3)</sup>	\$ 12.00	\$ 14.00	\$ 0.293	\$ 0.341
<b>Commercial Discount Rate<sup>(5)</sup></b>				
Weekday	\$ 7.50	\$ 7.50	\$ 0.183	\$ 0.183
Weekend	\$ 9.00	\$ 10.50	\$ 0.220	\$ 0.256

Notes: (1) Full-length 41-mile trip between Dover Air Force Base and I-95

(2) Cash and E-ZPass

(3) Cash and E-ZPass- 7PM Friday to 11PM Sunday

(4) Frequent Traveler Program – 50 percent discount for passenger cars making 30 trips in 30 days

(5) Commercial Vehicle E-ZPass discount – 25 percent per transaction

The SR1 Toll Road, with two exceptions, is a “closed” system toll road; i.e., all interchange-to-interchange movements are tolled. One exception is between Tybouts and Road 412 (just south of the C&D Canal) due to the toll-free outlet (southbound exit and northbound entry ramps) at Road 412 and its connection back to US 13. One other toll-free outlet is provided at SR 299 west of Odessa, a leftover vestige from before the middle nine-mile gap between Odessa and Smyrna was completed. While both outlets allow for traffic diversions, the traffic and revenue record of SR 1 Toll Road already accounts for these diversions; i.e., they are an accomplished fact.

### 2.3 HISTORICAL TRAFFIC AND TOLL REVENUE

With the opening of the SR 1 Toll Road in December 1993, the Authority now has a record of transactions and revenue growth for more than 20 years. As a result of the opening of additional segments of the road, transactions increased from 6,250,000 in 1995, the first full fiscal year of operations, to 16,444,000 in FY 2000. Over the same period, toll revenue increased from \$2.3 million in FY 1995 to \$16.6 million in FY 2000.

In November 1999, the Canal-Odesa section (including the Biddles plaza) opened, followed by the Puncheon Run Connector in December 2000. Combined, these additions produced a 177 percent increase in traffic between FY 1999 and FY 2002 with the Biddles plaza doubling the number of main-line plazas, and the Puncheon Run Connector feeding additional traffic (to/from US 13/south) through the Dover plaza. For the six-year period from FY 2004-2010 following the completion of the final section of SR-1, average traffic growth has increased at a compounded rate of 2.3 percent per year. This includes the significant downturn in FY 2008 resulting from increased fuel costs and the initial impacts of the recession. The transactions and revenue by fiscal year from 2000 to the present are summarized in **Table 2.3** and shown graphically in **Figure 2.1**.

**Table 2.3: SR 1 Toll Road Traffic and Revenue, FY 2000 – 2016**

Fiscal Year	Annual Transactions <sup>(1)</sup>		Toll Revenue <sup>(1)</sup>		
	Volume (000)	Percent Change	Amount (000)	Percent Change	Average per Vehicle
2000 <sup>(2)</sup>	16,444	-	\$ 16,587	-	\$ 1.009
2001 <sup>(3)</sup>	23,408	42.3%	\$ 22,704	36.9%	\$ 0.970
2002	26,742	14.2%	\$ 25,398	11.9%	\$ 0.950
2003 <sup>(4)</sup>	28,650	7.1%	\$ 26,666	5.0%	\$ 0.931
2004	32,269	12.6%	\$ 29,088	9.1%	\$ 0.901
2005	35,304	9.4%	\$ 30,656	5.4%	\$ 0.868
2006	37,347	5.8%	\$ 32,253	5.2%	\$ 0.864
2007	39,206	5.0%	\$ 33,295	3.2%	\$ 0.849
2008 <sup>(5)</sup>	37,548	-4.2%	\$ 42,361	27.2%	\$ 1.128
2009	36,220	-3.5%	\$ 45,889	8.3%	\$ 1.267
2010	37,082	2.4%	\$ 46,796	2.0%	\$ 1.262
2011	37,670	1.6%	\$ 46,755	-0.1%	\$ 1.241
2012	37,625	-0.1%	\$ 45,757	-2.1%	\$ 1.216
2013	38,284	1.8%	\$ 47,089	2.9%	\$ 1.230
2014	39,072	2.1%	\$ 48,338	2.7%	\$ 1.237
2015 <sup>(6)</sup>	39,745	1.7%	\$ 56,868	17.6%	\$ 1.431
2016	42,332	6.5%	\$ 60,811	6.9%	\$ 1.437

Notes: (1) Mainline and ramp plazas combined

(2) Canal-Odesa section (included Biddles plaza) opened November 1999

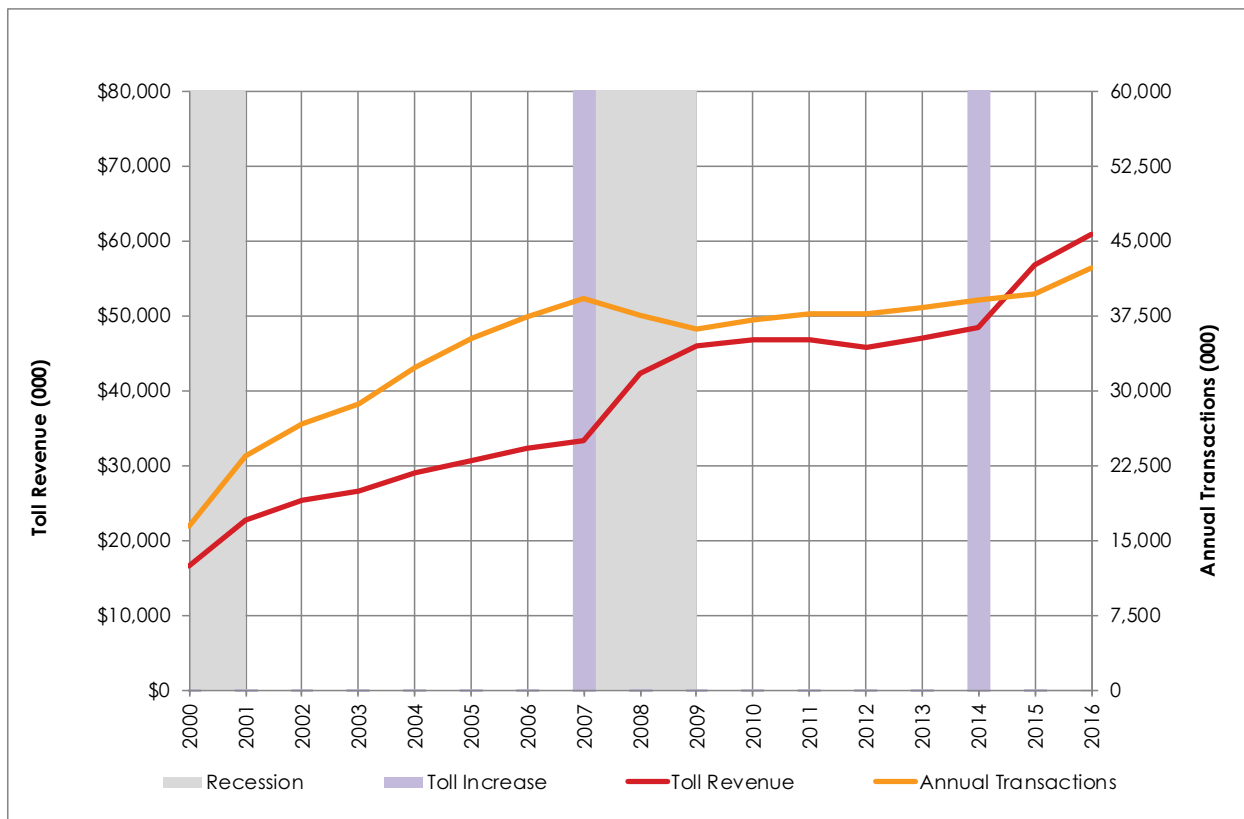
(3) Puncheon Run Connector opened December 2000

(4) Odesa-Smyrna section opened May 2003

(5) Reflects impact of October 1, 2007 toll increase

(6) Reflects impact of August 1, 2014 weekend toll increase

**Figure 2.1: SR 1 Toll Road Traffic and Toll Revenue, FY 2000 – 2016**



Following the immediate impact from the Great Recession, in the period from 2010 through 2016, traffic growth has been 2.2 percent compounded annually. While traffic growth was stable from FY 2014 to FY 2015 with a transaction increase of 1.7 percent, revenue increased tremendously – 17.6 percent – due to the weekend toll increase. Both traffic and revenue trends showed an increase in FY 2016, with a 6.5 percent increase in transactions and a 6.9 percent increase in revenue. This is similar to the trend exhibited on I-95, concurrent with national growth in vehicle miles traveled and low gas prices as shown in **Figure 1.6**.

The average revenue per vehicle (i.e., the average toll) increased by 16 percent from \$1.237 in FY 2014 to \$1.431 in FY 2015 in response to the August 2014 weekend toll increase. Unlike the 2007 toll increase, transactions did not decrease immediately following the increased toll price.

For the FY 2009-2010 period, transaction and revenue growth was significant as seasonal traffic that occurs primarily on the weekend periods (which are subject to the weekend surcharge) was recovering from the reductions experienced when fuel prices escalated significantly in FY 2008. For FY 2011, weather conditions during the first eight months were the major factor influencing traffic and revenue performance. With the exception of January, good weather resulted in traffic increases in every month. Traffic decreased 2.2 percent in January due to heavy snow, in February, traffic increased by 29 percent in comparison to the previous year



when weather was particularly poor. For the March through June period, traffic decreased due to the increase in fuel prices and poor performance of the regional economy.

In FY 2013 passenger car traffic decreased due to Superstorm Sandy in October, 2012 when the entire length of SR 1 Toll Road (Dover, Denneys, Smyrna, Biddles and Boyds) was closed from noon on Sunday, October 28<sup>th</sup> through 3:00 pm Tuesday, October 30<sup>th</sup>. Total traffic decreased in February when compared to the previous year due to the leap year day in February, 2012. Growth in truck traffic was particularly strong, increasing 8.0 percent when compared to FY 2012 as a result of economic recovery.

Using the monthly data provided for FY 2014, FY 2015 and FY 2016, a comparison was performed of transactions by vehicle type to determine if the current data provide an indication that the overall travel has stabilized. The comparison for SR 1 Toll Road is provided in **Table 2.4** and **Table 2.5**. The year-over-year comparison of monthly data indicates that traffic on SR 1 Toll Road has shown steady growth in FY 2015 with an overall increase of 1.6 percent in autos and 3.6 percent in commercial vehicles. Strong growth occurred in FY 2016, with auto traffic increasing 6.6 percent and truck traffic increasing 4.7 percent, likely due to reduced fuel cost.

**Table 2.4: SR 1 Toll Road Passenger Transactions, FY 2014 - FY 2016**

Month	Passenger Cars					
	FY 2014	FY 13-14 change	FY 2015	FY 14-15 change	FY 2016	FY 15-16 change
July	3,839,563	1.4%	3,961,329	3.2%	4,129,966	4.3%
August	4,047,493	3.3%	4,052,113	0.1%	4,178,164	3.1%
September	3,225,387	3.8%	3,184,933	-1.3%	3,377,638	6.1%
October	2,969,927	9.7%	2,980,414	0.4%	3,191,888	7.1%
November	2,754,414	1.6%	2,676,314	-2.8%	2,942,921	10.0%
December	2,661,176	1.8%	2,740,183	3.0%	2,981,079	8.8%
January	2,272,349	-5.5%	2,391,949	5.3%	2,516,059	5.2%
February	2,180,948	-3.3%	2,245,063	2.9%	2,607,715	16.2%
March	2,616,314	-4.0%	2,678,309	2.4%	3,073,743	14.8%
April	2,956,593	4.1%	2,996,314	1.3%	3,104,660	3.6%
May	3,358,875	3.6%	3,519,169	4.8%	3,540,391	0.6%
June	3,562,878	3.2%	3,598,548	1.0%	3,838,954	6.7%
Total Year	36,445,917	1.9%	37,024,638	1.6%	39,483,178	6.6%

**Table 2.5: SR 1 Toll Road Commercial Vehicle Transactions, FY 2014 - FY 2016**

Month	Commercial Vehicles					
	FY 2014	FY 13-14 change	FY 2015	FY 14-15 change	FY 2016	FY 15-16 change
July	256,174	8.4%	270,564	5.6%	271,986	0.5%
August	261,522	4.4%	264,470	1.1%	269,428	1.9%
September	243,187	12.2%	248,103	2.0%	250,895	1.1%
October	229,447	11.3%	234,967	2.4%	248,630	5.8%
November	202,359	-1.1%	197,085	-2.6%	216,577	9.9%
December	181,681	5.8%	200,916	10.6%	211,138	5.1%
January	171,269	-4.1%	182,024	6.3%	189,127	3.9%
February	164,344	0.0%	171,725	4.5%	191,416	11.5%
March	196,945	2.9%	207,559	5.4%	235,913	13.7%
April	227,217	3.2%	233,766	2.9%	237,262	1.5%
May	244,815	-1.5%	255,685	4.4%	254,665	-0.4%
June	246,769	6.9%	253,001	2.5%	271,423	7.3%
Total Year	2,625,729	4.2%	2,719,865	3.6%	2,848,460	4.7%

## 2.4 TRAFFIC CHARACTERISTICS

Traffic on the SR 1 Toll Road is characterized by method of toll payment (cash, E-ZPass), traffic through the mainline and ramp toll plazas, type of vehicle (auto, truck), monthly traffic patterns and traffic corridor market share.

### 2.4.1 Toll Payment Method

With the introduction of E-ZPass on SR 1 Toll Road in April 1999, the E-ZPass market share increased from 19 percent in FY 2000 to 72.7 percent of the transactions in FY 2016. E-ZPass accounted for 71 percent of SR 1 Toll Road revenue in FY 2016. **Table 2.6** lists the cash versus E-ZPass results for FY 2016.

**Table 2.6: SR 1 Toll Road Cash vs. E-ZPass Results, FY 2016**

Payment Method	Annual Transactions		Toll Revenue		Average Toll
	Volume (000)	Percent of Total	Amount (000)	Percent of Total	
Cash	11,564	27.3%	\$17,636	29.0%	\$ 1.525
E-ZPass	30,767	72.7%	\$43,175	71.0%	\$ 1.403
<b>Total</b>	<b>42,332</b>	<b>100.0%</b>	<b>\$60,811</b>	<b>100.0%</b>	<b>\$ 1.437</b>

## 2.4.2 Mainline and Ramp Toll Plaza Transactions

While **Table 2.6** disaggregates the traffic and revenue results for FY 2016 by payment type (cash and E-ZPass), **Table 2.7** disaggregates the FY 2016 results by the mainline and ramp toll plazas.

**Table 2.7: SR 1 Toll Road Transactions and Revenue by Toll Plaza, FY 2016**

Toll Plaza	Annual Transactions		Toll Revenue		Average Toll per Vehicle
	Volume	Percent of Total	Amount	Percent of Total	
<b>Mainline</b>					
Dover	12,844,200	36.9%	\$ 22,730,500	41.4%	\$ 1.77
Biddles	13,823,100	39.7%	\$ 29,545,800	53.9%	\$ 2.14
<b>Subtotal</b>	<b>26,667,300</b>	<b>76.5%</b>	<b>\$ 52,276,300</b>	<b>95.3%</b>	<b>\$ 1.96</b>
<b>Ramps</b>					
Denneys	4,202,100	12.1%	\$ 1,528,300	2.8%	\$ 0.36
Smyrna	2,104,100	6.0%	\$ 277,500	0.5%	\$ 0.13
Boys	1,872,200	5.4%	\$ 759,500	1.4%	\$ 0.41
<b>Subtotal</b>	<b>8,178,400</b>	<b>23.5%</b>	<b>\$ 2,565,400</b>	<b>4.7%</b>	<b>\$ 0.31</b>
<b>TOTAL</b>	<b>34,845,700</b>	<b>100.0%</b>	<b>\$ 54,841,700</b>	<b>100.0%</b>	<b>\$ 1.57</b>

The FY 2016 results indicate that the two main-line plazas handle, by far, most of the traffic (76.5 percent of the traffic, 95.3 percent of the revenue). Biddles plaza is the busier of the two mainline plazas. A significant amount of Dover-Wilmington traffic bypasses the Dover mainline plaza by using the Denneys Road ramps located two miles to the north.

## 2.4.3 Vehicle Types

Passenger cars are the major type of traffic on the SR 1 Toll Road, as shown in **Table 2.8**. In FY 2016, passenger cars were 93.3 percent of the traffic and 86.3 percent of the revenue. Although commercial vehicles were only 6.7 percent of the traffic, they accounted for 13.7 percent of the toll revenue due to the higher toll rates.

**Table 2.8: SR 1 Toll Road Transactions and Revenue by Vehicle Class, FY 2016**

Vehicle Class	Transactions		Average Toll	Toll Revenue	
	Volume (000)	Percent of Total		Amount (000)	Percent of Total
Passenger Cars	39,483	93.3%	\$ 1.329	\$ 52,475	86.3%
Commercial Vehicles	2,848	6.7%	\$ 2.927	\$ 8,336	13.7%
<b>Total</b>	<b>42,332</b>	<b>100.0%</b>	<b>\$ 1.437</b>	<b>\$ 60,811</b>	<b>100.0%</b>

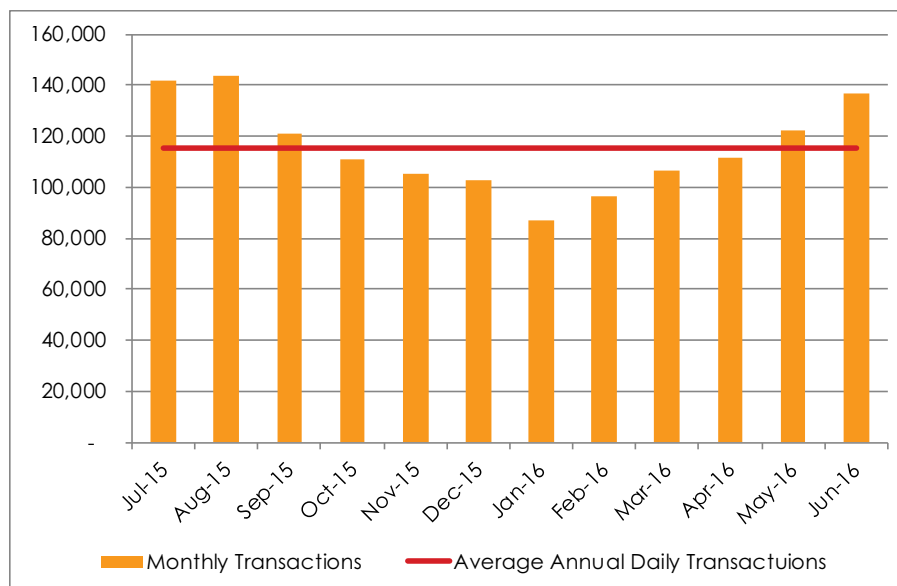
## 2.4.4 Monthly Traffic Patterns

The monthly traffic variations, in aggregate, along SR 1 Toll Road are listed in **Table 2.9** and shown graphically in **Figure 2.2**. The average daily toll transactions ranged from a low of 24.6 percent below the annual average in January to a high of 24 percent above the average in August, reflecting the peak of seasonal recreation travel on the SR 1 Toll Road in FY 2016. April was the closest month to the annual average. The variability also accounts for the fact that US 13 is congested during the summer months, resulting in a shift to the SR 1 Toll Road, but not observed (except for commuting hours) during the remainder of the year.

**Table 2.9: SR 1 Toll Road Monthly Traffic, FY 2016**

Month	Monthly Transactions		Average Daily Transactions	
	Volume (000)	Percent of Year	Volume	Percent difference to AADT
Jul-15	4,401,950	10.4%	142,000	1.23
Aug-15	4,447,590	10.5%	143,470	1.24
Sep-15	3,628,530	8.6%	120,950	1.05
Oct-15	3,440,520	8.1%	110,980	0.96
Nov-15	3,159,500	7.5%	105,320	0.91
Dec-15	3,192,220	7.5%	102,970	0.89
Jan-16	2,705,190	6.4%	87,260	0.75
Feb-16	2,799,130	6.6%	96,520	0.83
Mar-16	3,309,660	7.8%	106,760	0.92
Apr-16	3,341,920	7.9%	111,400	0.96
May-16	3,795,060	9.0%	122,420	1.06
Jun-16	4,110,380	9.7%	137,010	1.18
<b>Total</b>	<b>42,331,650</b>	<b>100.0%</b>	<b>115,660</b>	<b>1.00</b>

**Figure 2.2 SR 1 Toll Road Monthly Traffic Variations, FY 2016**



## 2.4.5 Corridor Market Share

A comparison of SR 1 Toll Road and US 13 traffic gives an indication of the toll roads market share in Delaware's north-south corridor. The 2015 Average Annual Daily Traffic (AADT) on US 13 at the entrance to Dover Downs, which forms a screenline with SR 1 at the Dover toll plaza, was 49,392 vehicles. The AADT on SR 1 at this screenline was 39,984 vehicles in 2015; 45 percent of the screenline market share between the two roadways. SR 1 traffic has increased eight percent from 37 percent of the screenline total in 2012. Recognizing that a large portion of the US 13 traffic in Dover is comprised of purely local trips, the 45 percent share is substantial; and the percentage could be expected to continue increasing in the future due to capacity limitations on US 13, although future planned construction aims to improve operational conditions on US 13 from the Maryland line to SR 10.

## 2.5 FACTORS AFFECTING SR 1 TRAFFIC GROWTH

In preparing the forecasts of traffic for the SR 1 Toll Road, the factors that were considered include population growth in the State of Delaware, improvements to the highway network in the region served by the toll road and the price and availability of fuel. The following discussion addresses the impacts of population growth and highway projects on traffic, the impacts of fuel conditions are the same as those discussed in the section 1.4 of this report on the I-95/Delaware Turnpike.

### 2.5.1 Delaware Population

Unlike the Delaware Turnpike, which carries (through the Newark toll plaza) mostly interstate traffic in the Northeast Corridor, SR 1 serves mostly Delaware traffic and those motorists bound for the Delaware-Maryland shore in the summer. Accordingly, it is the projected population of Delaware that will sustain the future levels of SR 1 traffic. **Table 2.10** lists the historical and projected population of Delaware's three counties. For the period 2010 – 2020, the average annual rate of growth for the State is 1.0 percent. For the period 2020 – 2040, the average annual rate of growth is 0.45 percent.

**Table 2.10: Delaware Population Growth**

Year	County Population (000)				Average Annual Growth Rate
	New Castle	Kent	Sussex	Total	
1980	398	98	98	594	-
1990	442	110	113	665	1.1%
2000	502	127	157	786	1.7%
2005	520	142	176	838	1.3%
2010	539	163	198	900	1.4%
2015	556	174	214	944	1.0%
2020	572	183	228	982	0.8%
2025	586	190	239	1,015	0.7%
2030	596	197	247	1,041	0.7%
2035	603	203	254	1,060	0.5%
2040	607	209	259	1,075	0.4%

Source: US Census and Delaware Population Consortium

As with the I-95/Delaware Turnpike, the population forecast and observed growth rates in transactions since the completion of SR 1 Toll Road were used as guidance for estimating future growth in transactions and revenue. These estimates are summarized in the following section of this report.

## 2.5.2 Highway Network Improvements

Construction of a new multiple-lane interchange at the SR 1/I-95 interchange will reduce traffic congestion and weaving near the Christiana Mall. The project will add high speed connecting ramps between SR 1 and I-95 in both directions. The completion of a northbound auxiliary lane on SR 1 between US 40 and SR 273 addresses operational and safety issues, thus increasing capacity and reducing congestion.

The previously mentioned US 301 extension from the MD/DE state line to SR 1 south of the C&D Canal will have negligible impact on SR 1 traffic. SR 1 is a local road serving north-south vehicles traveling within Delaware. The US 301 extension, once completed, will serve local east-west trips as well as long distance north-south trips. Due to the different user market share, US 301 is not expected to serve as a competitor to the SR 1 Toll Road.

Delaware DOT proposes widening SR 1 between Route 273 in the vicinity of Christiana south to the Roth Bridge over the C&D Canal. The project will address existing congestion in the area, improve system connectivity and provide support for local access for existing and committed development in New Castle County. The project includes widening SR 1 by adding a travel lane in each direction, widening bridges to accommodate the additional travel lanes and reconfiguring the supporting interchanges at SR 273, US 40, US 13/Tybouts Corner and SR 72.

Funds for construction of the project are included in the Council on Transportation Approved FY 2018 – FY 2023 Capital Transportation Program, Spend Plan. After projected 2020 completion, this project should have a positive impact on the SR 1 Toll Road by providing additional capacity and improved access to the toll road.

Locally, from a network perspective, the principal toll-free routes that run parallel to SR 1 in the corridor — US 13, and several miles to the west, SR 896/71 over the C&D Canal's Summit Bridge — are an accomplished fact. While improvements are continually being made to the highway system, none are expected to have a significant impact on the established traffic patterns that use SR 1.

## 2.6 TRAFFIC AND REVENUE FORECAST, FY 2017 – 2023

On the basis of its historical performance, as well as the projected population growth trends in the corridor, and the increasing share of US 13/SR 1 corridor traffic expected to use SR 1, Stantec developed the forecast of SR 1 Toll Road traffic and revenue through 2023. The forecast is based on the continuation of the current toll schedule on SR 1 Toll Road during the forecast period, which means that the tolls become less of an impediment (i.e., more affordable) to motorists and truckers over time (due to the inflationary trends associated with personal and business incomes). The forecast is summarized in **Table 2.11** and shown in **Figure 2.3**.

**Table 2.11: SR 1 Toll Road Traffic and Revenue Forecast, FY 2017 – 2023**

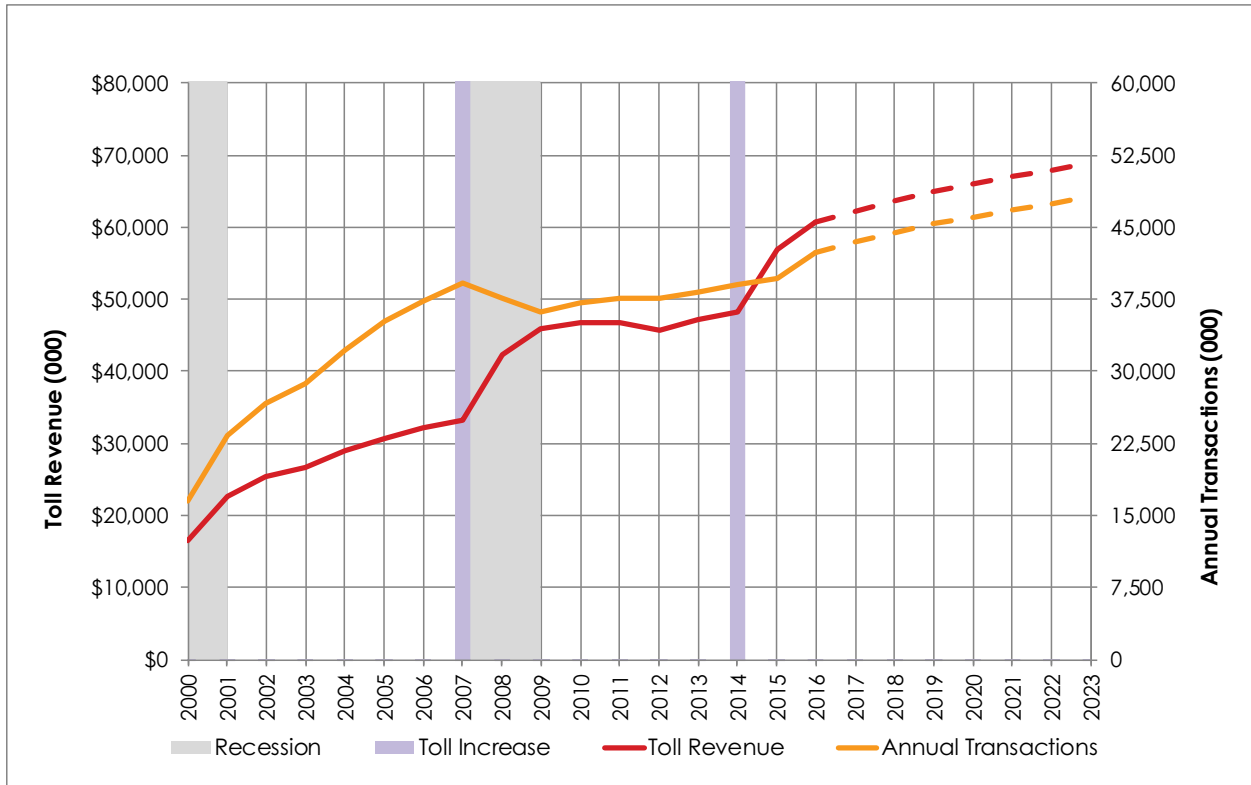
Fiscal Year	Annual Transactions		Toll Revenue	
	Volume (000)	Percent Change	Total (000)	Avg per Vehicle <sup>(1)</sup>
2014	39,072	-	\$ 48,338	\$ 1.237
2015	39,745	1.7%	\$ 56,868	\$ 1.431
2016	42,332	6.5%	\$ 60,811	\$ 1.437
2017	43,400	2.5%	\$ 62,346	\$ 1.437
2018	44,496	2.5%	\$ 63,920	\$ 1.437
2019	45,397	2.0%	\$ 65,214	\$ 1.437
2020	46,090	1.5%	\$ 66,210	\$ 1.437
2021	46,794	1.5%	\$ 67,221	\$ 1.437
2022	47,508	1.5%	\$ 68,248	\$ 1.437
2023	48,234	1.5%	\$ 69,290	\$ 1.437

Notes: <sup>(1)</sup> Rate per vehicle for FY 2017 through FY 2023 estimated to be same as rate for FY 2016

2014 – 2016: actual values received from DelDOT

2017 – 2023: Stantec estimates

**Figure 2.3: Historical and Projected SR 1 Transactions and Revenue FY 2000 – 2023**





### 3.0 COMBINED TOLL ROAD REVENUE FORECASTS

Finally, the revenue forecasts for the I-95/Delaware Turnpike and the SR 1 Toll Road were combined in this concluding section of the report. The combined forecast is shown in **Table 3.1**.

#### 3.1 SUMMARY OF ASSUMPTIONS

Following is the list of assumptions upon which the revenue forecasts for the I-95/Delaware Turnpike and SR 1 Toll Road were based:

- Continuation of the I-95/Delaware Turnpike and SR 1 Toll Road toll schedules throughout the forecast period.
- The US 13/St. Georges Bridge, which crosses the C&D canal adjacent to the SR 1 Bridge, will remain open during the forecast period, as will the SR 1 toll-free outlets at Road 412 and SR 299.
- Completion of the US 301 extension in January 2019.
- During the forecast period, no competing limited-access, toll-free facility will be constructed in the I-95/Delaware Turnpike or SR 1 corridors aside from those discussed.
- The I-95/Delaware Turnpike and SR 1 Toll Road will be effectively signed and maintained to encourage maximum usage.
- Continuation of the truck enforcement program through FY 2017.
- Land development and travel patterns will generally follow the population forecasts discussed with respect to **Table 1.11** and **Table 2.10**.
- Motor fuel will remain in adequate supply during the forecast period and no excessive increases in fuel taxes will be implemented at the state or federal level.
- No radical change in travel modes, which would drastically curtail motor vehicle use, is expected during the forecast period.
- In the long term, normal economic conditions will prevail in Delaware and the United States, and there will not be an occurrence of a major depression, national emergency or prolonged fuel shortage.
- As for the projections themselves, while they are stated year-by-year, they are intended to show the trends that may be anticipated based on the above assumptions.

### 3.2 COMBINED REVENUE FORECAST, FY 2017-2023

The revenue forecasts for the Delaware Turnpike (from **Table 1.15**) and the SR 1 Toll Road (from **Table 2.11**) were then combined in **Table 3.1**.

**Table 3.1: Combined I-95/Delaware Turnpike and SR 1 Toll Road Revenue Forecast, FY 2016 – 2023**

Fiscal Year	Revenue (000)					Percent Change
	I-95/Delaware Turnpike			SR 1 Toll Road Tolls	Combined	
	Tolls	Concession	Total			
2016*	\$ 123,431	\$ 2,440	\$ 125,871	\$ 60,811	\$ 186,682	-
2017	\$ 125,406	\$ 2,479	\$ 127,885	\$ 62,346	\$ 190,231	1.9%
2018	\$ 127,412	\$ 2,519	\$ 129,931	\$ 63,920	\$ 193,851	1.9%
2019	\$ 128,680	\$ 2,544	\$ 131,224	\$ 65,214	\$ 196,438	1.3%
2020	\$ 129,597	\$ 2,562	\$ 132,159	\$ 66,210	\$ 198,370	1.0%
2021	\$ 130,521	\$ 2,580	\$ 133,102	\$ 67,221	\$ 200,323	1.0%
2022	\$ 131,452	\$ 2,599	\$ 134,051	\$ 68,248	\$ 202,298	1.0%
2023	\$ 132,389	\$ 2,617	\$ 135,007	\$ 69,290	\$ 204,295	1.0%

\*Actual

While the projections in this Report are stated year-by-year, they are intended to show the trends that may reasonably be anticipated on the basis of the assumptions listed herein. It is our opinion that the revenue projections are reasonable and that they have been prepared in accordance with accepted practice for investment-grade studies. However, given the uncertainties within the current international and economic climate, Stantec and DelDOT have agreed that:

- The revenue forecast in **Table 3.1** present the results of our consideration of the data available to us as of the date hereof and the application of our experience and professional judgment to that information. It is not a guarantee of future events or trends.
- The traffic and revenue forecasts will be subject to future economic and demographic trends in Delaware and the Northeast Corridor that cannot be predicted with certainty.
- The projections contained in this Report, while presented with numerical specificity, are based on a number of estimates and assumptions that, though considered reasonable to us, are inherently subject to significant economic and competitive uncertainties and contingencies, many of which will be beyond our control. In many instances, a broad range of alternative assumptions could be considered reasonable. Changes in the assumptions used could result in material differences in projected outcomes.
- If, for any reason, any of these conditions should change due to changes in the economy or competitive environment, or other factors, Stantec's opinions or estimates may require amendment or further adjustments.

The report contains forward-looking statements, revenue projections, and statements of opinion based upon certain information. These forward-looking and opinions statements and projections include statements relating to preexisting conditions not caused or created by Stantec and external conditions beyond our control. We believe that our expectations are reasonable and are based on reasonable assumptions. However, such forward-looking statements, projections and opinions, by their nature involve risks and uncertainties beyond our control. We caution that a variety of factors could cause the actual revenue associated with the I-95/Delaware Turnpike and SR 1 Toll Road to differ from that expressed or implied in this document. We assume no obligation with respect to the differences between this document and the actual performance of the two toll facilities. This document was prepared solely for the use of DeIDOT that commissioned it and the Delaware Transportation Authority. It may only be relied upon by third parties at their own risk. Under no circumstance Stantec be liable to third parties for claims or damage arising out of this document. Any unauthorized use of this document is at the user's sole risk.

We acknowledge with thanks the cooperation of the DeIDOT staff during the course of this study.

Respectfully,

STANTEC CONSULTING SERVICES INC.

A handwritten signature in dark ink, appearing to read 'D. Schellinger', with a long, sweeping horizontal stroke extending to the right.

David Schellinger, PE  
Principal

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