

Tolling at Francis Scott Key Bridge (I-695) Facility
(2023 JCR, p. 85)

A Report to the Maryland General Assembly
Senate Budget and Taxation Committee
and
House Appropriations Committee

December 2023

Maryland Department of Transportation
Maryland Transportation Authority

The Maryland Transportation Authority (MDTA) submits the following report in response to budget bill language contained on page 85 of the 2023 Joint Chairmen’s Report (JCR). The language states:

It is the intent of the committees to ensure that all travelers are being assessed the appropriate tolls based on vehicle classifications and entry and exit points at Maryland Transportation Authority (MDTA) facilities across the State. Given concern regarding travelers accessing the Port of Baltimore for business purposes, the agency should provide a report examining the issue of travelers accessing the Port of Baltimore via I-695 without crossing the Key Bridge to determine if tolls currently being assessed are appropriate. The report should include a map of the entire Key Bridge facility and all entry and exit points, including toll rates for each route.

The MDTA reassessed the toll rates at the Francis Scott Key (FSK) Facility when preparing this report. Absent the option to implement trip construction (e.g., the Intercounty Connector), all travelers are being assessed the appropriate tolls based on vehicle classifications and entry and exit points. Being mindful of local businesses and Maryland customers, the MDTA has implemented several reduced toll rates and discount programs.

Background – Tolling Authority

In 1971, the General Assembly established the MDTA to finance, construct, operate, and improve the State’s toll facilities. The Francis Scott Key Bridge (I-695) toll facility - commonly referred to as the Key Bridge - is a statutorily defined transportation facility project, and the MDTA retains the sole legal authority to fix, revise, charge, and collect tolls and other charges and revenues for the State’s tolling facilities.

The MDTA is a self-sufficient, non-budgeted State agency and generally receives no money from the State’s General Fund or the Transportation Trust Fund. The MDTA is financed by toll revenues and such revenues are reinvested in the operation and maintenance of the toll facilities. The MDTA’s Trust Agreement, between the MDTA and its Trustee, is for the benefit of bondholders and outlines how these funds may be used.

MDTA’s Closed and Open Tolling System

Nearly two-thirds of toll roadway facilities in the United States are closed systems and allow for no free movement on the toll facility and the remainder are open systems. An open system with very little free movements is generally a long-distance toll roadway with only one or two free movements (when a vehicle travels on a toll facility without being charged a toll) spanning between minor, relatively less traveled interchanges, representing 12 percent of total toll systems.

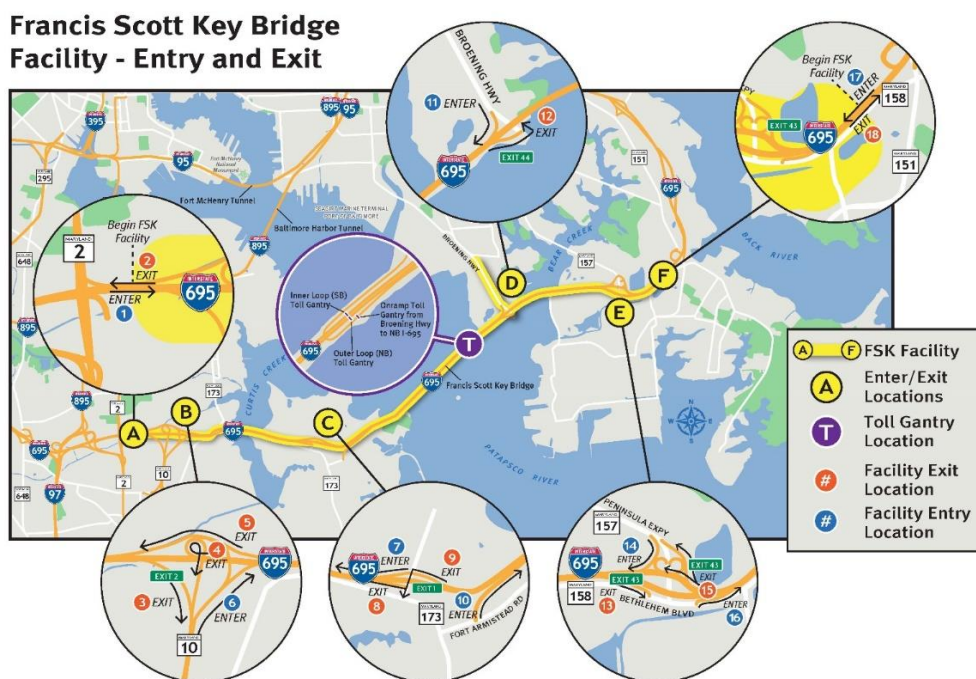
The MDTA operates both open and closed toll roadway facilities. Free movements are seen as a credit negative by rating agencies; therefore, the amount of free movement facilities across the country are limited by tolling agencies whenever feasible.

MDTA Toll Roadway Facilities	Closed	Open with Very Limited Free Movement	Open with Some Free Movement
Key Bridge		•	
Fort McHenry Tunnel			•
Baltimore Harbor Tunnel		•	
Intercounty Connector (ICC)	•		
John F. Kennedy (JFK) Memorial Highway			•

The MDTA has toll roadway facilities with some free movement controlled by federal tolling agreements established when those toll facilities were constructed. The MDTA has managed the credit negative perspective of open systems by not expanding the portion of free movement toll facilities. Tolling the Bear Creek/Broening Highway only movement is an example of consistently tolling sections of the roadway that have been tolled from initial construction. The placement of the new toll gantries at the FSK facility were installed to allow a consistent tolling practice and to meet bondholder expectations with the transition to All-Electronic Tolling.

Francis Scott Key Bridge (FSK) Facility

The FSK facility opened in 1977 and is 10.9 miles in length, consisting of 40 lane miles. The facility spans from I-695 (Baltimore Beltway) Exit 2 (mile marker 1.4) in Glen Burnie in Anne Arundel County to I-695 Exit 42 (mile marker 43.7) in Edgemere in Baltimore County. The facility also includes one mile of Broening Highway from the Exit 44 ramp to Maryland Avenue/Avon Beach Road intersection in Dundalk in Baltimore County. The facility extends over three separate bodies of water: Bear Creek, Patapsco River, and Curtis Creek. The image below depicts the FSK facility and all entry and exit points.



Motorists can enter the facility at the following entry points:

Northbound (NB)

- Point 1: I-695, North of Route 10 – Exit 2
- Point 6: Exit 2: Route 10
- Point 10: Exit 1: MD 173
- Point 11: Exit 44: Broening Highway
- Point 16: Exit 43: Bethlehem Boulevard/Peninsula Expressway

Southbound (SB)

- Point 17: I-695: North of Route 151 - Exit 42
- Point 14: Exit 43: Bethlehem Boulevard/Peninsula Expressway
- Point 11: Exit 44: Broening Highway
- Point 7: Exit 1: MD 173

Tolling Locations

The FSK facility includes three tolling locations, as indicated on the above map. These locations include I-695 Northbound (NB) and I-695 Southbound (SB), north of the Key Bridge, and Broening Highway/Service Road adjacent I-695. Since the opening of the FSK facility in 1977, tolls have been collected for all vehicles traversing these midpoint locations. The conversion to All-Electronic Tolling did not change the vehicle movements that are tolled.

The following vehicle movements are charged when traversing Bear Creek, Patapsco River, Curtis Creek, or a combination of these facilities.

I-695 vehicles NB that entered the highway:

- Prior to Exit 2 – Route 10;
- Exit 2 – Route 10;
- Exit 1 – MD 173; or
- Exit 44 – Broening Highway.

I-695 vehicles SB that entered the highway:

- Prior to Exit 42 – Route 151;
- Exit 42 – Route 151;
- Exit 43 – Bethlehem Boulevard/Peninsula Expressway; or
- Exit 44 – Broening Highway.

Certain vehicle movements that traverse the FSK Facility do not incur a toll (and have never incurred a toll). In the NB direction these vehicle movements include vehicles entering I-695 via Exits 43 – Bethlehem Boulevard/Peninsula Expressway and vehicles exiting I-695 via Exit 2 – Route 10 and Exit 1 – MD 173. In the SB direction these vehicle movements include vehicles entering I-695 via Exits 1 – MD 173 and Exit 2 – Route 10 and vehicles exiting I-695 via Exit 43 Bethlehem Boulevard.

Toll Payment Methods and Rates

Customers have the option to pay their tolls via three payment methods. These methods include *E-ZPass*[®], Pay-by-Plate, and Video Tolls. Additional information regarding these payment methods can be found at driveEZMD.com. Additional discounts and reduced toll rates are offered to Maryland *E-ZPass* customers.

The FSK Facility toll rates on I-695 (Tolling Locations A and B) are as follows:

Vehicle Classification	Commuter Plan	Maryland <i>E-ZPass</i>	Non-Maryland <i>E-ZPass</i> and Pay-By-Plate	Video Toll Rates
2-axle	\$1.40	\$3.00	\$4.00	\$6.00
3-axle	N/A	\$8.00	\$8.00	\$12.00
4-axle	N/A	\$12.00	\$12.00	\$18.00
5-axle	N/A	\$24.00	\$24.00	\$36.00
6-axle+	N/A	\$30.00	\$30.00	\$45.00

The FSK toll rates at Broening Highway/Service Road (Tolling Location C) are reduced as follows for Maryland *E-ZPass* customers.

Vehicle Classification	Maryland <i>E-ZPass</i>	Savings
3-axle	\$6.00	\$2.00 or 25%
4-axle	\$8.00	\$4.00 or 33%
5-axle	\$10.00	\$14.00 or 58%
6-axle+	\$12.00	\$18.00 or 60%

In January 2016, the MDTA, in collaboration with the Maryland Motor Truck Association, implemented a toll rate discount for trucks with three or more axles when crossing Bear Creek and using Broening Highway without crossing the Key Bridge. The discounted truck toll rates equate to \$2.00 per axle, a discount of 25 percent to 60 percent from I-695 rates (Locations A and B) rate when crossing the Key Bridge¹.

For the period of July 1, 2022 to June 30, 2023, vehicles with three or more axles paid tolls totaling roughly \$965,000.

Payment Method	Annual trips	Annual Tolls
<i>E-ZPass</i> (Maryland Account)	15,600	\$ 151,000
<i>E-ZPass</i> (Non-Maryland)	31,000	518,000
Video Toll	9,500	296,000
Total	56,100	\$ 965,000

¹ The \$2.00 per axle discount is also offered at the Baltimore Harbor Tunnel (BHT) Childs Street, in which vehicles travel on BHT without going through the tunnel.

Maryland *E-ZPass* customers traversed the Bear Creek bridge and Broening Highway without crossing the Key Bridge 15,600 times and incurred tolls totaling \$151,000, resulting in a 56 percent discount totaling \$195,000 –a direct benefit to many local trucks that frequent the Port of Baltimore and Tradepoint Atlantic.

Maryland *E-ZPass* five or more axle customers are also eligible to receive additional savings through the post-usage and supplemental rebate programs. The post-usage rebate is an account-based discount calculated on the dollar amount of tolls paid on a business account per month. There is no limit on the number of transponders that can be assigned to this program. The supplemental rebate is a transponder-based discount calculated on the number of times a vehicle traverses a MDTA facility in a month . These rebate program discounts are not mutually exclusive².

<u>Post Usage Rebate</u>		<u>Supplemental Rebate</u>	
Rebate	Monthly Tolls	Rebate	Monthly Trips
10%	\$150.00 to \$1,999.99	10%	60 to 79
15%	\$2,000.00 to \$7,499.99	15%	80 to 99
20%	\$7,500 or more	20%	100 or more

Trip Construction Option

An alternative to the current tolling structure along the FSK facility is to implement trip construction (*e.g.*, the Intercounty Connector). As shown in the exhibit below, the estimated toll would range from \$1.00 for customers that only cross the Bear Creek facility to \$4.00 for customers that cross the Bear Creek, Key Bridge, and Curtis Creek facilities. Under this scenario, of the approximately 307,000 customers that use the FSK facility annually, it is estimated that 27 percent of customers would experience a toll increase, 28 percent of customers would experience a toll decrease, 40 percent of customers would experience no change from the current toll rate, and 5 percent would choose not to travel the facility.

Facility	Proposed Toll	Annual Customers
Bear Creek Only	\$1.00	1,900
Key Bridge Only	\$1.70	7,900
Curtis Creek Only	\$1.30	81,000
Bear + Curtis	\$2.70	47,000
Key + Curtis	\$3.00	29,400
Through Trip	\$4.00	123,800

² Intercounty Connector (ICC - MD 200) and I-95 Express Toll Lanes (ETL) are congestion priced facilities and as such are not eligible for program discounts.

Customer Concerns When Accessing the Port of Baltimore and Broening Highway

The primary concern conveyed by customers is the belief that a toll should not be charged when a customer does not traverse the Key Bridge (Patapsco River). One option to address this concern is continued education about the footprint of the entire FSK facility, trust agreement obligations, costs to maintain the facility, and discount programs available.

FSK Footprint

To expand on the information regarding the entire FSK Facility presented above, the MDTA is responsible for the entire 10.9-mile facility, which includes 22 bridges in addition to the Key Bridge, 7 small structures, 167 ancillary structures, and 40 lane miles of highway (including 1.5 lane miles of Broening Highway), all of which must be maintained exclusively by toll dollars.

Trust Agreement

The MDTA's Trust Agreement with its bondholders requires the MDTA collect a toll for the use of its bridges, causeways, approaches, entrance plazas, interchanges, service facilities, and toll stations, all of which are defined as part of the Transportation Facilities Project under Section 4-101(h)(1) of the Transportation Article. If the MDTA does not collect tolls, it is depriving bondholders of a property interest in those revenues that were previously collected.

Costs

Over the past five years, approximately \$38 million has been spent on maintenance, repair, and inspection of the northern section of the Key Bridge facility. Within the next few years, major projects totaling between \$60 million and \$70 million are required to maintain the northern section in a state of good repair. On October 26, 2023, the MDTA Board approved a \$33.2 million contract for the I-695 Repairs and Rehabilitation project at Sparrows Point near Bear Creek in Baltimore County. Expected to begin major construction early in 2024, this system preservation project is necessary to address significant settlement of I-695 that has occurred since it was widened to a multi-lane, median-divided highway in the 1990s. Additional work will be completed to rehabilitate and enhance the safety of I-695 in this area. This project is in addition to the expenditures for maintenance, repair, and inspections of the northern section of the FSK facility.

Reduced Toll Options and Discount Programs

In an effort to reduce ITOLS, or image tolls, (tolling based upon the axle count of a vehicle and license plate match to an *E-ZPass* account), the MDTA's *E-ZPass* Operations often engage with businesses with large fleets to educate them on ITOLS and the benefits of having a Maryland *E-ZPass*. This is important to help travelers receive the best toll rates from their *E-ZPass* account, as ITOLS do not receive the discount. In 2019, the MDTA distributed informational flyers about the commercial vehicle discount program to those using the Broening Highway turnaround. Additionally, MDTA's *E-ZPass* Customer Service Division is staffed with experienced Customer Service Representatives who are available to work with both individual commercial vehicle drivers and commercial vehicle companies to educate them on how the FSK Commercial Vehicle Turnaround discount works with an *E-ZPass* Maryland account.

Educational efforts also include the impact trucks have on transportation infrastructure compared to passenger vehicles. Truck traffic is a major contributor to the cost of maintaining the MDTA's bridges, structures, and highway lane miles. According to the U.S. Government Accountability Office, a five-axle tractor-trailer loaded to 80,000 lbs., which is the federal limit, has the same impact on an interstate highway as 9,600 automobiles. As truck axle weights increase, pavement damage increases at an even faster rate. For example, while a truck axle carrying 18,000 lbs. is only 9 times heavier than a 2,000-pound automobile axle, it does 5,000 times more damage.

Federal Grant to Study an Interchange at I-695 and Exit 44 (Broening Highway)

The MDTA has been supportive of local efforts to study the feasibility of an interchange at I-695 and Exit 44 (Broening Highway). In 2022, Baltimore County was awarded a \$1 million federal earmark to study a full interchange at I-695 and Exit 44 (Broening Highway). These federal funds are to support launching the initial planning of a full interchange at I-695 and Exit 44.

In requesting the earmark, Baltimore County said it would partner with the State Highway Administration to complete the planning stage, which will identify additional state and federal project income sources. MDTA participated in Baltimore County's kick off meeting on February 23, 2023, and will provide data for the study when needed and requested by either Baltimore County or the State Highway Administration.

Conclusion

All travelers are being assessed for the appropriate tolls based on vehicle classifications and entry and exit points. As noted in the report, the MDTA is responsible for maintaining the entire footprint of the FSK facility with toll dollars – not just the FSK Bridge. To date, several reduced toll rates and discount programs have been implemented to assist local businesses and Maryland customers. The MDTA has and will continue to support efforts to educate the local community and businesses on its trust agreement obligations, costs to maintain the facility, and discount programs available.