



Chapter 7:

Major Capital Projects





MAJOR CAPITAL PROJECTS

Anticipated Projects and Funding – FY 2024-2045

The Transportation Improvement Program consists of near-term projects with defined scopes, established schedules, and committed funding. In contrast, *Maximize2045* consists of long-term commitments to system operations and preservation, along with major capital projects that generally have only conceptual scopes, potential schedules, and anticipated funding. The TIP covers the period from FY 2020 to 2023, and *Maximize2045* covers the period from FY 2024 to 2045.



Forecasted Revenues

Chapter 6, Financial Plan, shows the revenues the BRTB and MDOT anticipate will be available for 2024-2045:

| | |
|-------------------------|-------------------------|
| System operations: | \$36.749 billion |
| System preservation: | \$16.270 billion |
| Major capital projects: | <u>\$12.162 billion</u> |
| Total revenues: | \$65.181 billion |

Candidate Projects

The local jurisdictions, in consultation with MDOT HSA and MDOT MTA, submitted 82 projects for consideration for *Maximize2045*. These included 13 transit projects and 69 roadway projects. Many of the submitted projects include in their scopes improvements to adjoining pedestrian and bicycle facilities.

Appendix B describes the specific criteria used to evaluate and rank these projects.

Preferred Alternative, FY 2024-2045

The BRTB, working with local jurisdictions and state agencies, developed a preferred alternative for the Baltimore region. This preferred alternative consists of funding allocated for operation and maintenance of the existing systems as well as major capital projects. These major capital projects were selected by applying the adopted evaluation and scoring criteria, consistent with federal laws and policies and the region's adopted transportation goals.

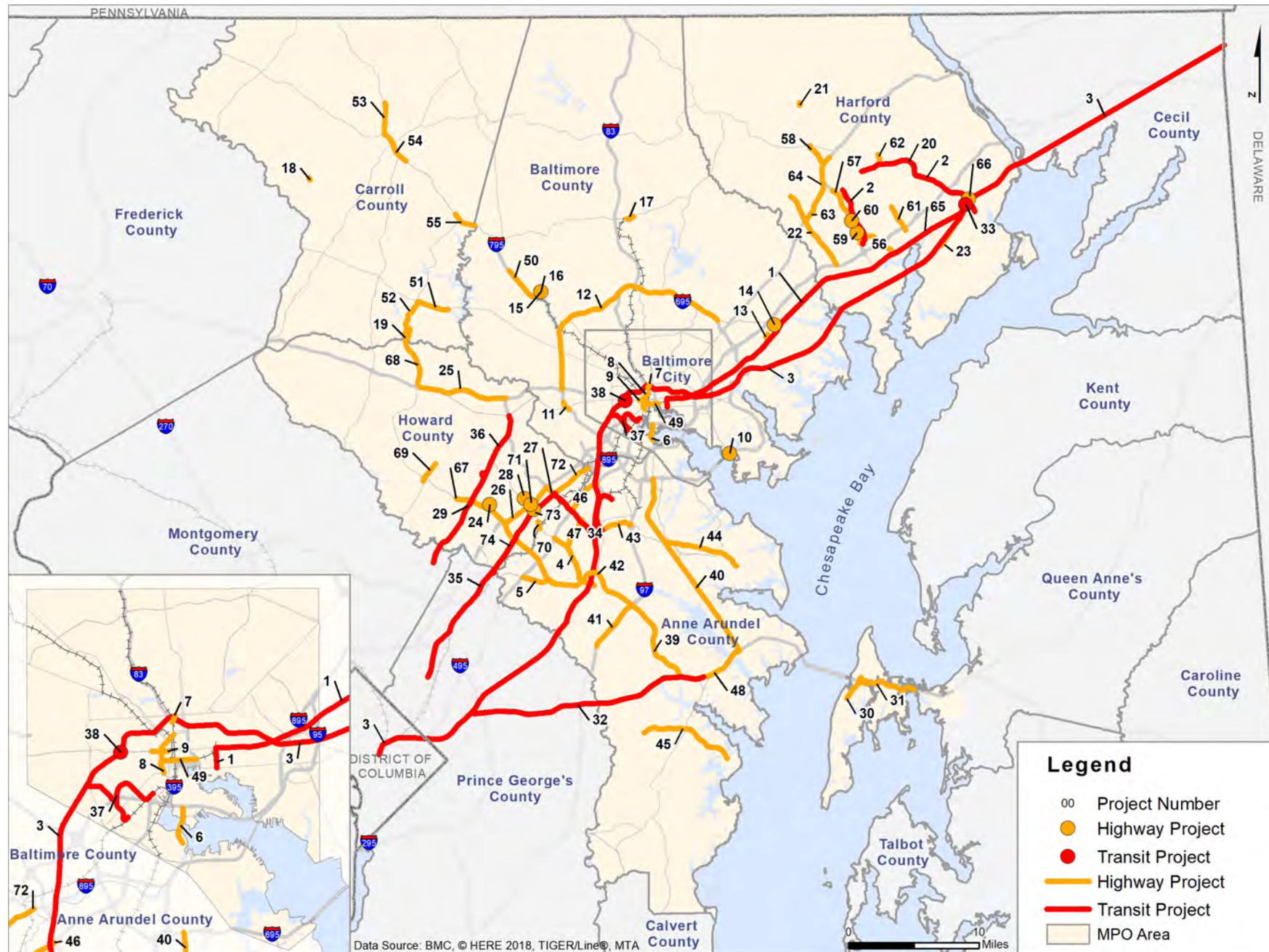
The major capital projects in the *Maximize2045* preferred alternative for the most part have only generally defined scopes. Similarly, funds to cover the design, right of way, and construction phases of these projects for the most part have not been committed yet. Such funds would come from forecasted revenues the region reasonably expects to be available for major projects throughout the life of the plan. Project sponsors may or may not be able to commit these anticipated funds to specific projects during the life of the plan. Rather, the projects included in the preferred alternative represent the best judgment of the BRTB about what is desirable and what meets the federal requirement for fiscal constraint, all the while considering existing conditions and future expectations.

Analysis of the Potential Effects of Major Capital Projects

BMC staff included these major capital projects in the master network of programmed and planned system improvements. Staff analyzed this master network to determine air quality conformity, to predict systemwide travel demand effects, and to evaluate potential effects on Environmental Justice populations. Appendix C shows the results of these analyses.



Locations of Major Capital Projects, FY 2024-2045



Preferred Alternative – Major Capital Projects, FY 2024-2045

The tables beginning on the next page show major capital projects in the time periods within which the BRTB anticipates they might be implemented. Sponsors, in coordination with MDOT SHA and MDOT MTA, provided current year cost estimates. BMC staff then applied an inflation factor, consistent with MDOT expectations, out to the expected years of operation to arrive at estimated year of expenditure (YOE) cost estimates.

Current assumptions about project scopes, future inflation rates, and future conditions could change over the next four years, by the time of the next update of the regional plan. For this reason, these cost estimates should be considered conceptual in nature, based on the best available knowledge and expectations.



| Transit Projects, FY 2024-2034 | | | | | | |
|--------------------------------|---------------------------------|---|---|--|---|----------------------|
| Map ID | Operating Agency / Jurisdiction | Name | Limits / Length | Description | Justification | Estimated Cost (YOE) |
| 1 | MDOT SHA Harford County | MTA Commuter Bus Service | Harford County to Downtown Baltimore and to Harbor East and from Baltimore to APG | Additional MTA commuter bus service from Harford County to downtown Baltimore and Harbor East. Reverse commute route from Baltimore to Aberdeen Proving Ground. Install shelters. Extend U.S. 40 commuter service to connect with Harford Transit. | Improve service and mobility for current and future riders by addressing capacity, frequency, and reliability | \$2,000,000 |
| 2 | MDOT SHA Harford County | Transit Signal Priority | MD 22 corridor from Harford Mall to Aberdeen train station – 13 miles MD 924 corridor from MacPhail Road to Woodsdale Road – 4 miles | Construct queue jump lanes along MD 22 and MD 924 and install equipment on buses that syncs with traffic signals along these corridors. | Improve service and mobility for current and future riders by addressing capacity, frequency, and reliability | \$4,000,000 |
| | MDOT MTA Regional | BaltimoreLink Bus Expansion Program - Phase 1 | | Purchase buses to meet increasing ridership demands that exceed replacement needs. | Maintain and replace aging transit assets. Improve access to major activity centers. Improve intermodal connectivity. | \$67,000,000 |
| 3 | MDOT MTA Regional | MARC Service | Northern Virginia to Philadelphia | Fill Northeast Corridor commuter rail gap by providing commuter rail service between Perryville, MD and Newark, DE. Provide additional service to Harford County, including reverse commute, late evening service, and weekend service. | Improve service and mobility for current and future riders by addressing capacity, frequency, and reliability | \$21,000,000 |

| Roadway Projects, FY 2024-2034 | | | | | | |
|--------------------------------|---------------------------------|--------|-------------------------------|--|---|----------------------|
| Map ID | Operating Agency / Jurisdiction | Name | Limits / Length | Description | Justification | Estimated Cost (VOE) |
| 4 | MDOT SHA Anne Arundel County | MD 175 | MD 295 to MD 170 5.2 miles | Widen from 4 to 6 lanes; reconstruct MD 175/MD 295 interchange, improve MD 32 interchange, improve pedestrian/bicycle facilities. | Support growth of cyber-security activities at Fort Meade by relieving congestion with added travel lanes, improving traffic operations with access controls in the form of a center median, and supporting multimodal access to major employment hub with extensive pedestrian and bicycle facilities. | \$185,000,000 |
| 5 | MDOT SHA Anne Arundel County | MD 198 | MD 295 to MD 32 2.7 miles | Widen from 2 to 4 lanes and construct a continuous center median; widen ramp at MD 295; provide pedestrian/bicycle facilities within project limits. | Support economic growth at and around Fort Meade by constructing additional travel lanes to reduce congestion and median to improve safety, Improve access to major employment hub. Improve pedestrian/bicycle facilities. | \$238,000,000 |

| Roadway Projects, FY 2024-2034 | | | | | | |
|--------------------------------|---------------------------------|--|---|---|---|----------------------|
| Map ID | Operating Agency / Jurisdiction | Name | Limits / Length | Description | Justification | Estimated Cost (YOE) |
| 6 | Baltimore City | Hanover Street Bridge over Middle Branch | Reedbird Avenue to McComas Street 0.5 miles | Replace existing 1916 Hanover Street Bridge over Middle Branch. | Improve access to jobs, amenities, and wider range of transportation modes: transit, bicycling, walking. Improve access to disadvantaged communities and to Port Covington development. Land use changes might bring destinations closer and increase property values. Provide operating cost and time savings to passengers, freight carriers, and shippers. Provide for smoother roadway with updated signings and markings. Improve safety: reduce fatalities, injuries, crash costs, and hazmat releases. | \$255,000,000 |
| 7 | Baltimore City | Howard Street Bridge | W Mt Royal Avenue and North Avenue 0.2 miles | Replace existing bridge, consists of two steel tied arch and six steel girder segments. These span over I-83, John Falls, MTA, Amtrak, CSX, Falls Road, and a fenced-in private lot. Improvements include enhanced bicycle and pedestrian facilities extending to the approaches of both sides of the bridge. No additional traffic capacity changes are being included as part of the project. | New structure will provide an increased vertical clearance to I-83. Provide equal travel lanes in each direction in addition to new bicycle lanes. Improve access to jobs, amenities, and wider range of transportation modes: transit, bicycling, walking, etc. Project is located in disadvantaged community and will help with land use changes that might bring destinations closer and increase property values. | \$61,000,000 |

| Roadway Projects, FY 2024-2034 | | | | | | |
|--------------------------------|---------------------------------|--|--|---|---|----------------------|
| Map ID | Operating Agency / Jurisdiction | Name | Limits / Length | Description | Justification | Estimated Cost (YOE) |
| 8 | Baltimore City | Martin Luther King Boulevard Re-Visioning | Washington Boulevard to Howard Street 1.5 miles | Roadway reconstruction and construction of "Complete Street" elements. | Provide a safe environment for multimodal transportation options. Connect people to employment, health care, and shopping. Encourage economic competitiveness on a regional scale. | \$9,000,000 |
| 9 | Baltimore City | U.S. 40 over Martin Luther King Jr. Boulevard Ramp Removal | N Schroeder Street to N Greene Street 0.5 miles | Remove two U.S. 40 bridges over Martin Luther King Jr. Boulevard, reconnecting N Fremont Avenue where it is currently bisected by U.S. 40. Intersection and streetscape improvements on Martin Luther King Jr. Boulevard. | Provide developable space/ opportunity for growth of commercial, residential, or recreational land uses. Improve multimodal connections between Central Business District and West Baltimore MARC Station. Disadvantaged communities located west of MLK Jr. Boulevard are separated by U.S. 40. Removing bridges and reconnecting N Fremont Ave reconnects communities to north and south of U.S. 40, while improving local roadway connectivity. Intersection modifications along MLK Jr. Blvd will focus on safety improvements for pedestrians and cyclists, while increasing multimodal opportunities through continuation of trail between CBD and West Baltimore MARC Station. | \$118,000,000 |

| Roadway Projects, FY 2024-2034 | | | | | | |
|--------------------------------|---------------------------------|---------------------------------------|--|---|--|----------------------|
| Map ID | Operating Agency / Jurisdiction | Name | Limits / Length | Description | Justification | Estimated Cost (VOE) |
| 10 | MDOT SHA Baltimore County | Broening Highway / I-695 | | Construct a full interchange at Exit 44 of I-695 to adequately support redevelopment at Sparrows Point. | Improve access to major activity center. | \$139,000,000 |
| 11 | MDOT SHA Baltimore County | I-695 over U.S. 40 Bridge Replacement | I-695 outer loop from 1,400 ft. north of U.S. 40 to end of terminus of U.S. 40 eastbound ramp; I-695 inner loop 1,700 south of U.S. 40 to 2,100 feet north of U.S. 40. | Replace Bridge No. 0312400 on inner and outer loops of I-695 over US 40; reconfigure I-695/US 40 Interchange; widen main line of I-695; add noise and retaining walls. Add fourth lane of traffic over bridge to tie into I-695 – U.S. 40 to MD 144 outer loop widening. Fourth lane will terminate north of U.S. 40. | Address safety and operations along I-695. Bridge will reach poor rating in the next 5 years. Bridge is a pinch point for capacity improvements along corridor currently under construction. Improve traffic flow through interchange. | \$34,000,000 |
| 12 | MDOT SHA Baltimore County | I-695 | I-70 to MD 43 18.941 miles | Create new lane of traffic along inside shoulder of inner and outer loops during peak hours. Ramp metering and reconfiguration of I-695 / I-70 interchange. | Capacity improvements will support mobility and infrastructure stability for adjacent communities and greater Baltimore region. | \$350,000,000 |
| 13 | MDOT SHA Baltimore County | MD 7 | Campbell Boulevard to Mohrs Lane 0.4 miles | Capacity, congestion relief and safety (flooding) improvements. Raise existing road and bridge above 100-year floodplain. Provide 6-lane divided section, with 2 through lanes in each direction on MD 7 and double left turns at Mohrs Lane and Campbell Blvd. | Improve accessibility and safety for all modes. Support growth in an existing community. | \$9,000,000 |

| Roadway Projects, FY 2024-2034 | | | | | | |
|--------------------------------|---------------------------------|-----------------------------|--|---|--|----------------------|
| Map ID | Operating Agency / Jurisdiction | Name | Limits / Length | Description | Justification | Estimated Cost (YOE) |
| 14 | MDOT SHA Baltimore County | MD 7 / MD 43 Interchange | | Upgrade from partial to full interchange, including two new ramps to accommodate full movements at interchange. | Improve mobility through corridor. | \$59,000,000 |
| 15 | MDOT SHA Baltimore County | MD 140 | Painters Mill Road to Owings Mills Boulevard 0.4 miles | Widen from 4 to 6 lanes; raised median and outside bicycle lanes. Bicycle and pedestrian improvements are included. | Accommodate ongoing development in area by adding capacity. Adding a median will manage turning movements and increase safety. | \$28,000,000 |
| 16 | MDOT SHA Baltimore County | MD 140 - Painters Mill Road | Reisterstown Road and Painters Mill intersection and access roads east and west of Reisterstown Road | Intersection improvements, additional left turn lane, and parallel access roads. | Improve mobility through the corridor and improve safety conditions. | \$45,000,000 |
| 17 | Baltimore County | Paper Mill Road Extension | Hunters Run Drive to York at Shawan Road 0.5 miles | Extend Paper Mill Road to intersection of York and Shawan Roads. | Improve accessibility and safety for all modes. | \$22,000,000 |
| 18 | MDOT SHA Carroll County | MD 31 | Church Street to Coe Drive 1.0 mile | Infrastructure improvements and pavement rehabilitation; streetscaping | Improvements will stabilize roadway infrastructure and improve pedestrian access to existing commercial center enabling the community to thrive in the future. | \$16,000,000 |
| 19 | MDOT SHA Carroll County | MD 851 | Howard County Line to Springfield Avenue 1.037 miles | Infrastructure improvements and pavement rehabilitation; streetscaping | Improvements will stabilize roadway infrastructure and improve pedestrian access to an existing commercial center, enabling the community to thrive in the future. | \$15,000,000 |

| Roadway Projects, FY 2024-2034 | | | | | | |
|--------------------------------|---------------------------------|---------------------------|---|---|--|----------------------|
| Map ID | Operating Agency / Jurisdiction | Name | Limits / Length | Description | Justification | Estimated Cost (YOE) |
| 20 | MDOT SHA Harford County | MD 22 | MD 543 to I-95 7.9 miles | Widen existing 2- and 3-lane sections to 4 and 5 lanes; include an HOV lane from Old Post Road to APG gate, bicycle and pedestrian access, and transit queue jump lanes transit priority system where applicable. | MD 22 corridor is a major east-west arterial in Harford County connecting municipalities of Bel Air and Aberdeen. Road has interchanges with I-95 and U.S. 40 and direct access to main APG gate. | \$158,000,000 |
| 21 | MDOT SHA Harford County | MD 24 (Section G) | 900 feet south of Sharon Road to 1,700 feet north of Ferncliff Lane 1.86 miles | Resurfacing and reconstruction, including slope repair and guardrail replacement | Eliminate erosion of slopes of MD 24 alignment and adjacent stream slopes, ensuring a safe, stable roadway for community access. | \$10,000,000 |
| 22 | MDOT SHA Harford County | MD 152 | U.S. 1 to I-95 6.5 miles | Roadway reconstruction. Capacity improvements, including turn lanes and bicycle and pedestrian access where applicable | Improve access, mobility, and safety for passenger and freight traffic as well as bicyclists, pedestrians and transit users. | \$74,000,000 |
| 23 | Harford County | Perryman East (Road A) | MD 715 to Michaelsville Road 2.0 miles | Construct new 2-lane road in Perryman to handle a bulk of the truck traffic accessing the distribution centers on the peninsula, including turn lanes and bicycle and pedestrian access | Improve access, mobility, and safety in and out of Perryman Peninsula for passenger and freight traffic as well as bicyclists and pedestrians. Roadway will be main access for freight traffic accessing distribution centers and warehouses on the peninsula. | \$50,000,000 |

| Roadway Projects, FY 2024-2034 | | | | | | |
|--------------------------------|---------------------------------|--|---|---|--|----------------------|
| Map ID | Operating Agency / Jurisdiction | Name | Limits / Length | Description | Justification | Estimated Cost (YOE) |
| 24 | Howard County | Broken Land Parkway at Snowden River Parkway | Broken Land Parkway: MD 32 to north of Snowden River Parkway; Snowden River Parkway: east of Minstrel Way to Patuxent Woods Drive 0.25 miles | Capacity, operational, and safety improvements at this signalized intersection as well as access improvements to MD 32 ramps. Includes ADA-compliant pedestrian access as well as bicycle and transit access/mobility improvements. | This major East Columbia intersection is a “gateway” to West and Downtown Columbia and is integral to operations and community/economic “health” of Columbia businesses and neighborhoods. Existing peak period congestion and safety problems posed by weave/merge movements to/from MD 32 create a significant traffic impediment to economic vitality of Snowden River Parkway corridor. Broken Land Parkway, a major arterial connection to downtown Columbia, a Regional Activity Center, also is impeded with ongoing congestion and crashes. Project will reduce sideswipe, angle, and rear-end collisions and improve freight access and mobility. | \$23,000,000 |
| 25 | MDOT SHA Howard County | I-70 | U.S. 29 to MD 32 6.0 miles | Widen from 4 to 6 lanes; includes reconstruction of I-70 / Marriottsville Road interchange and upgrading of I-70 / U.S. 29 interchange | Relieve congestion and improve freight movement by adding one lane in both directions and constructing interchange improvements within project limits. | \$698,000,000 |

| Roadway Projects, FY 2024-2034 | | | | | | |
|--------------------------------|---------------------------------|--------|---|--|--|----------------------|
| Map ID | Operating Agency / Jurisdiction | Name | Limits / Length | Description | Justification | Estimated Cost (VOE) |
| 26 | MDOT SHA Howard County | I-95 | MD 32 to MD 100 6.0 miles | Create peak hour shoulder use. | Relieve congestion and improve freight movement by adding one outside lane in both directions during peak hours. Creating additional merge area at MD 100 and MD 32 entrance ramps will increase safety. | \$41,000,000 |
| 27 | MDOT SHA Howard County | MD 100 | I-95 to Anne Arundel County line 2.0 miles | Widen MD 100 from 4 to 6 lanes with auxiliary merge/diverge lanes. | MD 100 (east of I-95) daily, especially during peak periods, experiences congestion that negatively effects commuter, freight/commercial, and regional traffic as well as air quality and energy use. Local traffic diverts to local road network with commensurate negative effects. Widening MD 100 east of I-95 will relieve these problems and accommodate progressively increasing demand for this highway. Prior investment for initial MD 100 construction will be positively augmented by further needed investment. | \$36,000,000 |

| Roadway Projects, FY 2024-2034 | | | | | | |
|--------------------------------|---------------------------------|-----------------------------|--|---|--|----------------------|
| Map ID | Operating Agency / Jurisdiction | Name | Limits / Length | Description | Justification | Estimated Cost (VOE) |
| 28 | MDOT SHA Howard County | MD 175 / MD 108 Interchange | 0.25 miles to MD 175/ MD 108 intersection from all approaches. Also a direct connection to Columbia Gateway Drive. 0.25 miles | New partial grade separation to enable increased capacity and traffic flow to MD 175 and provide direct access to Gateway Drive and Columbia Gateway employment center. | Mitigate impacts at congested state intersection within I-95 corridor, which experiences a relatively high rate of rear-end and sideswipe collisions. Facilitate direct access to I-95 and regional activity center, Columbia Gateway, for commuters as well as freight traffic. | \$96,000,000 |
| 29 | MDOT SHA Howard County | U.S. 29 | Patuxent River Bridge to Seneca Drive 1.7 miles | Widen from 2 to 3 lanes in northbound direction. Includes auxiliary lanes and grade-separated interchange at Rivers Edge community. | Relieve congestion by adding one lane in northbound direction to match southbound typical section. Improve safety by restricting access to Rivers Edge community with a full grade-separated interchange. | \$78,000,000 |

| Roadway Projects, FY 2024-2034 | | | | | | |
|--------------------------------|-------------------------------------|--|--|---|--|----------------------|
| Map ID | Operating Agency / Jurisdiction | Name | Limits / Length | Description | Justification | Estimated Cost (YOE) |
| 30 | MDOT SHA Queen Anne's County | MD 8 / U.S. 50/301 Interchange and Service Roads | Skip Jack Parkway south to Davidson Drive; east to Thompson Creek service road 7.94 miles (Thompson Creek service road) | Widen from 2 to 4 lanes, convert MD 8 overpass to divergent diamond, interchange with U.S. 50/301, and add Thompson Creek and Cox Creek service roads to improve traffic flow, add capacity and allow for alternative routes to services and residential areas. Provide for bike and pedestrian improvements along existing and new routes. | MD 8 is predominantly a 2-lane road that serves as the only access to a 10-mile residential peninsula on southern Kent Island. Widening northern sections of MD 8 and reconstructing existing overpass will add capacity, improve safety, reduce congestion, and allow for pedestrian and bike access in corridor. Reconstructing MD 8 overpass into a divergent diamond will improve mobility and access of daily commuters to Chesapeake Bay Bridge. Project allows for safe bike and pedestrian access across U.S. 50/301, connecting existing improvements north and south of U.S. 50/301. Thompson Creek service road will allow access to business and allow some traffic to bypass more congested sections of MD 8. Shoulder use on MD 8 North is permitted in limited circumstances at times of severe congestion. | \$82,000,000 |

| Roadway Projects, FY 2024-2034 | | | | | | |
|--------------------------------|---------------------------------|-------|---|--|--|----------------------|
| Map ID | Operating Agency / Jurisdiction | Name | Limits / Length | Description | Justification | Estimated Cost (VOE) |
| 31 | MDOT SHA Queen Anne's County | MD 18 | Kent Narrows to Bay Bridge – MD 18 and MD 835 on east side of Kent Narrows to MD 18 4.96 miles | Widen from 2 to 4 lanes, including ROW acquisition, utility relocation, new pedestrian improvements, and reconstruction of intersections to improve capacity, safety, and mobility on the only alternative route to U.S. 50/301 on the island. | More than 26 million vehicles travel U.S. 50/301 and cross the William Preston Jr. Memorial Bridge annually, making this a vital transportation corridor in the mid-Atlantic region. MD 18 is the only alternative route to U.S. 50/301 for 10 miles from the U.S. 50/301 split in Queenstown to the Bay Bridge. MD 18 is vital to mobility in the area, access to services, and emergency service response and transport. Widening MD 18 to add capacity, improve safety, and maintain mobility as volumes and congestion on U.S. 50/301 increase is vital to the transportation system while MDOT is planning for additional capacity for crossing the Chesapeake Bay. | \$111,000,000 |

| Transit Projects, FY 2035-2045 | | | | | | |
|--------------------------------|---------------------------------|----------------------------------|--|---|--|----------------------|
| Map ID | Operating Agency / Jurisdiction | Name | Limits / Length | Description | Justification | Estimated Cost (YOE) |
| 32 | TBD Anne Arundel County | U.S. 50 Bus Rapid Transit | Bus Rapid Transit between New Carrollton MARC/Metro station and Parole along U.S. 50 21.0 miles | New Carrollton to Parole | As stated in the Corridor Growth Management Plan, although the U.S. 50 corridor indicates there is insufficient land use density to warrant additional passenger rail service, it appears feasible to provide BRT or high-speed transit vehicles on a separate right of way, offering high-quality transit service at lower capital and operating expense. | \$712,000,000 |
| 33 | MDOT MTA Harford County | Aberdeen MARC Station | U.S. 40 at MD 132 / Bel Air Road | Transit Oriented Development (TOD); new train station, additional parking, U.S. 40 "Green Boulevard," and Station Square Plaza - new pedestrian underpass and green, terraced plaza/amphitheater. | Improve service and mobility for current and future riders by addressing capacity, frequency, and reliability. | \$70,000,000 |
| 34 | TBD Howard County | Bus Rapid Transit to BWI Airport | Dorsey MARC station to BWI light rail station 9.7 miles | New bus rapid transit service: Dorsey MARC station to Arundel Mills to BWI consolidated rental car facility to BWI light rail station. | Link Baltimore and Washington regions more closely together to enable greater economic, housing, educational, and cultural opportunities in each region. Address peak hour congestion. Provide an effective linkage between Camden MARC line and BWI Airport. | \$449,000,000 |

| Transit Projects, FY 2035-2045 | | | | | | |
|--------------------------------|---------------------------------|---|--|--|---|----------------------|
| Map ID | Operating Agency / Jurisdiction | Name | Limits / Length | Description | Justification | Estimated Cost (YOE) |
| 35 | TBD Howard County | U.S. 1 Corridor Bus Rapid Transit | Dorsey MARC to College Park Purple Line Light Rail Station 19.5 miles | Bus Rapid Transit will emulate light rail operations at a lower cost, and is designed to link Howard County commuters from Dorsey MARC to Laurel MARC Station and Laurel and to College Park and Purple Line light rail. | Link Baltimore and Washington regions more closely together to enable greater economic, housing, educational, and cultural opportunities in each region. Address peak hour congestion. Provide an effective linkage among existing and planned communities along corridor. Strengthen state investment in the University of Maryland. | \$184,000,000 |
| 36 | TBD Howard County | U.S. 29 Corridor Bus Rapid Transit | U.S. 29 / U.S. 40 to MD 198 / U.S. 29 (Burtonsville) 16 miles | Bus Rapid Transit (BRT) Ellicott City / Downtown Columbia Transit Center Location (Mall Ring Road) to MD 198 in Montgomery County; Grade-separated facilities in median of U.S. 29. | Link Baltimore and Washington region more closely together to allow greater economic, housing, educational, and cultural opportunities in each region. Address peak hour congestion. | \$735,000,000 |
| | MDOT MTA Regional | BaltimoreLink Bus Expansion Program - Phase 2 | | Purchase buses to meet increasing ridership demands that exceed replacement needs. | Maintain and replace aging transit assets. Improve access to major activity centers. Improve intermodal connectivity. | \$90,000,000 |
| | MDOT MTA Baltimore City | New MARC Storage and Maintenance Facility | | Provide alternate location to store MARC Penn Line trains following implementation of Amtrak's Penn Station redevelopment plans, which do not accommodate current storage and maintenance at Penn Station. | Enable MARC to provide longer train sets to reduce crowding on MARC Penn Line trains during peak periods. Project also serves as a step toward providing midday service to Camden station in the future. | \$62,000,000 |

| Transit Projects, FY 2035-2045 | | | | | | |
|--------------------------------|---------------------------------|--|---|--|---|----------------------|
| Map ID | Operating Agency / Jurisdiction | Name | Limits / Length | Description | Justification | Estimated Cost (YOE) |
| 37 | MDOT MTA Baltimore City | Penn-Camden Connector | Penn Line / Riverside Maintenance Yard 2.2 miles | Provide access to Riverside Yard from Penn Line for locomotive repair and maintenance | Improves efficiency of MARC operations by consolidating locomotive repair and maintenance at proposed Riverside Locomotive Maintenance Building. This will eliminate need to have a dedicated locomotive maintenance building for Penn Line, making operations much more efficient. | \$62,000,000 |
| 38 | MDOT MTA Baltimore City | West Baltimore MARC Station Relocation | | Relocate existing West Baltimore MARC Station farther south. This will be consistent with construction of new B&P Tunnel and much needed ADA accessibility improvements. | Relocated station will improve ADA accessibility and make station safer for passengers. It will also facilitate shorter dwell times through use of high-level platforms. An ADA-accessible station with more efficient train operations will provide a more attractive option to those who currently travel along the corridor by car, thus contributing to a decrease in congestion and associated emissions. A new station also make site more attractive for transit-oriented development. | \$91,000,000 |

| Roadway Projects, FY 2035-2045 | | | | | | |
|--------------------------------|---------------------------------|------|-----------------------------------|--|--|----------------------|
| Map ID | Operating Agency / Jurisdiction | Name | Limits / Length | Description | Justification | Estimated Cost (YOE) |
| 39 | MDOT SHA Anne Arundel County | I-97 | MD 32 to U.S. 50/301 6.5 miles | Add managed lanes (HOV lanes) to address capacity needs. Investigate need for additional interchange access in Crownsville. | I-97 provides a gateway to the City of Annapolis and Eastern Shore. Bottlenecks occur on roadway (not just during summer season, but year round). Project will support U.S. 50/301 improvements (Bay Bridge). | \$391,000,000 |
| 40 | MDOT SHA Anne Arundel County | MD 2 | U.S. 50 to I-695 17.0 miles | Widen 4-lane sections to 6 lanes throughout. Roadway improvements, new premium transit service, new sidewalks, and permitting land use densities that support transit in select locations where redevelopment might occur. | Corridor serves both local traffic and long-distance commuter traffic destined for downtown Baltimore in the Annapolis, Severna Park, Pasadena, and Glen Burnie areas. | \$299,000,000 |
| 41 | MDOT SHA Anne Arundel County | MD 3 | MD 424 to MD 32 4.0 miles | Widen from 4 to 6 lanes from St Stephen Church Road to MD 175. Upgrade roadway segments, improve bike/pedestrian facilities (especially crossings), and improve intersection operations. | Reduce congestion on MD 3, thus improving air quality and reducing greenhouse gases. Improve access to Prince George's County, Fort Meade, and BWI. Project will benefit a significant amount of truck traffic on MD 3. Also, project serves Crofton and Davidsonville areas, where there is a considerable amount of retail and residential activity, including new Waugh Chapel Village. | \$120,000,000 |

Roadway Projects, FY 2035-2045

| Map ID | Operating Agency / Jurisdiction | Name | Limits / Length | Description | Justification | Estimated Cost (YOE) |
|--------|---------------------------------|--------|---|--|--|----------------------|
| 42 | MDOT SHA Anne Arundel County | MD 32 | I-97 to Howard County 11 miles | Widen from 6 to 8 lanes between I-95 and MD-295. Add additional HOV-2 lanes. | Corridor serves a diverse traffic mix, including local traffic in Savage, Odenton, and Millersville areas, and commuter traffic destined for Ft. Meade, NSA job centers, as well as Annapolis. | \$480,000,000 |
| 43 | MDOT SHA Anne Arundel County | MD 100 | Howard County line to I-97 6.5 miles | Widen from 4 to 6 lanes. Possible inclusion of managed lanes. | <ol style="list-style-type: none"> 1. The Yellow Line Light Rail Study utilized part of median to run the train. 2. This is a major route connecting Howard County, Anne Arundel County, Arundel Mills and the BWI Airport. 3. Connects Anne Arundel and Howard counties. 4. Connectivity to I-9 | \$271,000,000 |
| 44 | MDOT SHA Anne Arundel County | MD 177 | MD 177 from MD 2 to Lake Shore Drive 7.8 miles | Widen from 2 to 4 lanes. | Corridor serves local traffic in Pasadena and Glen Burnie as well as long-distance commuters traveling to Baltimore and Annapolis. Roadway has numerous access points and is near capacity between Jumpers Hole Road and MD 648, which leads to congestion between Jumpers Hole Road and MD 607. | \$196,000,000 |

| Roadway Projects, FY 2035-2045 | | | | | | |
|--------------------------------|---------------------------------|--------|--|--|--|----------------------|
| Map ID | Operating Agency / Jurisdiction | Name | Limits / Length | Description | Justification | Estimated Cost (YOE) |
| 45 | MDOT SHA Anne Arundel County | MD 214 | MD 424 to Shoreham Beach Road 7.5 miles | Widen from 2 to 4 lanes for most of this corridor (from MD 424 to Selby Boulevard). Bicycle improvements throughout most of the corridor and pedestrian improvements in segments. Traffic signal warrant assessments recommended at MD 214 / Riva Road and MD 214 / Stepneys Lane intersections. | MD 214 provides an essential link between the Edgewater area to the rest of the County and the Washington DC. region. It serves local traffic in Edgewater as well as commuters traveling to job centers in Washington D.C., Fort Meade, the NSA, and Annapolis. | \$112,000,000 |
| 46 | MDOT SHA Anne Arundel County | MD 295 | MD 100 to I-195 3.27 miles | Widen from 4 to 6 lanes. Includes a new interchange at Hanover Road and an extension of Hanover Road from the CSX railroad tracks to MD 170. | Support economic growth at BWI Airport. Relieve congestion and improve freight movement by adding one lane in both directions. Develop a key component of local network with Hanover Road interchange and extension. | \$331,000,000 |

| Roadway Projects, FY 2035-2045 | | | | | | |
|--------------------------------|---------------------------------|---------------------|-------------------------------|--|--|----------------------|
| Map ID | Operating Agency / Jurisdiction | Name | Limits / Length | Description | Justification | Estimated Cost (YOE) |
| 47 | MDOT SHA Anne Arundel County | MD 713 (Ridge Road) | MD 175 to MD 176 2.6 miles | Corridorwide road improvements, including reconstruction and widening, as well as intersection improvements and bike/pedestrian accommodations. Primarily widening MD 713 from 2 to 4 lanes between MD 175 and Stoney Run Drive. | Ridge Road corridor parallels the Baltimore-Washington Parkway and connects public facilities and activity centers with residential areas. Pedestrian and bicycle accommodations among residential areas and activity centers are limited and not constructed to county/state standards. County expects growth in employment and population from planned and future developments along or near MD 713 to result in increased travel demand and recurring congestion. Purpose of MD 713 planning study is to identify year 2040 deficiencies, evaluate build alternatives to address deficiencies, reduce current and forecasted congestion, reduce crash potential, and improve pedestrian and bicycle compatibility, while minimizing impacts to natural and built environment. | \$60,000,000 |

| Roadway Projects, FY 2035-2045 | | | | | | |
|--------------------------------|---------------------------------|---------|---------------------------|--------------------------|---|----------------------|
| Map ID | Operating Agency / Jurisdiction | Name | Limits / Length | Description | Justification | Estimated Cost (YOE) |
| 48 | MDOT SHA Anne Arundel County | U.S. 50 | I-97 to MD 2 5.5 miles | Widen from 6 to 8 lanes. | Portions of facility, especially from MD 665 across Severn River Bridge to MD 2, experience recurring congestion. SHA has completed improvements at Severn River Bridge; remainder of funding should be used to address remainder of corridor. Project will reduce recurring congestion, improve access to regional hospital, improve connections among communities, and support transit service across bridge. | \$330,000,000 |

| Roadway Projects, FY 2035-2045 | | | | | | |
|--------------------------------|---------------------------------|------------------|--|---|---|----------------------|
| Map ID | Operating Agency / Jurisdiction | Name | Limits / Length | Description | Justification | Estimated Cost (YOE) |
| 49 | Baltimore City | Baltimore Street | MLK Boulevard to President Street 1.2 miles | Roadway reconstruction using concrete, utility upgrades/replacements, sidewalk reconstruction, ADA improvements, curb and gutter reconstruction, signal upgrades, pavement markings and signing, stormwater management facilities, landscaping, and streetscaping elements. | Improve safety and mobility for all users by reducing congestion, fatalities, injuries, crashes, and hazmat releases. Dedicated bus lane will provide for increased public transit efficiency and connectivity throughout Central Business District, surrounding neighborhoods, and Southern Gateway entertainment district. Provide increased access to jobs for communities in West Baltimore by providing better connectivity to Central Business District. Utility upgrades and replacements will reduce roadway deterioration from stream erosion. Reduce emissions as a result of smoother surface and synchronized signal timings. | \$26,000,000 |
| 50 | MDOT SHA Baltimore County | I-795 | Owings Mills Boulevard to Franklin Boulevard 2.63 miles | Widen from 4 to 6 lanes. Construct interchange at Dolfield Boulevard. | Improve access to an existing commercial hub. | \$191,000,000 |
| 51 | MDOT SHA Carroll County | MD 26 | MD 32 to Liberty Reservoir 2.6 miles | Widen from 4 to 6 lanes, including bike and pedestrian facilities | Adding a median and partial access controls will improve safety. Pedestrian and bicycle facilities will improve multimodal access. | \$102,000,000 |

| Roadway Projects, FY 2035-2045 | | | | | | |
|--------------------------------|---------------------------------|--------|---|--|---|----------------------|
| Map ID | Operating Agency / Jurisdiction | Name | Limits / Length | Description | Justification | Estimated Cost (YOE) |
| 52 | MDOT SHA Carroll County | MD 32 | MD 26 to Howard County line 3.364 miles | Widen from 2 to 4 lanes; addition of pedestrian and bicycle facilities. | Adding 2 lanes addresses anticipated traffic growth; constructing a median and access controls will increase safety in the corridor; pedestrian and bicycle facilities will improve multimodal connections. | \$57,000,000 |
| 53 | MDOT SHA Carroll County | MD 97 | MD 140 Overpass to Bachmans Valley Road 4.73 miles | Widen from 2 to 5 lanes, including MD 140 / Meadow Branch Road interchange; construct pedestrian and bicycle facilities. | Support economic vitality of the community by reducing congestion and improving operations through widening MD 97 from 2 to 5 lanes and constructing MD 140 / Meadow Branch Road interchange. Regional access multi-modal mobility will be improved with this improvement with pedestrian and bicycle facilities. | \$233,000,000 |
| 54 | MDOT SHA Carroll County | MD 140 | Market Street to Sullivan Road 2.5 miles | Widen from 6 to 8 lanes. Construct full interchange at MD 97 and Continuous Flow Intersections (CFIs) at Center Street and Englar Road. Construct outside bike lane and sidewalk in both directions. | Widen through traffic lanes and construct intersection and interchange improvements at multiple locations. | \$271,000,000 |

| Roadway Projects, FY 2035-2045 | | | | | | |
|--------------------------------|---------------------------------|-------------------------------|---|---|--|----------------------|
| Map ID | Operating Agency / Jurisdiction | Name | Limits / Length | Description | Justification | Estimated Cost (YOE) |
| 55 | MDOT SHA Carroll County | MD 140 at MD 91 (Gamber Road) | Baltimore County Line to Kays Mill Road 1.85 miles | Divided highway with new interchange at MD 91 and intersection improvements. Add pedestrian and bicycle facilities. | Support economic vitality of community by making this busy intersection safer and more efficient with a grade-separated interchange. Improve regional access with improved roadway connection. Enhance multimodal mobility with pedestrian and bicycle facilities. | \$170,000,000 |
| 56 | Harford County | Abingdon Road | MD 924 to U.S. 40 3.0 miles | Capacity improvements, including turn lanes, bicycle lanes, and sidewalks. | Improve safety and pedestrian access from commercial areas near MD 924 to residential communities to the east. | \$69,000,000 |
| 57 | MDOT SHA Harford County | MD 24 | U.S. 1 Bypass to south of Singer Road 5.5 miles | Widen from 4 to 6 lanes; includes sidewalks and bicycle accommodations where appropriate. | Increased traffic volumes continue to stress roadway network in and around Town of Bel Air. MD 24 corridor links Town of Bel Air, Forest Hill, and communities in northern Harford County with I-95 and U.S. 40 corridor. | \$98,000,000 |
| 58 | MDOT SHA Harford County | MD 24 (Rock Spring Road) | U.S. 1 Bypass to MD 23 1.8 miles | Add travel lane in each direction, including turn lanes and completion of shared-use path from Forest Valley Road to Red Pump Road adjacent to roadway. | Increased traffic volumes continue to stress roadway network in and around Town of Bel Air. This section of roadway is the gateway into County's growth area from rural northern Harford County communities. | \$69,000,000 |

| Roadway Projects, FY 2035-2045 | | | | | | |
|--------------------------------|---------------------------------|----------------------------------|-----------------------------|--|---|----------------------|
| Map ID | Operating Agency / Jurisdiction | Name | Limits / Length | Description | Justification | Estimated Cost (YOE) |
| 59 | MDOT SHA Harford County | MD 24 at Singer Road Interchange | | Elevate grade of cross street through movement as well as left turn movements from all directions while allowing MD 24 through and right turn movements as well as side street right turn movements to operate with free-flowing movements (as described in MD 924 study). | Reduce congestion and improve safety and operations by transforming an at-grade intersection into a grade-separated intersection. | \$131,000,000 |
| 60 | MDOT SHA Harford County | MD 24 at Wheel Road Interchange | | Elevate grade of cross street through movement as well as left turn movements from all directions while allowing MD 24 through and right turn movements as well as side street right turn movements to operate with free-flowing movements (as described in MD 924 study). | Roadway widening will accommodate a high volume of through traffic and opposing turns at this intersection. An 8-lane section would be required to move projected traffic on MD 24 and a 7-lane section with double turn lanes would be required along E. Wheel Road. As an alternate to this very large at-grade intersection, a grade-separated intersection with median ramps is proposed. | \$160,000,000 |
| 61 | MDOT SHA Harford County | MD 543 | MD 136 to I-95 2.2 miles | Widen from 2 to 4 lanes, including intersection upgrades at MD 136, turn lanes, and bicycle and pedestrian access. Includes capacity upgrades to MD 543 / I-95 interchange. Improvement will fix queuing problems on MD 543 through intersection with MD 7. | Relieve congestion and improve access, capacity, mobility, and safety for passenger and freight traffic as well as bicyclists, pedestrians, and transit riders. Address queuing issues at I-95 interchange. | \$161,000,000 |

| Roadway Projects, FY 2035-2045 | | | | | | |
|--------------------------------|---------------------------------|-----------------|---|---|---|----------------------|
| Map ID | Operating Agency / Jurisdiction | Name | Limits / Length | Description | Justification | Estimated Cost (YOE) |
| 62 | Harford County | Thomas Run Road | MD 22 to West Medical Hall Road 0.8 miles | Streetscape and capacity improvements, including center turn lane, sidewalks, bicycle accessibility, pedestrian-scale lighting with banners, crosswalks, street furniture, and trash receptacles. | Partnership between Harford Community College (HCC) and Towson University will bring expected growth and planned expansion. Project will improve safety, mobility, and access for passenger traffic, bicyclists, and pedestrians in and around HCC. | \$16,000,000 |
| 63 | MDOT SHA Harford County | U.S. 1 | MD 152 to MD 147 / U.S. 1 Business 1.3 miles | Widen from 4 to 6 lanes, including bicycle and pedestrian accommodations. | Increased traffic volumes continue to stress roadway network in and around Town of Bel Air. U.S. 1 is a major transportation corridor linking Bel Air with northeast Baltimore County. | \$37,000,000 |
| 64 | MDOT SHA Harford County | U.S. 1 Bypass | MD 147 / U.S. 1 Business to Hickory Bypass 4.6 miles | Widen from 2 to 4 lanes. Improve U.S. 1 / MD 24 and U.S. 1 / MD 924 interchanges. | Increased traffic volumes continue to stress roadway network in and around Town of Bel Air. Bel Air Bypass (U.S. 1 Bypass) has been an anticipated highway project for several years. Added capacity will reduce congestion. Interchange improvements will improve safety and operations. Project supports economic development and will improve quality of life. | \$165,000,000 |
| 65 | MDOT SHA Harford County | U.S. 40 | MD 543 to Loflin Road 1.7 miles | Widen from 4 lanes to 6 lanes, including turn lanes and bicycle and pedestrian access. | Project may relieve some forecasted congestion on I-95 by providing local travelers an alternate route. Includes bicycle and pedestrian improvements. | \$67,000,000 |

| Roadway Projects, FY 2035-2045 | | | | | | |
|--------------------------------|---------------------------------|-----------------------------|---|--|---|----------------------|
| Map ID | Operating Agency / Jurisdiction | Name | Limits / Length | Description | Justification | Estimated Cost (YOE) |
| 66 | MDOT SHA Harford County | U.S. 40 / MD 22 Interchange | 0.4 miles | Capacity and safety improvements. Interchange reconstruction (reconfigure existing partial interchange to full interchange to eliminate left turns along MD 22). Sidewalks, crosswalks, and bicycle facilities where applicable. | Improve capacity and safety at this interchange for passenger, freight, and transit traffic as well as bicyclists and pedestrians. | \$35,000,000 |
| 67 | MDOT SHA Howard County | MD 32 | Cedar Lane to Anne Arundel County line 8.0 miles | Widen from 4 to 6 lanes (Feasibility and Needs Study required). Increase capacity at grade separations. Study feasibility of future HOV and/or HOT lanes. | Facilitate inter-county commuting and reduce inter-county congestion. Facilitate diversion of commuter traffic off local roads and reduce congestion-related emissions (improving air quality). Improve freight movements and access to regional activity centers. Enhance access to lower priced housing market in Carroll County and growing employment markets in Anne Arundel, Prince George's, and Montgomery counties. Improve recreational-related travel times. Leverage prior federal investments for MD 32. | \$1,025,000,000 |

| Roadway Projects, FY 2035-2045 | | | | | | |
|--------------------------------|---------------------------------|--------|--|--|---|----------------------|
| Map ID | Operating Agency / Jurisdiction | Name | Limits / Length | Description | Justification | Estimated Cost (YOE) |
| 68 | MDOT SHA Howard County | MD 32 | MD 32 just north of I-70 to Carroll County line 4.0 miles | Widen from 2 to 4 lanes. Safety, capacity, operational, and access improvements consistent with MD SHA Feasibility Study, MD SHA Access Control Study, and Carroll County proposal for widening MD 32 north of this project's limits. | Project has significant community support for safety reasons. Improve access to lower priced housing in Carroll County as well as commercial operations in both Howard and Carroll counties. Most commuter traffic using this road does not originate in Howard County but in Carroll and Frederick counties. Improved access to jobs will increase Carroll County PFA development, including major redevelopment projects such as Springfield State Hospital. Project will complement Carroll County MD 32 widening project. | \$69,000,000 |
| 69 | MDOT SHA Howard County | MD 108 | Trotter Road to Guilford Road 1.5 miles | Improvements as articulated in 2014 Clarksville Pike Streetscape Plan and Design Guidelines / Traffic Study. Includes selected road capacity improvements, resulting in a 4-lane section for most of the corridor, but not all, as well as sidewalks, shared-use paths, and traffic signal upgrades. | Existing and newly developing commercial land uses along this segment of MD 108 are negatively affected by existing MD 108 road design, characterized by lack of ped/ bike access, congestion, and multiple at-grade access points. | \$46,000,000 |

| Roadway Projects, FY 2035-2045 | | | | | | |
|--------------------------------|---------------------------------|-----------------------------|--|--|--|----------------------|
| Map ID | Operating Agency / Jurisdiction | Name | Limits / Length | Description | Justification | Estimated Cost (YOE) |
| 70 | MDOT SHA Howard County | MD 175 | Oceano Avenue to Anne Arundel County line 1.6 miles | Widening: going from one travel lane in some areas (both directions) to two travel lanes for entire project. Also, bicycle, transit, and pedestrian improvements consistent with Anne Arundel County widening proposals. | Improve mobility for all modes. Improve housing, commuting, and freight options (to/from Baltimore). Provide benefits to new and existing communities through access to all modes of travel. Facilitate freight access to/from Dorsey Run Road and MD 295 and access to MARC Penn line. | \$21,000,000 |
| 71 | MDOT SHA Howard County | MD 175 / I-95 Interchange | 1.0 miles | Improvements to interchange, including CD lanes on I-95, consistent with preferred options in MDOT-SHA MD 175 Improvement Study. | Relieve congestion at this grade separation that currently experiences peak period unacceptable levels of service. Facilitate access to affordable housing in U.S. 1 corridor and Columbia. Augment freight movement, both local and regional. Leverage prior federal funding for I-95 and MD 175. | \$182,000,000 |
| 72 | MDOT SHA Howard County | U.S. 1 | Prince George's County Line to Baltimore County line 11.0 miles | Widen from 4 to 6 lanes; construct typical section as defined in State/County MOU for U.S. 1 revitalization | Support commercial revitalization of corridor by relieving congestion with additional travel lanes and pedestrian/ bicycle facilities. | \$179,000,000 |
| 73 | MDOT SHA Howard County | U.S. 1 / MD 175 Interchange | MD 175 0.5 miles | Construct new grade-separated interchange | Support commercial revitalization of U.S. 1 corridor by relieving congestion with grade-separated interchange. Project also will improve safety by removing at-grade turning movements. | \$153,000,000 |

| Roadway Projects, FY 2035-2045 | | | | | | |
|--------------------------------|---------------------------------|--------------------------------|--|---|--|----------------------|
| Map ID | Operating Agency / Jurisdiction | Name | Limits / Length | Description | Justification | Estimated Cost (YOE) |
| 74 | MDOT SHA Howard County | U.S. 1 Revitalization Projects | MD 175 to Whiskey Bottom Rd 4.5 miles | U.S. 1 - MD 175 to Whiskey Bottom Road: widening, pedestrian, bike, transit, streetscape and access improvements consistent with U.S. 1 Design Manual (to the extent possible); developer participation with SHA coordination and SHA/County MOU for U.S. 1 revitalization cross section. Breakout project. | Enable alternate transport modes, provide access to affordable housing options (U.S. 1 revitalization), and expand commuting options throughout region. Provide alternate modal opportunities to benefit new and existing communities and improve access to recreational facilities. Improvements near U.S. 1 / MD 32 / Guilford Road will alleviate regional congestion and facilitate freight operations to/from statewide/ regional/national highway network. Leverage prior federal and state investments through cooperative state/county development strategy within existing Priority Funding Area. | \$145,000,000 |

Potential Small Program Set-Asides – 2024-2045

In the coming years, the BRTB may decide to set aside some funding to support various strategies that either increase transportation system efficiency or employ transportation demand management approaches to reduce travel demand of single-occupancy vehicles. Transportation system efficiency strategies rely primarily on managing existing transportation facilities, rather than building new capacity. Transportation Demand Management (TDM) refers to various strategies that change travel behavior (how, when, and where people travel) to increase transportation system efficiency. Together, these types of strategies contribute to cleaner air and a safer transportation system. Although most individual strategies only affect a small portion of total travel, the cumulative impacts of a wide range of strategies can be significant. Objectives that could be addressed through this funding include: managing congestion, reducing emissions, promoting equity, and improving safety.

The BRTB has a total of \$105 million for potential set-asides. This is the difference between the amount of revenues forecasted to be available for major capital projects from 2024-2045 and the year-of-expenditure cost estimates for major capital projects in the adopted Preferred Alternative.

Two projects that could be funded from these set-asides are major efforts to develop regional greenways:

- **Baltimore Greenway** – a proposed 35-mile network of urban shared-use trails to link Baltimore’s anchor institutions and destinations—including universities, hospitals, museums, parks, schools, waterfronts, and employment centers—with the city’s neighborhoods and outdoor resources.
- **Patapsco Regional Greenway** – a proposed shared-use trail running through the Patapsco River valley from Baltimore’s Inner Harbor to Sykesville in Carroll County, passing through or near the communities of Cherry Hill, Baltimore Highlands, Halethorpe, Elkridge, Catonsville, Ellicott City, Oella, Daniels, Woodstock, Marriottsville, and Sykesville.

Maryland Transportation Authority Projects, FY 2024-2045

The Maryland Transportation Authority (MDTA) is an independent agency responsible for managing, operating, and improving the state's toll facilities. Because MDTA projects are funded by tolls, they are not included in the listing of projects to be supported with federal funds.

Maximize2045, however, must include these projects because of their effects on air quality conformity and travel demand. The table below shows the projects MDTA expects to implement by 2045. BMC staff included these projects in the master network of programmed and planned system improvements. Staff analyzed this master network to determine air quality conformity and to predict systemwide travel demand effects. Appendix C shows the results of these analyses.

| MDTA Projects, FY 2024-2045 | | | | |
|-----------------------------|--------------------------------|-------------------|----------------------------------|---|
| Year | Jurisdiction | Name | Limits | Description |
| 2025 | Baltimore County | I-95: Section 100 | Interchanges at I-695 and MD 43 | Construct ramps |
| 2026 | Baltimore and Harford counties | I-95: Section 200 | North of MD 43 to north of MD 22 | Construct express toll lanes, including MD 152, MD 24, MD 543, and MD 22 interchanges |

| MDTA Projects, FY 2024-2045 | | | | |
|-----------------------------|----------------|--|------------------------------------|--|
| Year | Jurisdiction | Name | Limits | Description |
| 2029 | Baltimore City | I-95: Port Covington access improvements | Caton Avenue to Ft. McHenry Tunnel | <p>Improve I-95 ramps along approximately 7 miles of I-95 and sections of Hanover Street, McComas Street, and Key Highway. Improvements include:</p> <ol style="list-style-type: none"> 1. I-95 Northbound Off-Ramps- (a) Exit 52, new ramp from Russell Street off-ramp; (b) Exit 53 interchange, new spur from I-395 southbound ramp; (c) Exit 54, remove ramp from I-95 northbound to Hanover Street southbound; and (d) Exit 55, reconstruct ramp from I-95 northbound to McComas Street 2. I-95 Northbound On-Ramps – new ramp from McComas Street to I-95 Northbound 3. I-95 Southbound Off-Ramps – new ramp from I-95 southbound to McComas Street westbound 4. I-95 Southbound On-Ramps – realign ramp from McComas Street Westbound to I-95 southbound 5. Hanover Street – reconstruction from CSX Bridge to McComas Street westbound to I-95 southbound 6. McComas Street and Key Highway – (a) realign McComas Street; and (b) widen Key Highway between McHenry Row and McComas Street 7. Pedestrian and Bicycle Connections – (a) new sidewalks along Hanover Street and realigned McComas Street; (b) shared use path along Key Highway; and (c) shared use path linking South Baltimore to Port Covington peninsula. |

Committed Funding, FY 2020-2023

As noted, *Maximize2045* covers the time period from FY 2024 through 2045. To present a complete picture of planned future transportation investments, the table below shows the major committed projects that are within the FY 2020-2023 time frame of the current adopted TIP. “Committed” means that a schedule is in place and either (1) sponsors currently are spending funds on these projects (for design, right-of-way acquisition, or construction), or (2) sponsors have identified fund sources and have committed funds to design or build these projects within this FY 2020-2023 time frame.

| Committed Projects, FY 2020-2023 | | | | |
|----------------------------------|---------------------------------|----------------------------------|---|--|
| Year | Operating Agency / Jurisdiction | Name | Limits | Description |
| 2020 | MDOT SHA Anne Arundel County | MD 175 | Disney Road to Reece Road | Widen from 2 to 6 lanes. |
| 2020 | Baltimore City | U.S. 40, Edmondson Avenue bridge | Bridge over Gwynns Falls | Widen bridge. |
| 2020 | Howard County | Dorsey Run Road (south section) | CSX Railroad to Old Dorsey Run Road | Widen from 2 to 3 lanes (with center turn lane). |
| 2021 | MDOT SHA Anne Arundel County | MD 175 | National Business Parkway to McCarron Court | Widen from 4 to 6 lanes and reconstruct interchange at MD 295. |
| 2021 | MDOT SHA Baltimore County | I-695 | U.S. 40 to MD 144 | Widen from 3 to 4 lanes (outer loop). |
| 2022 | Anne Arundel County | Hanover Road Corridor | Ridge Road to New Ridge Road | New 4-lane road. |

| Committed Projects, FY 2020-2023 | | | | |
|----------------------------------|---------------------------------|---|---|--|
| Year | Operating Agency / Jurisdiction | Name | Limits | Description |
| 2022 | Baltimore County | Mohrs Lane bridge | Bridge over CSX Railroad | Reconstruct bridge closed in 2011 (also accommodates future Campbell Boulevard). |
| 2022 | MDOT SHA Howard County | MD 32, Sykesville Road | Linden Church Rd to I-70 | Widen from 2 to 4 lanes and upgrade interchange at I-70. Construct new full interchanges at MD 144, Dayton Shop Road, and Rosemary Lane. |
| 2022 | MDOT SHA Howard County | MD 175 interchange | At Blandair Park access road | New interchange and new road into Blandair Park. |
| 2022 | MDOT SHA Howard County | U.S. 29 / Broken Land Parkway interchange | 3.1 miles of new ramps and new roadways | New direct connections from westbound U.S. 29 / Broken Land Parkway interchange ramp to new road (Merriweather Drive) and to Little Patuxent Parkway. Direct connection from Merriweather Drive to Broken Land Parkway, including configuring north and southbound U.S. 29 ramps at Broken Land Parkway into signalized intersection. Remove existing ramp from Broken Land Parkway to U.S. 29 southbound. |
| 2023 | MDOT SHA Baltimore County | I-695 | I-70 to MD 43 | Add 1 lane in each direction during a.m and p.m. peak using inside shoulder (western and northern portion of I-695). |
| 2023 | Harford County | Bata Boulevard Access Road | MD 543 to Bata Boulevard | Construct 2-lane access road from MD 543 directly to Bata Boulevard (700 feet). |
| 2023 | Howard County | Dorsey Run Road (middle section) | CSX Railroad to MD 175 | Widen from 2 to 4 lanes. |
| 2023 | Howard County | Guilford Road | Dorsey Run Road to U.S. 1 | Widen from 2 to 4 lanes. |
| 2023 | Howard County | Snowden River Parkway Phase 1 | Broken Land Parkway to Oakland Mills Road | Widen from 4 to 6 lanes. |

Illustrative Projects

Federal regulations for metropolitan transportation planning identify the concept of “illustrative projects” as an element of the planning process. These are projects included in a metropolitan transportation plan for illustrative purposes, meaning that they could be included in the adopted transportation plan if additional funds beyond the reasonably anticipated financial resources identified in the plan were to become available.

There is no requirement to select any project from an illustrative list of projects in a metropolitan plan at some future date, when funding might become available. Nonetheless, illustrative projects can be helpful in guiding transportation and land use planning efforts at both the regional and local levels because they provide a resource from which the BRTB can select regional priorities should additional funding become available.

The table below shows the list of illustrative projects for the Baltimore region.

| Illustrative Projects – Could be amended into <i>Maximize2045</i> should future funds become available | | | | |
|--|------------------------|---|--|----------------------|
| Operating Agency / Jurisdiction | Name | Limits / Length | Description | Estimated Cost (YOE) |
| MDTA Anne Arundel County | Bay Bridge | MD 2 to U.S. 50 / U.S. 301 split 21.0 Miles | Construct a third span of the Chesapeake Bay Bridge and widen approach roadways. | not available |
| Harford County | Perryman West (Road B) | U.S. 40 at Mitchell Lane to Canning House Road 2.0 miles | Construct new 2-lane road and bridge over Cranberry Run in Perryman, including turn lanes and bicycle and pedestrian access. | \$50,000,000 |
| MDOT SHA Harford County | MD 715 Extended | U.S. 40 / present terminus to MD 22 3.0 miles | Construct new 4-lane road, including bicycle and pedestrian access. | \$127,000,000 |
| MDOT SHA Harford County | U.S. 1 | Baltimore County line to MD 152 1.4 miles | Add travel lane in each direction (i.e., widen from 4 to 6 lanes). Includes turn lanes and bicycle and pedestrian access where applicable. | \$31,000,000 |

Illustrative Projects – Could be amended into *Maximize2045* should future funds become available

| Operating Agency / Jurisdiction | Name | Limits / Length | Description | Estimated Cost (YOE) |
|---------------------------------|---|--|--|----------------------|
| Howard County | Bus Rapid Transit to Odenton MARC station | Downtown Columbia Odenton MARC station 17 miles | BRT line with potential stations at Stevens Forest Road, Snowden River Parkway, Columbia Gateway, Jessup, and Savage, including shuttle services. Route would use Broken Land Parkway, CSX right of way, and MD 32. | not available |
| MDOT SHA Howard County | U.S. 29 Widening | MD 100 to I-70 3.2 miles | Widen from 6 to 8 lanes. Construct a consistent highway cross-section capable of accommodating U.S. 29 peak period traffic. | \$684,000,000 |
| MDTA Queen Anne's County | Chesapeake Bay Crossing, Phase II NEPA | Selected bay crossing location | Conduct Phase II NEPA study on selected bay crossing location. Phase I NEPA is to be completed in 2020 and Phase II NEPA will evaluate potential impacts of selected location. Phase II NEPA is vital to moving forward with adding additional capacity to cross the Chesapeake Bay. | \$25,000,000 |