

Approved: May 18, 2023

(TIP)

Amended: Dec. 12, 2023



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Harrisonburg-Rockingham Metropolitan Planning Organization

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Non-Voting Members

Rusty Harrington, Virginia Department of Aviation

Kevin Jones, Federal Highway Administration

Michele DeAngelis, Federal Transit Administration

Bill Yates, James Madison University

Valerie Kramer, James Madison University



Plan Documentation

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Title:

FY 2024-2027 Transportation Improvement Program (TIP)

Staff:

Ann Cundy, Director of Transportation, HRMPO Ansley Heller, Transportation Planner, HRMPO

Disclaimer

The Harrisonburg-Rockingham Metropolitan Planning Organization (HRMPO) Transportation Improvement Program (TIP) has been prepared in accordance with federal regulations 49 U.S.C. § 5303(j) and 23 CFR 450.326, and the Virginia Association of Metropolitan Planning Organizations TIP Development Guidelines; and in partnership with the City of Harrisonburg and the County of Rockingham (member jurisdictions), the Virginia Department of Transportation (VDOT), the Virginia Department of Rail and Public Transportation (DRPT), the Federal Highway Administration (FHWA), and the Federal Transit Administration (FTA). The contents of this report reflect the views of the HRMPO, which are responsible for the accuracy of the information and data presented herein.

Self-Certification

Submission of the HRMPO TIP fulfils the federal self-certification requirements set forth by <u>23 CFR 450.336</u>, confirming the HRMPO's metropolitan transportation planning process is conducted in accord with all applicable federal and state regulations.



Non-Discrimination Statement

The HRMPO ensures non-discrimination and equal employment in all programs and activities in accordance with Title VI and Title VII of the Civil Rights Act of 1964. If you have questions or concerns about your civil rights regarding this document, or if you need special assistance for persons with disabilities or limited English proficiency, please contact the HRMPO. For more information, or to obtain a Title VI Complaint Form, see http://hrvampo.org/public-participation-title-vi or call (540) 885-5174.





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RESOLUTION APPROVING THE FISCAL YEARS 2024-2027 HARRISONBURG-ROCKINGHAM METROPOLITAN PLANNING ORGANIZATION TRANSPORTATION IMPROVEMENT PROGRAM (TIP)

WHEREAS, the Harrisonburg-Rockingham Metropolitan Planning Organization (HRMPO) is the designated regional transportation planning organization, and has the responsibility for developing and carrying out a continuing, cooperative, and comprehensive transportation planning process for the Metropolitan Planning Area; and

WHEREAS, the Transportation Improvement Program (TIP) is required by the Federal Highway Administration (FHWA) and the Federal Transit Administration (FTA) as a basis and condition for all federal funding assistance to state, local, and regional agencies for transportation improvements; and

WHEREAS, the Virginia Department of Transportation (VDOT), the Virginia Department of Rail and Public Transportation (DRPT), the City of Harrisonburg, County of Rockingham, and the Towns of Bridgewater, Dayton, and Mount Crawford, have reviewed the Fiscal Years 2024-2027 (FY 2024-FY 2027) TIP; and

WHEREAS, the projects identified in the FY 2024-FY2027 TIP are financially constrained and the TIP financial plan affirms that the funding identified in the TIP is available; and

WHEREAS, the FY 2024-FY 2027 HRMPO TIP is required for Virginia's State Transportation Improvement Program (STIP) development process; and

WHEREAS, public participation has been sought and considered in accordance with the HRMPO's Public Participation Plan;

NOW, THEREFORE BE IT RESOLVED that the HRMPO Policy Board does hereby approve the FY 2024-2027 TIP on this 18th day of May 2023.

SIGNED:

ATTEST:

Rick Chandler, Chairman Harrisonburg-Rockingham

Metropolitan Planning Organization

Bonnie Riedesel, Administrator Harrisonburg-Rockingham Metropolitan Planning Organization



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Introduction

Purpose of this Document

Federal regulations [49 U.S.C. § 5303(j) and 23 CFR 450.326] require that all Metropolitan Planning Areas develop and maintain a Transportation Improvement Program (TIP) to coordinate regional transportation planning, maximize resources, provide transparency in the investment of federal transportation funds, and make progress towards achieving state and regional performance targets. Additionally, federal regulations require the TIP to be compatible with the HRMPO's Long-Range Transportation Plan (LRTP), the State's TIP (VDOT's Six-Year Improvement Program), the State's Transportation Improvement Plan (STIP), and that it be updated a minimum of every 4-years. This TIP identifies the investment plans for Highway and Transit which are provided in the **TIP Financial Plan** on page 7.

Public Participation

Public participation is vital in the TIP development process to ensure that transportation projects being advanced address needs identified by the community. Federal regulations require the HRMPO to develop, implement, and maintain a <u>Public Participation Plan</u> (PPP) to provide a transparent and open planning process. The PPP identifies the various methods and ways the HRMPO works to ensure that the public is properly notified of its activities, and that opportunities to participate in the HRMPO's short- and long-range planning activities are available to all residents. The TIP is updated and amended according to the procedures provided in the PPP.

The Harrisonburg Department of Public Transportation uses the Transportation Improvement Program (TIP) development process of the Harrisonburg-Rockingham Metropolitan Planning Organization (HRMPO) to satisfy the public hearing requirements of 49 U.S.C. Section 5307(b). The TIP public notice of public involvement activities and time established for public review and comment on the TIP satisfies the program-of-projects requirements of the Urbanized Area Formula Program.



About the HRMPO

Established in 2003, the HRMPO, is the federally designated agency responsible for leading transportation planning efforts for the City of Harrisonburg, the urbanized areas of Rockingham County, including the Towns of Bridgewater, Dayton, and Mt. Crawford. **Map 1** shows the HRMPO planning area boundary.

As the regional transportation planning agency, the HRMPO provides its members and partners an impartial venue to ensure that regional transportation planning and decision making are conducted transparently using the 3-C Planning Process. The 3-C Planning Process enables the HRMPO to collaborate with its members and partners to develop a comprehensive picture of the region in its effort to identify potential issues, prioritize needs, provide solutions, identify funding opportunities, and make decisions to support, maintain and improve the region's transportation network.

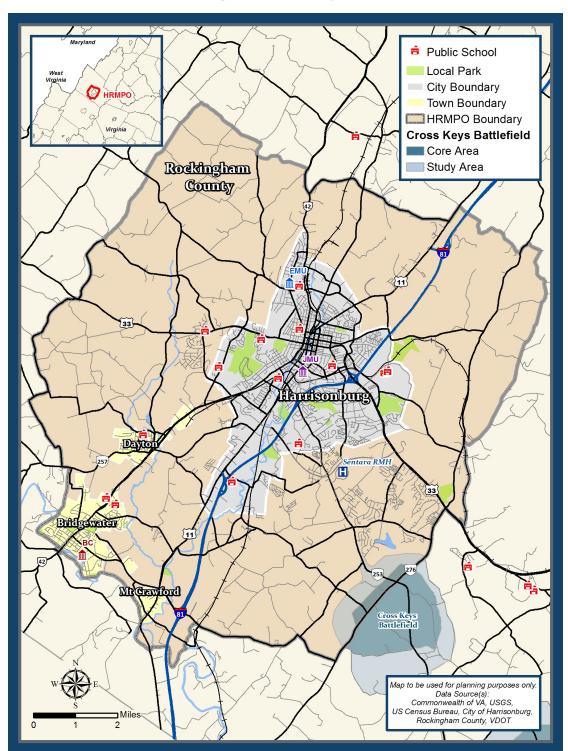
HRMPO Policy Board

The HRMPO's governing body is its Policy Board. The Policy Board leads the HRMPO transportation decision making process in the HRMPO region to ensure all possible solutions are examined and interests are addressed; decisions are made by following established MPO policies are in accord with federal and state regulations. The Policy Board is supported by HRMPO staff, with guidance and technical assistance provided by the HRMPO Technical Advisory Committee (TAC)

Technical Advisory Committee (TAC)

The TAC is comprised of staff from the HRMPO's member jurisdictions, the Harrisonburg Department of Public Transportation (HDPT), and state and federal agencies. Through the TAC, member agencies and partners can collaborate and coordinate transportation planning efforts, and inform the Policy Board's decision-making process. With its members' knowledge of the region's transportation network and local transportation and transit needs, the TAC assists the HRMPO in establishing regional transportation priorities and identify regional and local needs.





Map 1 HRMPO Planning Area



The HRMPO TIP

The HRMPO TIP is the region's fiscally constrained four-year program of all transportation and transit projects programmed in the HRMPO region that:

- Are scheduled to receive federal transportation funds
- Require a federal action; or
- Are deemed regionally significant

Projects using only local or state funds are typically not included in the TIP unless they require a federal action or are considered regionally significant. The list of transportation and transit projects programmed in the HRMPO can be found in the TIP Highway & Transit Financial Plans of this document.

Consistency With Other State and Regional Planning Documents

Federal regulations require the TIP to be consistent with other federal, state, and regional transportation planning documents. These documents include the Statewide Transportation Improvement Program (STIP), and Six Year Improvement Program (SYIP), and the HRMPO LRTP.

Upon approval by the HRMPO Policy Board, the HRMPO TIP is submitted to VDOT and DRPT for approval and inclusion into the STIP, which is then forwarded to the FHA and FTA for federal approval.

TIP Development

The TIP is developed in accordance with <u>23 CFR 450.326</u>, the Virginia Association of MPOs (VAMPO) TIP Development Guidelines, and in partnership with member agencies, stakeholders, VDOT, DRPT, FHWA and FTA, from projects in the HRMPO's Constrained Long Range Plan (CLRP), VTrans, and from member agency comprehensive plans. The TIP is updated at least every four years.

TIP Financial Plans

Highway Financial Plan

The TIP Highway Financial Plan lists all transportation projects programmed in the HRMPO region during the TIP 4-year life-cycle. The Financial Plan provides a project's details including the type of project to be implemented, its phase, scope, obligated funding source(s), project cost(s), and delivery schedule.

Transit Financial Plan

The Transit Financial Plan is developed by the HRMPO in partnership with the Harrisonburg Department of Public Transportation (HDPT), regional human mobility service providers (FTA Section 5310 program applicants), and DRPT. It identifies all transit projects programmed for implementation during the 4-year life cycle of the TIP. Project details shown in the Transit Financial Plan include a project's cost(s), funding allocation(s), funding source(s) and anticipated future funding.



Grouped Projects

Projects in the TIP that are determined not to be regionally significant, or are considered by VDOT or DRPT not to be of an appropriate scale to be individually programmed are listed in grouped categories. Listing these projects in grouped categories provides programming flexibility and reduces the administrative process. Grouped category lists may be identified by function, work type, or geographic area per 23 CFR 771.117(c) and (d) and 40 CFR part 93. A grouped project list shows the total sum of funding obligated for the grouped category rather than individual project descriptions and obligated funding. Grouped project listings are provided in both financial plans.

Amendments & Modifications

The TIP is periodically amended to add new projects or modify an existing project's scope, cost, and/or schedule when requested by VDOT, DRPT, or the project sponsor. TIP amendments and modifications for the Highway and Transit Financial Plans are in **Appendices A and B** of this document. Amendments and administrative modifications are defined below per 23 CFR Section 450.104:

Amendments are considered when a revision to a TIP involves a major change to an existing project programmed during the document's life cycle. Major changes may include the addition or deletion of a project, or a major change to a project's cost, scope, or schedule (e.g., adding new funds to a project, changing a project's termini or revising the start and/or delivery date). Amendments require a public notice that includes a review and comment period. Once the review and comment period are complete the amendment is presented to the HRMPO Policy Board, VDOT/DRPT, FHWA/FTA for approval. Any change to a TIP's financial plan(s) must continue to demonstrate fiscal constraint.

Transit-FTA Project/Phase Cost Increase Thresholds for Amendments

Approved STIP Total Estimated Project Cost	Estimate Increase Requiring Amendment
Up to \$2,000,000	>100%
>\$2,000,000 to \$10,000,000	>50%
>\$10,000,000	>25%

Highway-FHWA Project/Phase Cost Increase Thresholds for Amendments

Approved STIP Total Estimated Project Cost	Estimate Increase Requiring Amendment
Up to \$2,000,000	>100%
>\$2,000,000 to \$10,000,000	>50%
>\$10,000,000 to \$20,000,000	>25%
>\$20,000,000 to \$35,000,000	>15%
>\$35,000,000	>10%

Administrative Modifications are considered to be **minor revisions** to a TIP. This includes minor changes to an existing project's programmed phase, costs, funding source(s), and minor changes to a project's schedule/delivery date. An administrative modification only requires a staff-level review. Administrative modifications do not require a public notice of the change, public comment period, or re-demonstration of fiscal constrain.



Amendments or modifications the HRMPO TIP are made according to the amendment policy found in Section 4.3 of the HRMPO PPP.

Performance Management Requirements

The HRMPO is dedicated to improving the region's transportation network by working with its member agencies, VDOT, DRPT, FHWA, and FTA to implement regional performance measures that support and advance regional, state, and national transportation performance goals.

The FHWA defines <u>Transportation Performance Management</u> as a "strategic approach that uses system information to make investment and policy decisions to achieve national performance goals." With the passage of Moving Ahead for Progress in the 21st Century (MAP-21) in 2012 the and the subsequent Fixing America's Surface Transportation (FAST) Act in 2016, the FHWA and FTA mandated that States and MPOs establish performance measures to integrate system-performance management into the transportation and transit planning process. In order to guide the integration of system performance measures into the planning process the FHWA and FTA identified the following seven national performance measures:

- Safety
- Infrastructure Condition
- Congestion Reduction
- System Reliability
- Freight Movement & Economic Vitality
- Environmental Sustainability
- Reduced Project Delivery Delay

Advancing the seven national performance goals ensures that transportation networks continue to develop and operate in a safe and efficient manner. Implementation of these measures in the HRMPO region ensures that transportation investments advance federal performance objectives, and that the HRMPO TIP is consistent with statewide planning documents.

The performance measures and implementation schedule provided in **Appendix D** satisfy the requirements of 23 CFR 450.218(q). HRMPO concurred with the state's safety targets on February 1, 2023. Performance measures and implementation schedule for Transit Asset Management (TAM) can be found in **Appendix E.** Performance measures and their revisions are to be incorporated into the TIP via the administrative modification process as they are advanced by VDOT and DRPT and approved by the HRMPO Policy Board.



The TIP Financial Plan

MAP-21 requires a financial plan be provided in the TIP (23 CFR 450.324(h)). The Financial Plan must demonstrate how the projects programmed can be implemented with existing obligations. TIP projects identified must be consistent with the HRMPO Long-Range Transportation Plan, and must be fully funded to the extent of available funding obligations or funding that is reasonably expected to be available.

The HRMPO and its partners have collaborated to develop financial forecasts for the Highway and Transit TIP based on the latest official planning assumptions, available or assumed revenue(s), and estimated project cost(s). The financial information provided is either project specific, or listed by a grouped funding category. All projects listed in the TIP are expected to be implemented during the four-year life cycle of the document. The TIP Financial Plan may contain projects that show \$0.00 for planned obligations if the project is complete at the time of adoption and awaiting final closeout.



TIP Financial Plan – Highway

Interstate Projects

UI	PC NO	116280	SCOPE Reconstruction v			/ Added Capacity	
SY	YSTEM	Interstate	JURISDICTION	Harris	onburg	OVERSIGHT	
PR	ROJECT	#I81CIP NB	& SB MM 242 TO 2	48, 3-LANE WIDENI	NG (ID #62)	ADMIN BY	VDOT
DESC	CRIPTION		FF	ROM: MM 242.0 TO:	MM 248.8 (6.8600 N	ΛI)	
ROUT	E/STREET		00	81		TOTAL COST	\$320,016,035
	FUN	ID SOURCE	MATCH	FY24	FY25	FY26	FY27
RW AC	Federa	al - AC OTHER	\$0	\$0	\$10,270,000	\$0	\$0

UF	PC NO	117220	SCOPE	Safety			
SY	YSTEM	Interstate	JURISDICTION	State	ewide	OVERSIGHT	NFO
PR	ROJECT	#ITTF21 I-81	OPERATIONAL IMP	PROVEMENTS - PR	OGRAM UPC	ADMIN BY	VDOT
DESC	CRIPTION			FROM: Variou	us TO: Various		
ROUT	E/STREET		00	81		TOTAL COST	\$9,618,000
	FUN	ID SOURCE	MATCH	FY24	FY25	FY26	FY27
PE	Federa	- NHS/NHPP \$0 \$118,206 \$0				\$0	\$0
PE AC	Federa	al - AC OTHER	\$0	\$9,499,794	\$0	\$0	\$0

UF	PC NO	115869	SCOPE	Safety			
SY	YSTEM	Interstate	JURISDICTION	State	ewide	OVERSIGHT	NFO
PR	ROJECT	#ITTF20	STATEWIDE TECH	NOLOGY FOR OPE	RATIONS	ADMIN BY	VDOT
DESC	CRIPTION			FROM: Variou	us TO: Various		
ROUT	E/STREET		99	99		TOTAL COST	\$2,000,000
	FUN	ID SOURCE	MATCH	FY24	FY25	FY26	FY27
PE	Federa	al - NHS/NHPP	- NHS/NHPP \$0 \$913,491 \$0				\$0
PE AC	Federa	al - AC OTHER	\$0	\$1,086,509	\$0	\$0	\$0



Primary Projects

UPC NO 108810			SCOPE	Reconstruction w/ A	Added Canacity		
SYSTE		Primary	JURISDICTION	Rockingham Count		OVERSIGHT	
				, and the second	•		
PROJE	CT	#HB2.FY17 Route	11 S. Valley Pike Ro	adway Improvement	S	ADMIN BY	VDOT
DESC	RIPTION	FROM: INT. ROUT	E 704 TO: 0.005 MIL	ES NORTH INT. RO	OUTE 701 (1.2850 M	I)	
PROG	RAM NOTE	\$1,038,439 GARVE	9 GARVEE Debt Ser E Debt Service Princ vice Principal FFY27 97	cipal FFY25, \$1,102,	891 GARVEE Debt S	Service Principal FF\	/26, \$1,153,288
ROUTE	E/STREET	SOUTH VALLEY P	IKE (0011)			TOTAL COST	\$20,125,738
	FUND SOL	IRCE	MATCH	FY24	FY25	FY26	FY27
PE	Federal - S	TP/STBG	\$0	\$496,991	\$0	\$0	\$0
RW	Federal - A	C CONVERSION	\$0	\$0	\$1,038,439	\$1,102,891	\$1,153,288
	Federal - S	TP/STBG	\$0	\$325,550	\$0	\$0	\$0
RW TO	OTAL		\$0	\$325,550	\$1,038,439	\$1,102,891	\$1,153,288
RW AC			\$0	\$6,302,548	\$0	\$0	\$0
CN AC			\$0	\$9,620,046	\$0	\$0	\$0
Federal - AC OTHER		\$0	\$1,336,654	\$0	\$0	\$0	
CN AC	;		\$0	\$10,956,700	\$0	\$0	\$0

UPC N	0	110397	SCOPE				
SYSTE	М	Primary	JURISDICTION	Rockingham County	у	OVERSIGHT	NFO
PROJE	CT	#HB2.FY17 Rt 11 S	Valley Pk Rdwy Imp	orove GARVEE DEB	T SERVICE	ADMIN BY	VDOT
DESCR	RIPTION						
PROGE	RAM NOTE	GARVEE Debt Service Interest FF	vice Interest FFY25,	\$644,817 GARVEE RVEE Debt Service	566,052 FFY24 GAF Debt Service Interes Interest FFY28-39. T	t FFY26, \$594,122 G	SARVEE Debt
ROUTE	STREET	0011				TOTAL COST	\$11,504,259
	FUND SOL	IRCE	MATCH	FY24	FY25	FY26	FY27
PE	Federal - A	C CONVERSION	\$0	\$0	\$678,357	\$644,817	\$594,122
Federal - STP/STBG			\$0	\$566,052	\$0	\$0	\$0
PE TO	TAL		\$0	\$566,052	\$678,357	\$644,817	\$594,122
PE AC	Federal - A	С	\$0	\$4,973,836	\$0	\$0	\$0

UPC NO	121202	SCOPE	Restoration and Rehabilitation				
SYSTEM	Primary	JURISDICTION	Bridgewater OVERSIGHT NFO				
PROJECT	#SGR23LP BRIDG	EWATER NORTH N	MAIN ST. PRIMARY EXT. PAVE. ADMIN BY Locally				
DESCRIPTION	FROM: North Main	ROM: North Main Street TO: North Main Street (0.8460 MI)					



ROUTE	STREET	NORTH MAIN STR	EET (0257)	TOTAL COST	\$206,282		
	FUND SOU	IRCE	MATCH	FY24	FY25	FY26	FY27
PE AC	Federal - A	C OTHER	\$0	\$2,000	\$0	\$0	\$0
CN AC	Federal - A	C OTHER	\$0	\$0	\$204,282	\$0	\$0

UPC N	0	120968	SCOPE	Resurfacing			
SYSTE	ΞM	Primary	JURISDICTION	Staunton District-wi	de	OVERSIGHT	NFO
PROJE	СТ	#SGR23VP District	Wide Plant Mix Sch	edule (PM-8H-23)		ADMIN BY	VDOT
DESCF	RIPTION	FROM: VARIOUS 1	O: VARIOUS (5.850	00 MI)			
ROUTE	STREET	9999				TOTAL COST	\$1,487,863
	FUND SOL	JRCE	RCE MATCH FY24 FY25				FY27
CN AC	Federal - A	C OTHER	\$0	\$1,487,863	\$0	\$0	\$0

Miscellaneous Projects

UPC N	0	119654	SCOPE	Traffic Management/Engineering			
SYSTE	M	Miscellaneous	JURISDICTION	Statewide		OVERSIGHT	NFO
PROJE	СТ	#I81CIP PARALLEI	FACILITIES IMPRO	OVEMENTS O&M F	Y 21-27	ADMIN BY	VDOT
DESCF	RIPTION	FROM: State Line v	vith Tennessee TO:	State Line with West	Virginia		
ROUTE	STREET	ARTERIALS ADJAN	NCET TO INTERSTA	ATE 81 (0081)		TOTAL COST	\$479,805
	FUND SOL	JRCE	MATCH	FY24	FY25	FY26	FY27
CN AC	Federal - A	C OTHER	\$0	\$479,805	\$0	\$0	\$0

UPC N	0		SCOPE						
SYSTE	М		JURISDICTION			OVERSIGHT			
PROJE	CT					ADMIN BY			
DESCF	RIPTION		Convert one driving lane of US-11 to a two-way separated bicycle facility between the intersections of Main St. and Noll Dr., and Grattan St. and Liberty St., and construct a shared-use path along Main St. between Grattan St. and MLK Jr. Nav.						
ROUTE	STREET	US-11 (Liberty Stre	et and Noll Drive)			TOTAL COST			
	FUND SOL	IRCE	MATCH	FY24	FY25	FY26	FY27		
CN AC	RAISE GRA	ANT	\$0	\$	\$0	\$0	\$0		



Harrisonburg MPO Project Groupings

GROUP	GROUPING Construction : Bridge Rehabilitation/Replacement/Reconstruction						
ROUTE/STREET						TOTAL COST	\$66,047,163
	FUND SOU	IRCE	MATCH	FY24	FY25	FY26	FY27
PE	Federal - S	TP/STBG	\$130,000	\$520,000	\$0	\$0	\$0
CN	Federal - STP/STBG		\$122,289	\$489,156	\$0	\$0	\$0
CN AC	Federal - A	C OTHER	\$0	\$6,891,281	\$0	\$0	\$0

GROU	PING	Construction : Safe	ty/ITS/Operational In	nprovements			
ROUTI	E/STREET					TOTAL COST	\$88,335,225
	FUND SOL	JRCE	MATCH	FY24	FY25	FY26	FY27
PE	Federal - A	C CONVERSION	\$42,209	\$181,643	\$192,837	\$2,400	\$0
	Federal - T	AP/F	\$13,222	\$52,886	\$0	\$0	\$0
PE TO	TAL		\$55,430	\$234,529	\$192,837	\$2,400	\$0
RW	Federal - A	C CONVERSION	\$369,964	\$202,682	\$1,277,173	\$0	\$0
	Federal - S	TP/STBG	\$229,696	\$1,620,844	\$0	\$0	\$0
	Federal - T	AP/F	\$17,099	\$67,597	\$800	\$0	\$0
RW TO	RW TOTAL		\$616,759	\$1,891,123	\$1,277,973	\$0	\$0
RW AC	Federal - A	C OTHER	\$0	\$2,049,757	\$0	\$0	\$0
CN	Federal - A	C CONVERSION	\$280,000	\$0	\$1,120,000	\$0	\$0
	Federal - N	HS/NHPP	\$58,974	\$235,896	\$0	\$0	\$0
	Federal - S	TP/STBG	\$1,290,144	\$4,012,699	\$1,147,878	\$0	\$0
	Federal - T	AP/F	\$225,048	\$0	\$228,092	\$672,098	\$0
CN TC	CN TOTAL		\$1,854,166	\$4,248,595	\$2,495,970	\$672,098	\$0
CN AC	Federal - AC OTHER		\$0	\$6,762,165	\$7,059,194	\$109,964	\$0

GROUPING Construction : Transportation Alternatives/Byway/Non-Traditional								
ROUTE/STREET					TOTAL COST		\$2,264,339	
	FUND SOU	RCE	MATCH	FY24	FY25	FY26	FY27	
CN	Federal - T	AP/F	\$69,384	\$277,535	\$0	\$0		\$0
CN AC	Federal - AC OTHER		\$0	\$87,979	\$0	\$0		\$0

GROUP	PING	Maintenance : Preventive Maintenance and System Preservation							
PROGRAM NOTE Funding identified to be obligated districtwide as projects are identified.									
ROUTE	E/STREET					TOTAL COST	\$90,996,464		
	FUND SOURCE		MATCH	FY24	FY25	FY26	FY27		
CN	Federal - S	TP/STBG	\$0	\$22,608,309	\$22,701,124	\$22,795,517	\$22,891,514		



GROUP	PING	Maintenance : Prev	entive Maintenance	for Bridges			
PROGI	RAM NOTE	Funding identified to	o be obligated distric	twide as projects are	e identified.		
ROUTE/STREET						TOTAL COST	\$29,779,836
	FUND SOL	IRCE	MATCH	FY24	FY25	FY26	FY27
CN	Federal - N	HS/NHPP	\$0	\$755,556	\$755,556	\$755,556	\$755,556
	Federal - S	TP/STBG	\$0	\$6,648,943	\$6,675,613	\$6,702,736	\$6,730,320
CN TOTAL			\$0	\$7,404,499	\$7,431,169	\$7,458,292	\$7,485,876

GROUP	GROUPING Maintenance : Traffic and Safety Operations										
PROGRAM NOTE Funding identified to be obligated districtwide as projects are identified.											
ROUTE	STREET								COST		\$12,358,669
	FUND SOURCE		MATCH	FY24		FY25		FY26		FY27	
CN	Federal - STP/STBG		\$0		\$3,070,544		\$3,083,149	;	\$3,095,969		\$3,109,007



Appendix A

Projects by Grouping

Harrisonburg MPO

Construction : Bridge Rehabilitation/Replacement/Reconstruction

	System	UPC Jurisdic	ction / Name / Description	Street(Route)	Estimate				
Miscellaneous	T19030 Staunton	District-wide	0000		\$0				
	BRIDGE	REHABILITAION/RE	EPLACEMENT						
Primary	115718 Harrisonb		MARKET STREE	ET (0033)	\$8,152,727				
	#SMART	20 US 33 (MARKET	STREET) AND I-81 IMPRO	VEMENTS					
	FROM: 0	FROM: 0.346 Mi. West of Interstate 81 TO: 0.277 Mi. East of Interstate 81 (0.6220 MI)							
Primary	100781 Rockingh	am County	0033		\$17,232,405				
	#SGR17\	SGR17VB - RT. 33 Repl Bridges over NSRR (Fed ID 20446 & 20447)							
	FROM: 0	.500 Mi. West of Inte	st of Interstate 81 (0.3080 MI)						
Primary	104177 Rockingh	am County	EAST MARKET	STREET (0033)	\$13,712,583				
	#SGR18\	/B - Rte 33 over I-81	Exit 247 Impr EBL; Str. No.	20443					
	FROM: 0	.192 Mi. West of Inte	erstate 81 TO: 0.381 Mi. Eas	t of Interstate 81 (0.5730 MI)					
Primary	113487 Rockingh	am County	EAST MARKET	STREET (0033)	\$12,032,214				
	#SGR19\	#SGR19VB - RTE 33 OVER I-81 EXIT 247 IMPR WBL (STR. NO. 20441)							
	FROM: 0	.192 Mi. West of Inte	erstate 81 TO: 0.381 Mi. Eas	t of Interstate 81 (0.5730 MI)					
Secondary	13285 Rockingh	am County	0682		\$6,433,484				
	#SGR17\	/B - RT 682 Bridge a	and Approaches over Pleasa	ant Run					
	FROM: 0	.241 Miles West of F	Route 867 TO: 0.156 Miles E	ast of Route 867 (0.3970 MI)					
Secondary	97112 Rockingh	am County	SMITHLAND RO	PAD (0720)	\$8,483,750				
	#SGR17\	/B - Br Replacemen	(Fed ID 20408 Smithland R	Rd / I-81)					
	FROM: 0	.055 Miles South of I	-81 TO: 0.052 Miles North o	of I-81 (0.0500 MI)					
Construction : Bric	lge Rehabilitation/Rep	blacement/Reconstru	ction Total		\$66,047,163				



Construction: Safety/ITS/Operational Improvements

	Syster	m UPC Jurisdiction / Name / Description Street(Route)	Estimate
Enhancement	121208 E	Bridgewater	\$480,211
	F	RIVERWALK PHASE III ENHANCEMENT	
	ı	FROM: Riverwalk TO: Trail System (0.2500 MI)	
Enhancement	121206 I	Harrisonburg	\$385,875
	1	NORTHEND GREENWAY BROOKSIDE PHASE TAP	
	ı	FROM: Shared Use TO: Pathway (0.1900 MI)	
Enhancement	121207 I	Harrisonburg	\$609,916
	(COUNTRY CLUB RD. SIDEWALK - SRTS ENHANCEMENT	
	I	FROM: Safe Routes TO: To Schools (0.1800 MI)	
Interstate	108809 I	Harrisonburg I-81 NB OFF RAMP EXIT 245 (0081)	\$3,468,889
	#	#HB2.FY17 I-81 Exit 245 NB Off Ramp Realignment	
	ı	FROM: I-81 NB Exit 245 Off Ramp Gore TO: Intersection of Rte. 253 (0.2120 MI)	
Interstate	111230 I	Harrisonburg 0081	\$7,489,060
	7	#SMART18 - (St) I-81 EXIT 247 INTERCHANGE IMPROVEMENTS	
	ı	FROM: 0.147 Mi. South of Interstate 81 TO: 0.008 Mi. South of Interstate 81 (0.1390 MI)	
Interstate	116039	Statewide 0081	\$9,407,380
	;	#I81CIP DMS INSTALLATION	
		FROM: Various TO: Various	
Interstate	117790	Statewide 0081	\$382,000
	;	#ITTF21 STUDY OF ADVANCED TECHNOLOGIES -I-81	
		FROM: various TO: various	
Interstate	118791	Rockingham County 9999	\$1,140,251
	;	#SGR21VP Harrisonburg Residency Plant Mix (PM-8V-21)	
		FROM: MM 240.5 TO: MM 239.6 (0.9100 MI)	
Interstate	110551	Statewide 9999	\$307,192
		TRAFFIC VIDEO EXPANSION (PSAP) - STATEWIDE	
		FROM: Various TO: Various	
Interstate	110912	Statewide 9999	\$813,019
		Statewide Truck Parking Management System - Phase 1	
		FROM: Various TO: Various	
Interstate	111613	Statewide 9999	\$1,807,000
		STATEWIDE TRUCK PARKING MANAGEMENT SYSTEM - PHASE 2	
		FROM: Various TO: Various	
Interstate	115854	Statewide 9999	\$0
	;	#ITTF20 ARTERIAL OPERATIONS PROGRAM DASHBOARD	
		FROM: n/a TO: n/a	



Interstate	115856	Statewide 9999	\$1,950,000
		#ITTF20 PARKING DEMAND MANAGEMENT SYSTEM	
		FROM: Various TO: Various	
Interstate	119197	Statewide 9999	\$1,500,000
		#ITTF22 OSPREY FIBER CONNECTIONS - STATEWIDE	
		FROM: Various TO: Various	
Interstate	119198	Statewide 9999	\$25,040
		#ITTF22 HIGH SPEED COMMUNICATIONS FOR SIGNALS (PHASE II)	
		FROM: Various TO: Varioyus	
Interstate	119199	Statewide 9999	\$500,000
		#ITTF22 STUDY FOR SMARTER LIGHTING INITIATIVE STATEWIDE	
		FROM: Various TO: Various	
Interstate	119332	Statewide 9999	\$300,000
		#ITTF22 DATA-DRIVEN MGMT PROGRAM FOR PAVEMENT MARKING	
		FROM: Various TO: Various	
Interstate	119379	Statewide 9999	\$0
		#ITTF22 CONNECTED WORK ZONES PROGRAM STATEWIDE	
		FROM: Various TO: Various	
Interstate	119401	Statewide 9999	\$250,000
		#ITTF22 PROJECT EVALUATIONS STATEWIDE	
		FROM: Various TO: Various	
Interstate	119402	Statewide 9999	\$1,030,000
		#ITTF22 INCIDENT RESPONSE OPTIMIZATION -STATEWIDE	
		FROM: Various TO: Various	
Interstate	119404	Statewide 9999	\$1,000,000
		#ITTF22 GUIDE LIGHTS FOR SPEED MANAGEMENT STATEWIDE	
		FROM: various TO: various	
Interstate	119406	Statewide 9999	\$0
		#ITTF22 AUTOMATED SPEED ENFORCEMENT PILOT STATEWIDE	
		FROM: Various TO: Various	
Interstate	121564	Statewide 9999	\$350,000
		#ITTF23 LEVERAGING CONNECTED CAR DATA FOR IMPROVED SAFETY	
		FROM: Various TO: Various	
Interstate	121654	Statewide 9999	\$1,000,000
		#ITTF23 OPERATIONALIZE TRAFFIC OPERATIONS SUPPORT CENTER	
		FROM: Various TO: Various	
Interstate		Statewide 9999	\$500,000
		#ITTF23 IMPLEMENT AI-BASED INTEGRATED SECURITY PREDICTION	•
		FROM: Various TO: Various	



Interstate	121666	Statewide 9999	\$500,000
		#ITTF23 ITTF PROJECT EVALUATIONS	
		FROM: Various TO: Various	
Interstate	121667	Statewide 9999	\$3,575,000
		#ITTF23 RM3P DEP Data Services	
		FROM: Various TO: Various	
Interstate	121668	Statewide 9999	\$1,000,000
		#ITTF23 REAL-TIME INFORMATION DISSEMINATION FOR CMVs	
		FROM: Various TO: Various	
Interstate	121670	Statewide 9999	\$500,000
		#ITTF23 ADVANCED ROAD WEATHER INFORMATION SYSTEMS STUDY	
		FROM: VARIOUS TO: VARIOUS	
Interstate	121712	Statewide 9999	\$650,000
		NETWORK OPERATIONS CENTER IMPLEMENTATION	
		FROM: Various TO: Various	
Interstate	121776	Statewide 9999	\$1,000,000
		HARD SHOULDER RUNNING FEASIBILITY STUDY-Technology component	
		FROM: Various TO: Various	
Interstate	121822	Statewide 9999	\$5,000,000
		#ITTF23 STATEWIDE FIBER NETWORK ENHANCEMENTS	
		FROM: Various TO: Various	
Interstate	122048	Statewide VARIOUS (9999)	\$500,000
		#ITTF23 - RM3P EVALUATION	
		FROM: various TO: various	
Miscellaneous	T19027	Staunton District-wide 0000	\$0
		CN: SAFETY/ITS/OPERATIONAL/IMPROVEMENTS	
Miscellaneous	116505	Staunton District-wide 0000	\$416,090
		SAFETY PRESCOPING - STAUNTON	
		FROM: STAUNTON DISTRICT WIDE TO: VARIOUS	
Miscellaneous	121643	Statewide 9999	\$1,000,000
		#ITTF23 SMART INTERSECTIONS DEPLOYMENT SUPPORT	
		FROM: Various TO: Various	
Primary	119645	Harrisonburg SOUTH MAIN STREET (0011)	\$2,661,287
		#SMART22 - S. MAIN SAFET IMPROVEMENTS	
		FROM: S. Mosby Road TO: Erickson Ave. (0.2700 MI)	
Primary	119647	Harrisonburg LEE JACKSON HIGHWAY (0011)	\$5,731,024
		#SMART22 - S. MAIN & I-81 EXIT 243 INTERCHANGE IMPROVEMENTS	
		FROM: Intersection of I-81 Exit 243 Ramps TO: And Route 11 (0.2500 MI)	
Primary		Harrisonburg MAIN STREET (0011)	\$2,512,305
-		#SMART22 - N. MAIN STREET SIDEWALK	. ,
		FROM: Holly Hill Dr TO: Vine Street (0.3600 MI)	



Primary	111053	Rockingham County SOUTH VALLEY PIKE (0011)	\$3,475,108
-		#SMART18 - (St) RTE 11 & 704 INTERSECTION REALIGNMENT	
		FROM: Int. Route 11 NBL TO: 0.247 Mi. E. Int. Route 11 NBL (0.2470 MI)	
Primary	115132	Rockingham County NORTH VALLEY PIKE (0011)	\$3,037,558
		#SMART20 US 11 N(North Valley Pike) Sidewalk	
		FROM: Int. Mt. Clinton Pike TO: Int. Jewell Street (1.0500 MI)	
Primary	115719	Rockingham County SPOTSWOOD TRAIL (0033)	\$977,984
		#SMART20 US 33 & ROUTE 620 TURN LANES	
		FROM: 0.08 Mi. W. of Indian Trail Rd. TO: 0.07 Mi. N. of Route 33 (0.1500 MI)	
Primary	119652	Harrisonburg PORT REPUBLIC ROAD (0253)	\$4,101,619
		#SMART22 - PORT REPUBLIC ROAD CORRIDOR IMPROVEMENTS	
		FROM: Devon Lane TO: Hunter Road (0.2100 MI)	
Primary	119662	Harrisonburg PORT REPUBLIC ROAD (0253)	\$2,924,946
		#SMART22 - PORT REPUBLIC ROAD TURN LANE AND SIDEWALK	
		FROM: Bluestone Drive TO: Crawford Ave. (0.1000 MI)	
Public Transportation	119648	Rockingham County FRIEDENS CHURCH ROAD (0257)	\$3,045,897
		#SMART22 - MOUNT CRAWFORD PARK AND RIDE LOT IMPROVEMENTS	
		FROM: Park And Ride TO: Lot Improvements	
Secondary	111052	Rockingham County FRIEDENS CHURCH ROAD (0682)	\$1,839,639
		#SMART18 - (St) RTE 682 FRIEDENS CHURCH RD INTERSECTION	
		FROM: 0.09 Mi. W. Int. Rte. 988 TO: 0.08 Mi. E. Int. Rte. 988 (0.1700 MI)	
Secondary	119653	Rockingham County SMITHLAND ROAD (0720)	\$3,556,131
		#SMART22 - SMITHLAND ROAD SHOULDER WIDENING	
		FROM: Harrisonburg City Limits TO: Route 11 (0.6410 MI)	
Urban	80488	Bridgewater 0042	\$2,119,526
		RTE 42 - IMPROVE RTE. 42 (MAIN STREET) IN BRIDGEWATER	
		FROM: 0.331 Miles S of Int. of Old River Rd TO: 0.094 Miles N of Int. of Old River Rd (0.4250 MI)	
Urban	115139	Harrisonburg EVELYN BYRD AVE	\$3,515,278
		#SMART20 University Blvd/Evelyn Byrd Ave Rd Diet & Sidewalk	
		FROM: Int of E Market St TO: Int of Reservoir St (2.2000 MI)	
Construction : Safe	ety/ITS/Ope	erational Improvements Total	\$88,335,225



Harrisonburg MPO

Construction: Transportation Alternatives/Byway/Non-Traditional

	Syst	em	UPC Jurisdiction / I	Name / Description	Street(Route)	Estimate		
Enhancement	113896	Bridgewater		0700		\$298,666		
		Gen-Oak Conne	ctor - Bridgewater					
		FROM: North Li	perty Street TO: Nac	omi Lane (0.3000 MI)				
Enhancement	107517	Rockingham Co	unty	JOHN WAYLAND I	HWY (EN15)	\$748,502		
		Rte. 42 Bicycle	Pedestrian / Buggy	Lanes				
		FROM: Eberly F	d (Rt 732) TO: 0.1 I	Miles N of Int of Garbers	Church Rd (Rt 910) (1.3300 MI)			
Enhancement	113685	Harrisonburg		PARK ROAD (EN1	8)	\$110,033		
		PARK ROAD P						
		FROM: EMU Science Building on Park Road TO: Park Road at W. Dogwood Drive (0.2500 MI)						
Enhancement	116859	Bridgewater		EN20		\$326,525		
		RIVERWALK P	HASE 2					
		FROM: Sidewal	calong TO: West Ba	ank Street (0.1800 MI)				
Enhancement	116860	Harrisonburg		FEDERAL STREET	T (EN20)	\$539,974		
		FEDERAL STR	EET PATH, BLOCK	2				
		FROM: Convert	on of a TO: 2-way	Street (0.2500 MI)				
Miscellaneous	T19019	Staunton Distric	-wide	0000		\$0		
		CN: TRANSPO	RTATION ENHANCE	EMENT/BYWAY/OTHER	R NON-TRADITIONAL			
Urban	113894	Bridgewater		MAIN STREET (00	42)	\$240,639		
		Main Street Ped	estrian Safety Impro	ovement - Bridgewater				
		FROM: East Riv	erside Drive TO: Tu	rner Ashby Drive (1.600	0 MI)			
Construction : Tran	nsportation	Alternatives/Byw	ay/Non-Traditional T	Total		\$2,264,339		

Maintenance: Preventive Maintenance and System Preservation

	System	UPC Jurisdicti	on / Name / Description	Street(Route)	Estimate
Interstate	120970 Staunton	District-wide	9999		
	#SGR23	VP District Wide Plant	Mix Schedule (PM-8M-23)		
	FROM: \	/ARIOUS TO: VARIOU	IS (3.0700 MI)		
Interstate	120971 Staunton	District-wide	9999		
	#SGR23	VP District Wide Plant	Mix Schedule (PM-8N-23)		
	FROM: \	/ARIOUS TO: VARIOU	IS (5.2300 MI)		
Miscellaneous	T14725 Staunton	District-wide	0000		\$90,996,464
	STIP-MN	Staunton: Preventive	MN and System Preservation	on	
Maintanana - Dav	ventive Maintenance	and System Preservat	ion Total		\$90,996,464



Maintenance: Preventive Maintenance for Bridges

	System	UPC Jurisdiction / Name / Description	Street(Route)	Estimate
Miscellaneous	T14724 Staunton	District-wide 0000		\$29,779,836
	STIP-MN	Staunton: Preventive MN for Bridges		
Maintenance : Pre	ventive Maintenance f	or Bridges Total		\$29,779,836
Maintenance :	: Traffic and Safe	ety Operations		
Maintenance	System	UPC Jurisdiction / Name / Description	Street(Route)	Estimate
Maintenance :		UPC Jurisdiction / Name / Description	Street(Route)	Estimate \$12,358,669
	System T14723 Staunton	UPC Jurisdiction / Name / Description	Street(Route)	
Miscellaneous	System T14723 Staunton	UPC Jurisdiction / Name / Description District-wide 0000 Staunton: Traffic and Safety Operations	Street(Route)	



TABLE C: Harrisonburg MPO

FEDERAL FUNDING CATEGORIES FISCAL CONSTRAINT BY YEAR

Highway Projects FFY 2024 - 2027

	FFY:	2024	FFY:	2025	FFY:	2026	FFY	2027	TO	TAL
Fund Source	Projected Obligation Authority	Planned Obligation								
Federal	ederal ederal									
NHS/NHPP	\$235,896	\$235,896	\$0	\$0	\$0	\$0	\$0	\$0	\$235,896	\$235,896
STP/STBG	\$8,031,292	\$8,031,292	\$1,147,878	\$1,147,878	\$0	\$0	\$0	\$0	\$9,179,170	\$9,179,170
TAP	\$398,018	\$398,018	\$228,892	\$228,892	\$672,098	\$672,098	\$0	\$0	\$1,299,008	\$1,299,008
Subtotal Federal	\$8,665,206	\$8,665,206	\$1,376,770	\$1,376,770	\$672,098	\$672,098	\$0	\$0	\$10,714,074	\$10,714,074
Other										
State Match	\$1,643,637	\$1,643,637	\$344,192	\$344,192	\$168,025	\$168,025	\$0	\$0	\$2,155,854	\$2,155,854
Subtotal Other	\$1,643,637	\$1,643,637	\$344,192	\$344,192	\$168,025	\$168,025	\$0	\$0	\$2,155,854	\$2,155,854
Total	\$10,308,843	\$10,308,843	\$1,720,962	\$1,720,962	\$840,123	\$840,123	\$0	\$0	\$12,869,928	\$12,869,928
Federal - ACC (1)										
HSIP	\$181,643	\$181,643	\$192,837	\$192,837	\$0	\$0	\$0	\$0	\$374,480	\$374,480
NHS/NHPP	\$0	\$0	\$0	\$0	\$2,400	\$2,400	\$0	\$0	\$2,400	\$2,400
STP/STBG	\$202,682	\$202,682	\$4,113,969	\$4,113,969	\$1,747,708	\$1,747,708	\$1,747,410	\$1,747,410	\$7,811,769	\$7,811,769
Subtotal Federal - ACC (1)	\$384,325	\$384,325	\$4,306,806	\$4,306,806	\$1,750,108	\$1,750,108	\$1,747,410	\$1,747,410	\$8,188,649	\$8,188,649
Statewide and/or Multiple MPO -	Federal (3)									
NHS/NHPP	\$1,031,697	\$1,031,697	\$0	\$0	\$0	\$0	\$0	\$0	\$1,031,697	\$1,031,697
Subtotal Statewide and/or Multiple MPO - Federal (3)	\$1,031,697	\$1,031,697	\$0	\$0	\$0	\$0	\$0	\$0	\$1,031,697	\$1,031,697
Maintenance - Federal (4)	Maintenance - Federal (4)									
NHS/NHPP	\$755,556	\$755,556	\$755,556	\$755,556	\$755,556	\$755,556	\$755,556	\$755,556	\$3,022,224	\$3,022,224
STP/STBG	\$32,327,796	\$32,327,796	\$32,459,886	\$32,459,886	\$32,594,222	\$32,594,222	\$32,730,841	\$32,730,841	\$130,112,745	\$130,112,745
Subtotal Maintenance - Federal (4)	\$33,083,352	\$33,083,352	\$33,215,442	\$33,215,442	\$33,349,778	\$33,349,778	\$33,486,397	\$33,486,397	\$133,134,969	\$133,134,969

- (1) ACC -- Advance Construction -- Funding included in Federal Category based on year of AC Conversion
- CMAQ/RSTP includes funds for TRANSIT projects
- (3) Statewide and/or Multiple MPO Federal Funding to be obligated in Multiple MPO Regions and/or Statewide for projects as identified.
- (4) Maintenance Projects Funding to be obligated for maintenance projects as identified

End of Highway TIP Financial Plan



TIP Financial Plan - Transit

Federal legislation 49 U.S.C. 5303 requires Metropolitan Planning Organizations (MPOs) to develop a Transportation Improvement Program (TIP) covering a period of at least four years. The TIP must be developed in coordination with the state and public transit providers.

Transit in the Harrisonburg-Rockingham region is funded with a mix Federal, State, and local funds, which include local jurisdictions and private partners.



112 MacTanly Place

Staunton, VA 24401

VIRGINIA DEPARTMENT OF RAIL AND PUBLIC TRANSPORTATION STATEWIDE TRANSPORTATION IMPROVEMENT PROGRAM TRANSIT COSTS (in \$1,000)

Previ	ous Funding	FY 2024	FY 2025	FY 2026	FY 2027	Total FY 2	024-2027
HARRISONBL	JRG-ROCKIN	GHAM METROP	OLITAN PLANN	ING ORGAN	IZATION	•	
TIP ID:	HAR0001	Title: Operating	Assistance	Recipient:	Harrisonburg Bus Service	1	
FTA 5307	2,802	2,452	2,797	2,881	2,968	FTA 5307	11,098
State	1,477	1,567	1,614	1,662	1,764	State	6,607
Local	253	1,055	1,293	1,332	1,372	Local	5,052
Revenues	2,225	2,243	2,360	2,431	2,504	Revenues	9,538
Year Total:	6,757	7,317	8,064	8,306	8,608	Total Funds:	32,295
Description:	Operating fu minimizing b	nds supports Stat reakdowns, optim	ewide TAM Plan iizing transit opei	and PTASP rations.	targets by keeping assets in s	tate of good r	epair,
TIP ID:	HAR0004	Title: Replaceme Stock		Recipient:	Harrisonburg Bus Service		
FTA 5307	1,120	192	2,100	1,772	192	FTA 5307	4,256
State	2,720	38	420	354	38	State	850
Local	160	10	105	89	10	Local	214
Year Total:	4,000	240	2,625	2,215	240	Total Funds:	5,320
Description:	Capital fundi			replacing ass	ets that have met their useful	life.	
TIP ID:	HAR0011	Title: Purchase : Equipment	Shop	Recipient:	Harrisonburg Bus Service		
FTA 5307		44				FTA 5307	44
State		9				State	9
Local		2				Local	2
Year Total:		55				Total Funds:	55
Description:	Purchase two	o (2) Shop Lifts T	ransit Cost \$55,2	258.			
TIP ID:	HAR0015	Title: ITS or Mis	c. Equip	Recipient:	Harrisonburg Bus Service	ı	
FTA 5307		160			160	FTA 5307	160
State		32			32	State	32
Local		8			8	Local	8
Year Total:		200			200	Total Funds:	200



Description:							
TIP ID:	HAR0018	Title: Purchase	Radios	Recipient:	Harrisonburg Bus Service		
III ID.		Titic. I dionasc	Radios	recipient.	Oel vice	1	
FTA 5307				12		FTA 5307	12
State				2		State	2
Local				1		Local	1
Year Total:				15		Total Funds:	15
Description:	Five (5) Rad drivers.	ios. Supports Sta	tewide PTASP	Targets by imp	proving communications between	en dispatch a	and
TIP ID:	ARA0001	Title: Paratransi	t Vehicles	Recipient:	ARC of Harrisonburg/Rockingha m		
FTA 5310	58	50				FTA 5310	50
Local	15	12				Local	12
Year Total:	73	62				Total Funds:	62
Description:		(1) additional para It with TAMS targe		will help to mai	ntain the percentage of vehicl	es within their	ULB to
TIP ID:	PLV0001	Title: Paratrans	it Vehicles	Recipient:	Pleasant View, Inc.		
FTA 5310	88	72				FTA 5310	72
Local	22	18				Local	18
Year Total:	110	90			-	Total Funds:	90
Description:		(1) additional par It with TAMS targe		e will help to ma	aintain the percentage of vehic	cles within the	ir ULB to



VIRGINIA DEPARTMENT OF RAIL AND PUBLIC TRANSPORTATION STATEWIDE TRANSPORTATION IMPROVEMENT PROGRAM VIRGINIA DEPARTMENT OF RAIL AND PUBLIC TRANSPORTATION STATEWIDE TRANSPORTATION IMPROVEMENT PROGRAM TRANSIT COSTS (in \$1,000)

Harrisonburg Bus Service	Previous Funding	FY 2024	FY 2025	FY 2026	FY 2027	Total FY 20	24-2027
FTA 5307	4,518	47,010	4,897	4,665	4,551	FTA 5307	61,123
State	5,252	10,478	2,034	2,018	2,080	State	16,610
Local	482	3,284	1,398	1,422	1,451	Local	7,555
Revenues	2,225	2,243	2,360	2,431	2,504	Revenues	9,538
Totals	12,477	63,015	10,689	10,536	10,586		94,826
	,	,	, , ,	,	,	Revenues	

Human Service Transportation Providers	Previous Funding	FY 2024	FY 2025	FY 2026	FY 2027	Total FY 20	24-2027
FTA 5310	254	122				FTA 5310	122
Local	64	30				Local	30
Totals	318	152					152

Harrisonburg MPO	Previous Funding	FY 2024	FY 2025	FY 2026	FY 2027	Total FY 20	24-2027
FTA 5307	4,518	47,010	4,897	4,665	4,551	FTA 5307	61,123
FTA 5310	254	122				FTA 5310	122
State	5,252	10,478	2,034	2,018	2,080	State	16,610
Local	546	3,314	1,398	1,422	1,451	Local	7,585
Revenues	2,225	2,243	2,360	2,431	2,504	Revenues	9,538
Totals	12,795	63,167	10,689	10,536	10,586		94,978

End of Transit Tip Financial Plan



Appendix A: Highway TIP Amendments and Administrative Modifications

December 7th, 2023 Amendment

Harrisonburg MPO

Primary Projects

UPC NO)	108810	SCOPE	Reconstruction w/ Added Capacity			
SYSTE	M	Primary	JURISDICTION	Rockingham County		OVERSIGHT	NFO
PROJE	СТ	#HB2.FY17 Route 11	S. Valley Pike Roady	vay Improvements		ADMIN BY	VDOT
DESCRIPTION FROM: INT. ROUTE 704 TO: 0.005 MILES NORTH INT. ROUTE 701 (1.2850 MI)					·		
PROGRAM NOTE TIP AMD - add \$105 phase; add \$325,55 release \$43,551 ()A Other) & \$3,567,173 Debt Service Princip			(HSIP) FFY24 CN pha al FFY24, \$842,394 G GARVEE Debt Service	elease \$325,550 (STP) i, release \$28,601 (AC ase. Includes \$2,043, ARVEE Debt Service	/STBG) FFY24, releas CC-STP/STBG) FFY27 949 GARVEE Debt Sc Principal FFY25, \$1,0	se \$301,420 (ACC-ST 7 RW phase; add an a ervice Principal Prev, 5 59,340 GARVEE Deb	P/STBG) FFY25, iddit'l \$2,000,000 (AC- \$391,615 GARVEE
ROUTE	/STREET	SOUTH VALLEY PIK	Œ (0011)			TOTAL COST	\$25,692,911
	FUND SOUR	RCE	MATCH	FY24	FY25	FY26	FY27
PE	Federal - AC	CONVERSION	\$0	\$0	\$105,375	\$0	\$0
	Federal - ST	P/STBG	\$0	\$391,616	\$0	\$0	\$0
PE TOT	AL		\$0	\$391,616	\$105,375	\$0	\$0
PE AC	Federal - AC	;		\$105,375	\$0	\$0	\$0
RW	Federal - AC	CONVERSION	\$0	\$0	\$737,019	\$1,059,340	\$1,124,687
RW AC	Federal - AC		\$0	\$6,628,098	\$0	\$0	\$0
CN	Federal - HS	IP	\$0	\$3,567,173	\$0	\$0	\$0
CN AC	Federal - AC	;	\$0	\$9,620,046	\$0	\$0	\$0
	Federal - AC	OTHER	\$0	\$3,336,654	\$0	\$0	
CN AC			\$0	\$12,956,700	\$0	\$0	\$0

Federal funds include the use of soft match supported by approved toll credits unless otherwise indicated and/or matching funds are shown in the "Match" column. Non-federal fund sources are as noted in the "Program Note" and shown in the "Match" column, when applicable.



Appendix B: Transit TIP Amendments and Administrative Modifications



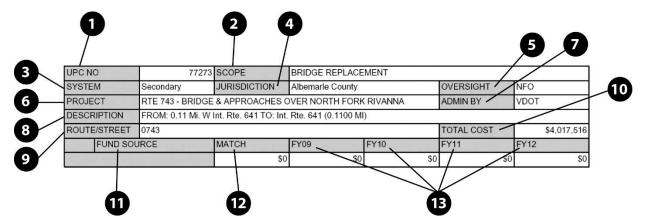
Appendix C: Resource Guide

Highway TIP User's Guide

This guide assists the reader in understanding project information for all projects in the Highway TIP. Information for each project appears in the chart format shown below.

Terms used to identify specific programming requirements are presented in the grey boxes, while project-specific details are presented in the white boxes to the right of, or below, each term. Definitions for the numbered terms appear in the corresponding **Glossary of Terms** table.

Figure 1: TIP Programming Table



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Glossary of Terms

Gloss	sary of Terms	
ID	Term	Definition
1	Universal Project Code (UPC) Number	Number assigned to each project at its conception, remaining with the project until completion.
2	Scope	Details work to be covered by the project
3	System	Indicates which system, program, or mode of transportation the project falls within. E.g Interstate, Primary, Secondary, Urban, Rail, Transportation Enhancements, or Miscellaneous
4	Jurisdiction	Identifies the project jurisdiction
5	Federal Oversight Indicator (FO or NFO)	FO: Indicates Federal Oversight in the project construction, contracting, and management. NFO: Indicates No Federal Oversight in the construction, contracting, and management issues, and does not affect the standard environmental review process for transportation projects. All federally funded transportation projects must include the required environmental documents regardless of whether there is federal oversight required
6	Project/Project Phase	Name of the Project and Phase (i.e. PE: Preliminary Engineering - Preliminary field survey, utility location, environmental or historical studies, design drawings, final field inspections and public hearings will be done. This process can take several months to years to complete; RW: Right of Way - Negotiations with property owners take place, payments are made, and arrangements with utility companies are finalized to obtain the land necessary for the project; or CN: Construction - Project is advertised to prospective contractors for bids. Once the bids are opened and a contract awarded, construction can begin.)
7	Admin By	Identifies the entity responsible for the project
8	Description	Identifies the project's limits
9	Route/Street	Identifies local Route number or name of road/street
10	Total Cost	The total estimated cost (TO) reflecting the best overall estimate available at the time. Estimated costs begin as rough estimates, usually based on historical data, and are updated at critical stages (e.g. the final field inspection), as plans are more defined.
11	Fund Source	Identifies the FHWA or FTA funding source. Additional funding source information is provided in Appendix C
12	Match	Dollar amount matched to federally funded project. Most federal fund sources require a match of some sort; most often 20% of the total cost. The match is included in the obligations section for informational purposes. The match can come from local, state or other sources
13	Current and Future Obligations	The amount of funding which is obligated for the indicated phase of work. An obligation represents a commitment from the Federal government to reimburse the state for the Federal share (e.g. 80%) of a project's eligible cost. This commitment occurs when the project is approved and the Federal government executes the project agreement. The funding obligation listed is the dollar amount that a state may spend and expect reimbursement for during each Federal fiscal year.



Highway Funding Programs

Accelerated Incentive Deployment (AID):

The <u>AID Demonstration program</u> provides funding as an incentive for eligible entities to accelerate the implementation and adoption of innovation in highway transportation. The AID Demonstration program is one initiative under the multi-faceted Technology and Innovation Deployment Program (TIDP) approach providing funding and other resources to offset the risk of trying an innovation. The new <u>Notice of Funding Opportunity (NOFO)</u> was published on September 1, 2016, continuing the AID Demonstration program under the <u>Fixing America's Surface Transportation (FAST) Act</u> (Pub. L. No. 114-94).

Bridge Rehabilitation and Replacement/Bridge Off-System Funds Program (BR/BROS):

A former SAFETEA-LU program that provided funding for bridge improvements. Eligibility for funding was based on a rating of bridge condition by VDOT as a candidate for upgrading.

Interstate Maintenance (IM):

A former SAFETEA-LU program that provided funding for resurfacing, restoring, rehabilitating and reconstructing (4R) most routes on the National System of Interstate and Defense Highways.

National Highway Performance Program (NHPP)

MAP-21 eliminated the programs with dedicated funding for repair by consolidating the Interstate Maintenance and Highway Bridge Repair programs and shifting these funds to the new NHPP. The new NHPP is now the largest highway program, receiving 58 percent of all highway formula dollars. MAP-21 dramatically expanded the funding for the NHPP program (previously called the National Highway System program) and consolidates the other programs intended for bridge repair and Interstate maintenance.

Only projects located on the National Highway System (NHS) are eligible, which was expanded to include an additional 60,000 new lane miles and bridges. If a state fails to meet minimum Interstate pavement condition standards, they must set aside an additional amount of NHPP funds until the standard is met. If the total structurally deficient deck area of NHS bridges exceeds 10 percent of all NHS bridge deck area, then a state must set aside NHPP funds to the Highway Bridge Program until the standard is met. VDOT has consolidated funds into customized pots of money for the State of Good Repair (SGR) program, which seeks to meet the State's interstate and bridge repair needs.

Non-Federal:

Any funding that does not come from federal sources is grouped into the nonfederal funding category.

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Surface Transportation Program (STP):

Under the former SAFETEA-LU and MAP-21 eras, this program provided flexible funding that could be used on any project located on a roadway that is classified higher than a minor collector. Projects that were eligible for funding under this program included construction, reconstruction, and rehabilitation, and bridge projects on any public road. Regional STP funds were designated as RSTP, and Local STP funds were designated as LSTP.



Surface Transportation Block Grant Program (STBG):

The FAST Act converts the long-standing Surface Transportation Program into the Surface Transportation *Block Grant* Program acknowledging that this program has the most flexible eligibilities among all Federal-aid highway programs and aligning the program's name with how FHWA has historically administered it. [FAST Act § 1109(a)]. The STBG promotes flexibility in State and local transportation decisions and provides flexible funding to best address State and local transportation needs.

VDOT has consolidated its STBG funds (after set asides for TA and planning/research) and National Highway Performance Program (NHPP) funds into customized pots of money for SMART SCALE, State of Good Repair (SGR), and other programs.

Safe Routes to School Program (SRTS):

This is a competitive grant program to enable and encourage children to safely walk and bicycle to school. Funds can be used for infrastructure improvements and educational programs.

Transportation Alternatives Program (TAP):

These funds are available for bicycle and pedestrian facilities through the Surface Transportation Program of MAP 21. A 10% set aside from each state's allocation of STP funds must be used for Transportation Enhancement activities.

Transit Funding Programs (FTA)

FTA 5307:

This is the FTA Urbanized Area Formula Program, Section 5307 provides funds for public transportation capital investments, and operating expenses in urbanized areas (UZAs). Pursuant to the FAST Act, job access and reverse commute projects that are located in urbanized areas are now eligible for funding under this program.

FTA 5310:

This program is intended to enhance mobility for seniors and persons with disabilities by providing funds for programs to serve the special needs of transit-dependent populations beyond traditional public transportation services and Americans with Disabilities Act (ADA) complementary paratransit services. Under the FAST Act, projects that were formerly eligible for funding under SAFETEA-LU's New Freedom, Section 5317 grant program are now eligible for Section 5310 funds.

FTA 5311:

The FTA 5311 program is a non-urbanized area formula funding program for public transit capital and operating costs in non-urbanized areas with a population fewer than 50,000 as designated by the United States Census Bureau. Job access and reverse commute projects, which are located in non-urbanized areas, are now eligible for these funds under the FAST Act.

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May 18, 2023

FY 2024-2027 Transportation Improvement Program (TIP)

FTA 5339:

This program provides capital funding to replace, rehabilitate and purchase buses and related equipment and to construct bus-related facilities. Created under the FAST Act, this program replaces components of SAFETEA-LU's former Section 5309 Bus and Bus Facilities program.



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Appendix D: Highway Performance Based Planning

Performance Measure Implementation Schedule



Implementation Timeline

Final Rule	Effective Date	States Set Targets By	MPOs Set Targets By	LRSTP, MTP, STIP and TIP Inclusion
Safety Performance Measures (PM1)	April 14, 2016	Aug. 31, 2017	Up to 180 days after the State sets targets, but not later than Feb. 27, 2018	Updates or amendments on or after May 27, 2018
Pavement/ Bridge Performance Measures (PM2)	May 20, 2017	May 20, 2018	No later than 180 days after the State(s) sets targets	Updates or amendments on or after May 20, 2019
System Performance Measures (PM3)	May 20, 2017	May 20, 2018	No later than 180 days after the State(s) sets targets	Updates or amendments on or after May 20, 2019



Performance Measures

In accordance with the requirements of MAP-21 and the FAST Act, Virginia has established safety performance objectives as published in Virginia's 2017 – 2021 Strategic Highway Safety Plan (SHSP), and starting in 2017, annual targets in the Highway Safety Improvement Program (HSIP) Annual Report. The SHSP performance measure objectives are indicated in Table 1 below.

Table 1: 2017 - 2021 SHSP Safety Performance Objectives

	Performance Target	Reduction Per Year
--	--------------------	--------------------



1	Number of Fatalities	2%
2	Rate of Fatalities per 100-Million Vehicle Miles Traveled	3%
3	Number of Serious Injuries	5%
4	Rate Serious Injury Million Vehicle Miles Traveled	7%
5	Number of Non-Motorized Fatalities & Non-Motorized Serious Injuries	1%

For safety performance measures 1, 2 and 3, annual targets are developed collaboratively by the Department of Motor Vehicles (DMV) Highway Safety Office (HSO) and VDOT HSIP staff. The DMV HSO includes these measures in their Highway Traffic Safety Administration (NHTSA) every June.

The Commonwealth Transportation Board (CTB) approves all five annual targets and VDOT includes these in the HISP Annual Report submitted to FHWA each August. Within 180 days of VDOT's annual report submission to FHWA, MPOs must indicate their support of the state targets or submit their own regional targets for one or more of the safety measures.

Connection to Other Performance Based Planning Documents

The federally required SHSP, a five-year multi-agency comprehensive plan focused on reducing fatalities and serious injuries on all public roads serves as the coordinating document for other plans and programs that involve traffic safety. This coordination involves the long-range statewide transportation plan (LRSTP), the metropolitan transportation plans (MTP), and three plans that implement parts of the SHSP- the Highway Safety Plan (HSP), and the Commercial Vehicle Safety Plan (CVSP). This integration is important for improving overall safety coordination amongst various partners and leads to more comprehensive transportation safety planning.

The LRSTP, VTrans 2040, guides the state's investment decisions for transportation improvements. Safety and performance management is included in the VTrans 2040 Vision, Goals & Objectives, and Guiding Principles:

- **Guiding Principle 2**: Ensure Safety, Security, and Resiliency Provide a transportation system that is safe for all users, responds immediately to short-term shocks such as weather events or security emergencies, and adapts effectively to long-term stressors such as sea level rise.
- Guiding Principle 5: Ensure Transparency and Accountability and Promote Performance
 Management work openly with partners and engage stakeholders in project development and
 implementation; and establish performance targets that consider the needs of all communities, measure
 progress towards targets, and to adjust programs and policies as necessary to achieve the established
 targets.
- Goal C: Safety of All Users Provide a safe transportation system for passengers and goods on all travel mode.

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Objectives:

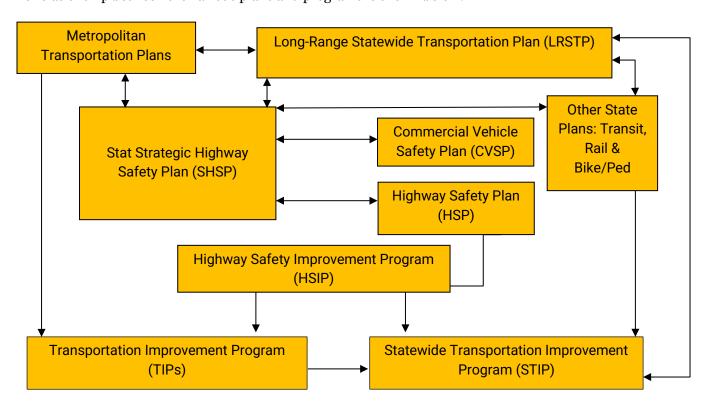


- Reduce the number and rate of motorized fatalities and serious injuries.
- Reduce the number of non-motorized fatalities and injuries.

MTPs are similar to the LRSTP, however an MTP covers a specific metropolitan planning area. MTPs include goas and objectives for their respective areas/regions and identify strategies for advancing long-term transportation investments in a specific region.

The HSIP is an annual plan to address highway user behaviors that will improve safety through education and enforcement campaigns. The HSP and associated NHTSA grant are administered through the DMV's HSO.

Furthermore, each year the Virginia State Police (VSP) submits a Commercial Vehicles Safety Plan (CVSP) to the Federal Motor Carrier Safety Administration as a requirement of obtaining related enforcement grants. The relationship between the various plans and programs is shown below:



Projects in the STIP are directly linked to the safety objectives outlined in the SHSP through the strategies and actions that are priorities in Virginia.



Funding for Safety Projects

Safety targeted improvements are implemented through HSIP projects. Each year Virginia is allocated \$55-Million for HSIP and \$5-Million for Railway Grade Crossing improvements. Virginia is also subject to a Penalty Transfer provision, Section 154 "Open Container", such that 2.5% of NHPP funds are reserved for either NHTSA Alcohol-Impaired Driving or HSIP projects. The State determines what proportion goes to each program. Of the HSIP funds, about 10 percent is set aside for non-motorized safety projects and 20 percent of the remainder for improvements on locally-maintained roadways.

How do Safety Projects get selected for Inclusion in the STIP?

The HSIP project planning and delivery follows these steps:

- Each year highway segment and intersection locations that have the highest potential for safety
 improvement are identified based on the previous five years of traffic crash and volume data. These above
 average crash locations are provided to the VDOT Districts to determine appropriate locations and
 countermeasures for HSIP funding. The potential for vehicle-train crashes at each at-grade railroad crossing
 is also distributed.
- HSIP project proposals are submitted through the SMART Portal for the appropriate safety program.
- VDOT and locality submitted HSIP proposals are reviewed and prioritized based on the number of targeted
 crashes and the benefit to cost ratio or the potential risk reduction for non-motorized and rail highway grade
 crossing improvements.
- Projects are selected and programmed for the last two or three years of the SYIP. At present there are over \$100 million of safety improvement proposals, with an expected benefit, that remain unfunded.

In recent years, programmed priority HSIP projects have shifted from being higher cost spot intersection and segment improvements to lower cost systemic improvements that target specific crash types and/or roadway characteristics that are factors in crashes across the network. Examples of systemic improvements include traffic signal devices and timing at intersections and curve signing, higher friction surfaces and rumble strips on segments.

Safety improvements are also included within projects funded with non-HSIP funds. The SMART SCALE scoring and prioritization process for inclusion of projects in the SYIP, considers safety benefits from improvements addressing travel of all modes. Many of the large SMART SCALE projects, upon completion, will have distinct impacts on safety performance in the Commonwealth. In addition, projects funded through other state and federal sources in the SYIP will also have crash reduction benefits that contribute to improved safety performance.

Thus, the funding to meet Virginia's safety objectives and targets is allocated to projects in the CTB approved SYIP and is consistent with VTrans 2040. Since the SYIP is the foundation for the STIP, the program of projects in the



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STIP demonstrates support to achieve Virginia's safety performance objectives and target and is consistent with Virginia's SHSP and the HSIP.



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Appendix E: Performance Based Planning and Programming for Transit Asset Management

The two most recent federal transportation laws, MAP-21 and FAST Act, establish performance measure requirements to ensure states and metropolitan planning organizations (MPOs) are investing transportation funds in projects that collectively will contribute towards the achievement of national goals. The USDOT recently published new rules for states and MPOs to collect data and establish performance targets that will support performance and outcome-based investment decisions.

The new federal performance measurement requirement for transit agencies focuses on one area: transit asset management (TAM). The measures look specifically at the percentage of revenue vehicles that have exceeded their Useful Life Benchmark (ULB), the percentage of non-revenue and service vehicles that have exceeded their ULB, and percentage of facilities with a condition below 3.0 on the Federal Transit Administrator's TERM Scale. All transit agencies receiving grants from the FTA are required to complete a TAM plan. The FTA has established two tiers of agencies based on size parameters.

A Tier I agency operates rail, OR has 101 vehicles or more all fixed route modes, OR has 101 vehicles or more in one non-fixed route mode. A Tier II agency is a subrecipient of FTA 5311 funds, OR is an American Indian Tribe, OR has 100 or less vehicles across all fixed route modes, OR has 100 vehicles or less in one non-fixed route mode.

The first completed TAM plan was submitted to the National Transit Database (NTD) by October 1, 2018. Other required deadlines are found in the table below.

Reporting Activity	Reporting Deadline	
Complete compliant TAM Plan	October 2018	
Report FY18 asset data to NTD Submit FY19 targets to NTD	October 2018	
Report FY19 asset data to NTD Submit FY20 targets to NTD Submit narrative report to NTD	October 2019	
Report FY20 asset data to NTD Submit FY21 targets to NTD Submit narrative report to NTD	October 2020	
Complete updated TAM Plan	October 2022	

Transit agency deadlines for TAM Rulemaking for June-July fiscal year



The Department of Rail and Public Transportation (DRPT) is the sponsor for the Statewide Tier II Group Plan. For Tier II providers under the DRPT Group Plan, any Transportation Improvement Program (TIP) document or Metropolitan Transportation Plan (MTP) adopted after October 1, 2018 will be in compliance with the TAM Plans developed by DRPT and adopted by the Tier II transit providers within the MPO as well as the regional performance measures adopted by the MPO as a whole.

The HRMPO programs federal transportation funds for the Harrisonburg Department of Public Transportation (HDPT). HDPT is a Tier II agency participating in the DRPT sponsored group TAM Plan. The MPO has integrated the goals measures and targets described in the <u>Federal Fiscal Year 2018 Group Transit Asset Management Plan and 2020 plan Addendum</u> into the MPO's planning and programming process specific targets for the Tier II Group

Table 3: TAM Targets for rolling stock and facilities: Percentage of Revenue Vehicles that have met or exceeded their ULB by Asset Type.

Asset Category - Performance Measure	Asset Class	2022 Target*
Revenue Vehicles		
	AB - Articulated Bus	5%
Age - % of revenue vehicles within	BU - Bus	15%
a particular asset class that have	CU - Cutaway	10%
met or exceeded their Useful Life	MB - Minibus	20%
Benchmark (ULB)	BR - Over-the-Road Bus	15%
	VN - Van	20%
Equipment		
Age - % of vehicles that have met	Non-Revenue/Service Automobile	30%
or exceeded their Useful Life Benchmark (ULB)	Trucks and other Rubber Tire Vehicles	30%
Facilities		
	Administrative Facility	10%
Condition - % of facilities with a	Maintenance Facility	10%
condition rating below 3.0 on the FTA TERM Scale	Parking Facility	10%
	Passenger Facilities	15%



Appendix F: Performance Based Planning and Programming for Pavements and Bridges

Performance Targets

In accordance with the requirements of MAP-21 and the FAST Act, Virginia has established pavement and bridge condition performance targets as reported in Virginia's Baseline Performance Period Report for 2022-2025¹. On September 21, 2022, Virginia's Office of Intermodal Planning and Investment (OIPI) established a new set of four-year statewide targets for condition of bridge decks and pavement and system performance measures, including travel time reliability. These targets were approved on the same day by the Commonwealth Transportation Board (CTB), and will be for January 1, 2022 through December 31, 2025.

This report, submitted to FHWA in October 2022, satisfies the federal requirement that State DOTs submit a Baseline Performance Period Report to FHWA by October 1st of the first year in a performance period. Performance measures for pavement condition are required for the National Highway System (NHS), while bridge condition requirements relate to structures identified as part of the National Bridge Inventory on the NHS.

The pavement condition measures and established performance targets for the 2022-2025 performance period are indicated in Table 1 below.

CY 2022-2023 CY 2022-2025 Two Year Target Four Year Target **Interstate Pavement Condition Measures²** Percentage of Pavements in Good Condition 45.0% 45.0% Percentage of Pavements in Poor Condition 3.0% 3.0% 2022-2023 2022-2025 Non-Interstate NHS Pavement Condition Measures³ Two Year Target Four Year Target Percentage of Non-Interstate Pavements in Good Condition 25.0% 25.0%

Table 1: Pavement Condition Measures and Performance Targets

Percentage of Non-Interstate Pavements in Poor Condition



5.0%

5.0%

¹ Virginia's Performance Period Report data is through December 2025.

² Interstate condition measures are based on four distresses: International Roughness Index (IRI), cracking, rutting, and faulting.

³During this first performance period, Federal requirements for Non-Interstate NHS pavement condition and performance targets are based on a single distress, IRI. However, Federal guidance outlined in a September 27, 2018 Memorandum on State DOT Targets for Non-Interstate NHS Pavement Measures allows for the use of full distress data when reporting Non-Interstate NHS performance targets. Given the availability of full distress data, Virginia has chosen this approach and reported performance targets for Non-Interstate NHS pavements based on all four distresses. This allows for consistency in assessing the condition and setting performance targets for both Interstate and Non-Interstate NHS pavements.

Bridge condition measures and established performance targets for the 2022-2025 performance period are indicated in Table 2 below.

Table 2: NHS Bridge Condition Measures and Performance Targets

	CY 2022-2023	CY 2022-2025
NHS Bridge Condition Measures	Two Year Target	Four Year Target
Percentage of Deck Area of NBI Bridges on the NHS in Good Condition	27.2%	25.1%
Percentage of Deck Area of NBI Bridges on the NHS in Poor Condition	3.3%	3.6%

Background/History

Virginia's history of monitoring asset conditions and utilizing performance information to determine investment strategies based on available funding levels spans over 10 years for pavements and bridges.

VDOT maintains a comprehensive inventory of all pavement and bridges on the state-maintained network. This inventory, which includes location, maintenance responsibility, ownership, and current condition or inspection information, serves as the foundation for life cycle planning, performance forecasting, maintenance and rehabilitation needs estimation, as well as prioritization of work to maximize asset life given available funding. Condition information is also important for communicating with external stakeholders, including the general public.

VDOT's commitment to responsible Transportation Asset Management (TAM) practice is demonstrated through VDOT's annual condition data collection programs and its establishment and publication of network level pavement and bridge performance goals. VDOT's current condition measures and performance goals have been in place for many years and are fully integrated into VDOT's budgeting process and investment strategies. The federal pavement and bridge performance measures apply to a limited portion of the network for which VDOT is responsible (less than 15% of all lane miles and 18% of the bridge inventory).

Connection to Other Performance Based Planning Documents

VTrans, the state's long-range multimodal plan, provides the overarching vision and goals for transportation in the Commonwealth. The long-range plan provides a vision for Virginia's future transportation system and defines goals, objectives, and guiding principles to achieve the vision. It also provides direction to state and regional transportation agencies on strategies and policies to be incorporated into their plans and programs. The most recent approved long-range multimodal plan is VTrans2040.



Performance management, specifically as it relates to pavements and bridges, is included in the VTrans2045Vision, Goals & Objectives, and Guiding Principles as noted below:

- Guiding Principle 5: Ensure Transparency and Accountability, and Promote Performance
 Management Work openly with partners and engage stakeholders in project development and
 implementation, and establish performance targets that consider the needs of all communities,
 measure progress towards targets, and to adjust programs and policies as necessary to achieve the
 established targets.
- Goal D: Proactive System Management maintain the transportation system in good condition and leverage technology to optimize existing and new infrastructure.
 - o Objectives:
 - Improve the condition of all bridges based on deck area.
 - Increase the lane miles of pavement in good or fair condition.

Virginia's federally required Transportation Asset Management Plan (TAMP) presents pavement and bridge inventory and conditions, along with the Commonwealth's performance objectives, measures, and associated risks as they relate to the federal requirements. Asset funding, investment strategies, forecasts, goals, and gaps are also included. The TAMP is specific to the NHS and provides the Commonwealth's Transportation Asset Management (TAM) processes and methodology to meet federal requirements. Pavement and bridge projects included in the STIP are consistent with Virginia's reported TAM processes and methodology. The program of projects in the STIP are directly linked to the pavement and bridge objectives outlined in VTrans2040 and the TAMP through the strategies and actions that are priorities in Virginia.

Funding for Pavement and Bridge Projects

There are two key funding sources for pavement and bridge projects, the Highway Maintenance and Operations Fund (HMOF) and State of Good Repair (SGR) program funds. The pavement and bridge funding is used for differing projects from routine maintenance to reconstructive work. Funds are allocated to pavement and bridge projects based on an annual needs assessment process supported by a data-driven prioritization and selection process. The prioritization process is the same for the various funding sources; however, the State of Good Repair program funds are designated for deteriorated pavements and structurally deficient bridges.

The SGR program requires funds be distributed proportionality between VDOT and localities, based on assessed needs. More details, including the requirements for pavements and bridges, and the SGR prioritization process methodology, can be found at: <u>State of Good Repair for Bridges</u> and <u>Local Assistance Funding Programs</u>.



VDOT has developed a robust asset management program, placing maintenance of the transportation network at the forefront of VDOT's investment decisions. This commitment to responsible asset management practice is demonstrated through VDOT's annual collection of condition data on pavements and bridges along with its establishment and publication of network-level pavement and bridge performance targets. For more than a decade, VDOT has monitored pavement and bridge conditions using performance information (measures and targets) to determine investment strategies based on available funding levels.

In the annual needs assessment process, VDOT assesses 100% of the pavement network on Virginia's Interstate and Primary systems and approximately 20% of the Secondary system. In 2016, VDOT assessed 100% of the Secondary pavement network to create a condition baseline. The pavement condition data is compiled, analyzed and reviewed to report the optimized needs at a roadway system and district level. VDOT's pavement program selects resurfacing projects, in relation to needs, and optimizes the timing of projects through a data-driven pavement management system.

For bridges, VDOT follows national standards in performing safety inspections and determining general condition of the structures. Condition assessments are performed by certified safety inspection personnel. The inspection program requires a qualified inspector to complete a "hands-on" review of the structure or bridge during each inspection. By federal regulation, VDOT is required to conduct detailed inspections of NBI structures at intervals not to exceed 24 months. VDOT uses BrM software to store bridge condition and inventory data for each structure and to program, schedule, and track bridge and structure inspections. The data collected during inspections allows VDOT to use a proactive approach to maintenance. Preventive maintenance and timely intervention repairs are performed to avoid and slow deterioration that leads to greater rehabilitation or replacement cost. Virginia's bridge maintenance program is large and complex, so in order to direct its efforts more easily, performance targets have been developed.

VDOT uses a prioritization process when determining funding for the pavement and bridge programs and prioritizes work ranging from preventative maintenance to replacement. The prioritization processes take into account similar factors such as condition, cost effectiveness, maintenance history, and traffic volumes. While the systematic prioritization processes are a guide to assist in funding projects, districts direct the work performed as the local experts.

How do Pavement and Bridge Projects get selected for Inclusion in the STIP?

As noted above, the funding to meet Virginia's pavement and bridge objectives and targets is allocated to projects in the CTB-approved SYIP and is consistent with VTrans2040. Each spring, the public is invited to comment on projects included in the draft SYIP prior to CTB approval. Since the SYIP is the foundation for



the STIP, the program of projects in the STIP demonstrates support to achieve Virginia's pavement and bridge performance objectives and targets and is consistent with Virginia's TAMP.



Appendix G: Performance Based Planning and Programming – Highway System Performance

Performance Targets

In accordance with the requirements of MAP-21 and the FAST Act, Virginia has established performance targets for three reliability performance measures to assess the Highway System Performance. All three measures are included in Virginia's Baseline Performance Period Report for 2018-2021 which was submitted to FHWA in October 2018. This report satisfies the federal requirement that State DOTs to establish new targets every four years, and to submit a Performance Period Report to FHWA by October 1st of the first year in the performance period.

On September 21, 2022, Virginia's Office of Intermodal Planning and Investment (OIPI) established a new set of four-year statewide targets for condition of bridge decks and pavement and system performance measures, including travel time reliability. These targets were approved on the same day by the Commonwealth Transportation Board (CTB), and will be set for January 1, 2022 through December 31, 2025.

Performance of the NHS is measured by the level of travel time reliability. The travel time reliability performance measures and performance targets for the 2022-2025 performance period are indicated in Table 1 below.

Table 1: National Highway System Travel Time Reliability Performance Measures and Targets

	CY 2022-2023	CY 2022-2025
NHS Travel Time Reliability Performance	Two Year Target	Four Year Target
Percent of Person Miles Traveled on the Interstate That Are Reliable	85.0%	85.0%
Percent of Person Miles Traveled on the Non-Interstate NHS That Are Reliable	88.0%	88.0%

The assessment for freight reliability is based on the truck travel time reliability index. The truck travel time reliability performance measure and performance targets for the 2022-2025 performance period are indicated in Table 2 below.

Table 2: Freight Reliability Performance Measure and Targets

	CY 2022-2023	CY 2022-2025
Truck Travel Time Reliability Performance	Two Year Target	Four Year Target
Truck Travel Time Reliability Index	1.64	1.64



The Commonwealth Transportation Board (CTB) approves the performance measures and targets developed for Virginia's surface transportation network. Such targets, including those for Highway System Performance, are linked to the goals and objectives in Virginia's long-range transportation plan, or VTrans.

Connection to Other Performance Based Planning Documents

VTrans, the state's long-range multimodal plan, provides the overarching vision and goals for transportation in the Commonwealth. The long-range plan provides a vision for Virginia's future transportation system and defines goals, objectives, and guiding principles to achieve the vision. It also provides direction to state and regional transportation agencies on strategies and policies to be incorporated into their plans and programs. The most recent approved long range multimodal plan is VTrans2040.

VTrans2040 identifies the most critical transportation needs in Virginia to ensure the overarching transportation goals in the long-range plan are achieved. The screening process was informed by a data-driven approach that considers highway system performance measures and targets in addition to other performance indicators.

Performance management, as it relates to the reliability of the NHS and freight, is included in the VTrans2045Vision, Goals & Objectives, and Guiding Principles as noted below:

- Guiding Principle 4: Consider Operational Improvements and Demand Management First –
 Maximize capacity of the transportation network through increased use of technology and
 operational improvements as well as managing demand for the system before investing in major
 capacity expansions.
- Goal A Economic Competitiveness and Prosperity: invest in a transportation system that supports a robust, diverse, and competitive economy.
 - o Objectives:
 - Reduce the amount of travel that takes place in severe congestion.
 - Reduce the number and severity of freight bottlenecks.
 - Improve reliability on key corridors for all modes.
- Goal B Accessible and Connected Places: increase the opportunities for people and businesses to efficiently access jobs, services, activity centers, and distribution hubs.
 - o Objectives:
 - Reduce average peak-period travel times in metropolitan areas.
 - Reduce average daily trip lengths in metropolitan areas.
 - Increase the accessibility to jobs via transit, walking and driving in metropolitan areas.



Additionally, the Virginia Freight Element (VFE), a component of VTrans2040, discusses freight system trends, needs, and issues. The VFE also includes freight policies, strategies, and performance measures that guide Virginia's freight-related investment decisions.

Projects included in the STIP are directly linked to the Highway System Performance objectives outlined in VTrans2040 and associated needs analysis, and the VFE through the strategies and actions that are priorities in Virginia.

Funding for Highway System Performance Projects

SMART SCALE, Virginia's data-driven prioritization process for funding transportation projects, considers the potential of a project to improve reliability. In order to be considered for SMART SCALE, a project must first meet a need identified in VTrans2040, thus strengthening the connection between the planning and programming processes. Congestion mitigation, safety, accessibility, economic development, environment, and land use are the factors used to score SMART SCALE projects. Freight considerations are included in the economic development factor.

The FAST Act established a National Highway Freight Program, including a freight-specific funding program to highlight the focus on freight transportation needs. Projects eligible for National Highway Freight Program (NHFP) funding must contribute to the efficient movement of freight on the National Highway Freight Network (NHFN) and be included in the VFE. VDOT uses NHFP funding to construct freight beneficial projects identified through the SMART SCALE process.

SMART SCALE screening and scoring results, along with public feedback and CTB guidance, are used to develop the SYIP.

Other projects selected for funding are subject to program specific prioritization processes approved by the CTB. All funding (federal, state, and other sources) for transportation projects are allocated to projects in the CTB approved SYIP.

How do Highway System Performance Projects Get Selected for Inclusion in the STIP?

As noted above, the funding for all transportation projects, including funding for projects to meet Virginia's NHS system performance and freight movement targets is allocated to projects in the CTB approved SYIP, and is consistent with VTrans2040 and the VFE. Since the SYIP is the foundation of the STIP, the program of projects in the STIP demonstrates support to achieve Virginia's NHS and Freight Reliability performance objectives and targets.



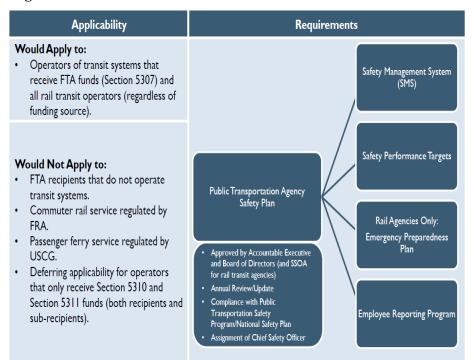
Appendix H: Public Transportation Safety Plan for MPOs (PTASP)

The Public Transportation Agency Safety Plan (PTASP) final rule (49 C.F.R. Part 673) intends to improve public transportation safety by guiding transit agencies to more effectively and proactively manage safety risks in their systems. It requires certain recipients and sub-recipients of Federal Transit Administration (FTA) grants that operate public transportation to develop and implement safety plans that, establish processes and procedures to support the implementation of Safety Management Systems (SMS).

The rule applies to all operators of public transportation systems that are recipients and sub-recipients of FTA grant funds. Specifically, recipients or sub-recipients who operate public transportation and are a recipient or sub-recipient of Urbanized Area Formula Grant Program funds under 49 U.S.C. § 5307 (Section 5307 Grant Program) see attachment A for a list of Transit agencies.

DRPTs Role: DRPT has drafted a PTASP on behalf of small tier II transportation providers. Under the PTASP rule a small tier II transportation provider is defined as meeting all of the following criteria:

- Is a recipient or subrecipient of FTA's Urbanized Area Formula Program,
- Operates 100 or fewer vehicles in peak revenue service, and
- Does not operate rail/fixed-guideway public transportation





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Performance-Based Planning

As part of PTASP requirements, transit agencies must set safety performance targets in their safety plans for each mode (Fixed route and paratransit) based on the following safety performance measures that FTA has established in the National Public Transportation Safety Plan (NSP):

Measure	Target Type		Desired Direction
Fatalities	Total number	Rate per revenue miles	Decreasing number and
ratantics	Total number	Rate per revenue nines	rate
Injuries	Total number	Rate per revenue miles	Decreasing number and
linjuries	Total number Rate per revent		rate
Safety events	Total number per year	Rate per revenue miles	Decreasing number and
Safety events	Total number per year	Rate per revenue nines	rate
System reliability	Distance between major	Distance between minor	Decreasing number and
System renability	failures	failures	rate

MPOs must reference performance targets and plans within the MPO transportation improvement program (TIP) and long-range plan. The Safety performance targets and performance-based plans should inform a transit agency's investment priorities, and those investment priorities should be carried forward within the MPO's and State DOT's planning processes. MPOs should also make reference to the PTASP plan in their TIP. MPO Role

The PTASP rule states that each transit provider must provide the MPO with safety performance targets to assist the MPO with capital program planning process (Long Range Transportation plan and TIP). The MPO will need to incorporate the performance targets and safety plan(s) (by reference) into the TIP and LRTP. Additional resources on the MPOs role in PTAS is available from the FTA's MPO FAO page.

For MPOs with tier II transit agencies(s) participating in the group plan, DRPT is providing the agency specific targets developed for the Statewide Tier II group PTASP plan to the MPOs for consideration and inclusion in MPO TIPs. (Attachment A) MPOs may consider adopting the targets provided in the group plan or adopting regionally specific targets of their own. For additional guidance please refer to <u>FTA's Safety performance Targets Guide.</u> In many cases MPOs can add the targets to the TIP via an administrative update instead of an amendment.⁴

After the initial round in 2021 MPOs will have to update the PTASP performance targets when LRTP or TIP are updated or a transit agency make changes to their targets during an annual PTASP plan review. Transit agencies are required to review their PTASP annually by July 20th.



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⁴ MPOs should follow their procedures as defined in their Public Participation Plans

The Public Transportation Agency Safety Plan (PTASP) final rule (49 C.F.R. Part 673) intends to improve public transportation safety by guiding transit agencies to more effectively and proactively manage safety risks in their systems. It requires certain recipients and sub-recipients of Federal Transit Administration (FTA) grants that operate public transportation to develop and implement safety plans that, establish processes and procedures to support the implementation of Safety Management Systems (SMS). Agencies are required to fulfill this requirement through an individual or group plan. The PTASP rule provides two tiers of requirements for transit agencies based on size and operating characteristics:

- A Tier I agency operates rail, OR has 101 vehicles or more all fixed route modes, OR has 101 vehicles or more in one non-fixed route mode.
- A Tier II agency is a subrecipient of FTA 5311 funds, OR is an American Indian Tribe, OR has 100 or less vehicles across all fixed route modes, OR has 100 vehicles or less in one non-fixed route mode.

Tier II Group Plan

The Department of Rail and Public Transportation (DRPT) is the sponsor for the Statewide Tier II Group PTASP Plan. The HRMPO programs federal transportation funds for HDPT. HDPT is a Tier II agency participating in the DRPT sponsored group PTASP Plan. The HRMPO has adopted the <u>Tier II PTASP</u> into its TIP by reference and integrated the goals measures and targets described in the 2020 Commonwealth of Virginia Tier II Group Transit Asset Management Plan, August 11, 2020 into the MPO's planning and programming process. Specific targets for the Tier II Group PTASP Plan are included in the table below.



Table 1: Tier II Transit Agency PTASP Performance Targets by Mode:

	Targets by Mode	
Performance Measures	Fixed Route	Paratransit/ Demand Response
Fatalities (total number	0	0
of reportable fatalities		
per year)		
Fatalities (rate per total	0	0
vehicle revenue miles by		
mode)		
Injuries (total number of	3	1
reportable injuries per		
year)		
Injuries (rate per total		Less than .5 injuries per 100,000
vehicle revenue miles by	vehicle revenue miles	vehicle revenue miles
mode)		
Safety events (total	7	2
number of safety events		
per year)		
Safety events (rate per		Less than 1 reportable event per
total vehicle revenue	100,000 vehicle revenue miles	100,000 vehicle revenue miles
miles by mode)		
Distance between Major	10,000 miles	10,000 miles
Failures		
Distance between Minor	3,200 miles	3,200 miles
Failures		

Information and Resources

Additional information and guidance is available on FTAs Public Transportation Safety Plan webpage: https://www.transit.dot.gov/PTASP

PTASP final rule factsheet:

 $\frac{https://www.transit.dot.gov/sites/fta.dot.gov/files/docs/regulations-and-guidance/safety/public-transportation-agency-safety-program/117281/ptasp-fact-sheet-o2-o6-2019.pdf$

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