

Lesley Phillips  
Transportation Planner



Kingsport MTPO  
415 Broad Street  
Kingsport, TN 37660  
[MTPO@KingsportTN.gov](mailto:MTPO@KingsportTN.gov)  
423.224.2670

## MEMORANDUM

To: Kingsport MTPO Executive Board  
CC: Subscribed Interested Parties  
From: Lesley Phillips  
Date: October 24, 2022  
Subject: MTPO Executive Board Meeting

---

Please see the attached agenda for the next meeting of the Kingsport MTPO Executive Board, to be held **Thursday, November 3, 2022 at 1:30 PM (EDT), in the Kingsport City Hall Board Room (415 Broad Street, Kingsport, Tennessee).**

There are four action items:

- **Minutes from August 4, 2022 Meeting**
- **FY23-26 Transportation Improvement Program**
- **Annual List of Priority Projects**
- **Local Road Safety Plan**

In addition to the agenda items listed above, time will be allotted for public comments, project updates, state and federal partner updates, and general information items.

The meeting will be in-person and members of the public are welcome to attend. We also plan to offer live public access to the meeting through a Zoom webinar. Members of the public who are interested in attending remotely should send an email to [MTPO@KingsportTN.gov](mailto:MTPO@KingsportTN.gov) to request the log in information for the meeting. In order to allow time to respond, your request must be received by 12:00 pm on November 2, 2022.

Executive Board members who are unable to attend may designate a proxy in writing to represent you. A sample proxy letter is attached.



# AGENDA

**Kingsport MTPO Executive Board  
November 3, 2022 at 1:30 PM  
Kingsport City Hall – Board Room  
415 Broad Street, Kingsport, TN 37660**

**Call to Order – Paul Montgomery, Chairman**

## **1. General Information and Attendance Roll Call**

**Presenter:** Lesley Phillips

## **2. Public Comment on Agenda Items**

Those wishing to make a comment pertaining to any of the agenda items may do so at this time with a five-minute time limitation. Comments not pertaining to a specific agenda item will be heard at the end of the meeting.

## **3. Approval of Minutes from August 4, 2022 Meeting (Vote Required)**

**Presenter:** Paul Montgomery

## **4. FY23-26 Transportation Improvement Program (TIP) (Vote Required)**

**Presenter:** Lesley Phillips

**Item Summary:** The Transportation Improvement Program (TIP) is a 4-year program that lists all highway and public transit transportation projects proposed for funding under Title 23 (highways) and Title 49 (transit) of the US Code or regionally significant transportation projects regardless of funding source. The draft TIP completed state and federal review and is available for public review and comment from October 24, 2022 through November 2, 2022 prior to the November 3, 2022 Executive Board meeting. All local projects in the new TIP have been rolled over from the current TIP. A Memorandum of Agreement for TIP Amendments and Administrative Modifications is currently under development by TDOT and will also be signed as part of the TIP adoption process. Virginia is on a different TIP schedule. Currently, Virginia projects from the FY20-23 TIP have been included in the FY23-26 TIP and new Virginia projects will be added in the future by TIP amendment.

**Recommendation:** Approve the Resolution, Self-Certification, and FY23-26 TIP as presented.

## **5. Annual List of Priority Projects (Vote Required)**

**Presenter:** Lesley Phillips & TDOT Representative(s)

**Item Summary:** Annually, the Tennessee Department of Transportation (TDOT) requests our input on TDOT sponsored transportation projects in the Kingsport MTPO area to be included in TDOT's Three-Year Work Program. These major projects are managed by TDOT and have traditionally been funded with TDOT resources that are available to the state, whether it be federal or state funds. Keep in mind, these are state projects, not local projects.

TDOT has a new Project Ranking Hub where project details can be found. There are 'committed' projects and 'proposed' projects – only the proposed projects need to be ranked. The suggested rankings by Kingsport MTPO staff are included in the agenda packet. For informational purposes, the 2021 rankings are also shown. The suggested rankings were emailed to Executive Board members and Technical Coordinating Committee members on October 18 for review/feedback. The Executive Board can choose to accept the suggested rankings or alter them.

**Recommendation:** Approve the Resolution and project rankings as presented.

## **6. Local Road Safety Plan (Vote Required)**

**Presenter:** Lesley Phillips

**Item Summary:** A Local Road Safety Plan (LRSP) is a locally-focused data-driven plan that considers the unique and diverse safety issues of local roadways and provides a framework to improve safety and save lives. The process results in a prioritized list of issues, risks, actions, and improvements that can be used to reduce fatalities and serious injuries on the area roadways. For the past 11 months, Kingsport MTPO staff has worked with FHWA, a consultant team from VHB, and various stakeholders to develop a LRSP for the Kingsport MTPO planning area. The draft LRSP was presented at the August Executive Board meeting.

**Recommendation:** Approve the Resolution and Local Road Safety Plan as presented.

## **7. Annual Federal Funds Obligation Reports – Tennessee and Virginia**

**Presenter:** Lesley Phillips

**Item Summary:** Per 23 CFR 450.334, annually the Kingsport MTPO is required to publish a list of federal funds (FHWA and FTA) that have been obligated on projects within the MTPO area for the previous fiscal year. The list must be made available within 90 days from the end of the program year (September 30). As outlined in the Kingsport MTPO Public Participation Plan, this information is published online and is also available for public review in the Kingsport MTPO office. Questions on individual projects can be answered by TDOT officials or VDOT officials. No Board action is required.

## **8. 2023 Executive Board Meeting Dates**

**Presenter:** Lesley Phillips

**Item Summary:** Discussion of meeting dates for calendar year 2023. Do Executive Board members want to pre-schedule meetings and coordinate with Bristol MPO as requested over the last few years or schedule meetings as needed when agenda items come up? After discussion with the Bristol MPO, meetings are tentatively scheduled on February 9, May 11, August 10, and November 9. Bristol MPO will present these dates at their next Executive Board meeting. If approved, Bristol MPO meetings will be at 10 am and our meetings would be on the same days in the afternoon (time preference?).

## **9. Federal & State Partner Updates and Project Updates**

**Presenter:** Lesley Phillips (Facilitator)

**Item Summary:** Updates will be given by our partners at Federal Highway Administration, Federal Transit Administration, Tennessee, and Virginia. Then, project updates will be given as requested.

## **10. Public Comments**

Members of the public may address the Executive Board with issues related to the region's transportation system. There is a five-minute time limitation per individual and/or topic.

## **11. Meeting Adjournment**

## Sample Proxy Letter

\_\_\_\_\_  
Date

I, \_\_\_\_\_, of \_\_\_\_\_,  
*(Print Name)* *(Agency)*

Hereby designate \_\_\_\_\_ to vote as my proxy  
*(Name of Proxy)*

during the \_\_\_\_\_ meeting of the Kingsport MTPO Executive Board.  
*(Meeting Date)*

\_\_\_\_\_  
Signature

**KINGSPORT METROPOLITAN TRANSPORTATION PLANNING ORGANIZATION  
EXECUTIVE BOARD MEETING  
Minutes for August 4, 2022 Meeting  
In-Person Meeting with Optional Live Public Access via Zoom Webinar**

**Members Present:**

Blake Ailor, Chase Milner, Ronda Sawyer, Michael Thompson, Ambre Torbett

**Absent:**

Jimmy Adkins (attended online), Hawkins County/Church Hill/Mount Carmel Representative

**Staff Present:**

Susan Doran, Lesley Phillips, Candace Sherer

**In Person Attendees:**

Megan Allphin – Mattern & Craig  
Micah Bray – City of Bristol TN/Bristol MPO  
Mary Butler – Johnson City MTPO  
Michelle Christian – TDOT  
Calvin Clifton – Mattern & Craig  
Matthew Cox - VDOT  
Troy Ebbert – TDOT  
Jason Farmer – TDOT  
Melanie Fleenor – City of Bristol VA  
Tyler Gillenwater – City of Bristol TN/Bristol MPO  
Candace Long – NET Trans  
D. Stacy Morrison - TDOT

**Online Attendees:**

Jimmy Adkins – LENOWISCO PDC  
Rosemarie Anderson – FHWA-HQ Office of Safety  
Matthew Cate – TTAP  
Corey Divel – City of Cleveland TN  
Tiffany Dubinsky – Virginia DRPT  
Maysoon Haddad – Thompson Engineering  
Tabitha Moore – Frontier Health  
Jessica Rich – FHWA-TN  
Sean Santalla – FHWA-TN  
Karen Scurry – FHWA-HQ Office of Safety  
Christopher Stipo – Tri-Cities Regional Airport  
Eric Tang – VHB  
Greg Thomas – Cleveland TN MPO  
+1 phone attendee

**Recorder:** Susan Doran

- I. **Call to Order:** Lesley Phillips called the meeting to order. Since the chairman and vice-chairman were not in attendance, Lesley asked Executive Board members to nominate a chairman for the meeting. Ronda Sawyer nominated Michael Thompson to be chairman and was seconded by Blake Ailor. The motion carried unanimously.

**II. General Information/Attendance Roll Call:**

The meeting was held in-person with optional live public access available via Zoom Webinar. A video/audio recording of the meeting is published online at <https://www.kingsporttn.gov/city-services/kmtpo/meetings-notices/agenda-minutes/>

Attendance and votes were taken by roll call.

**III. Public Comment:** Michael Thompson invited members of the public to address comments related to agenda items. No comments.

**IV. Approval of Minutes:** The minutes of the June 16, 2022 called meeting were reviewed. No corrections and/or additions were suggested. A motion was made by Ronda Sawyer to approve the minutes and was seconded by Blake Ailor. Passed in a roll call vote: Ailor, Milner, Sawyer, Thompson and Torbett voting "Aye".

**V. New Business:**

**A. Kingsport MTPO Local Road Safety Plan Presentation.** Presented by Rosemarie Anderson, FHWA-HQ Office of Safety and Eric Tang, VHB. A Local Road Safety Plan (LRSP) is a locally-focused data-driven plan that considers the unique and diverse safety issues of local roadways and provides a framework to improve safety and save lives. The process results in a prioritized list of issues, risks, actions, and improvements that can be used to reduce fatalities and serious injuries on the area roadways. For the past 8 months, Kingsport MTPO staff has worked with FHWA, a consultant team from VHB, and various stakeholders to develop a LRSP for the Kingsport MTPO planning area. No Action Required. When the LRSP is final, it will be brought to the Executive Board for approval.

**VI. PROJECT UPDATES/STATE AND FEDERAL PARTNER UPDATES**

Staff provided updates on projects as requested. State and Federal updates and information were provided by TDOT, VDOT, DRPT, and FHWA representatives. The DRPT Agency Update is attached to the minutes.

**VII. PUBLIC COMMENTS:** Members of the public were invited to address the Executive Board with issues related to transportation planning issues, activities, and/or projects that pertain to the Kingsport Metropolitan Transportation Planning Organization. No comments.

**VIII. ADJOURNMENT:** There being no other business, the meeting was adjourned.

### Transit Grant Recipient Workshops

- Post-Award Webinar for all Public Transit and MPO grant recipients was held on Thursday, July 28 at 10:00AM. The webinar provided information and next steps including an overview of grant administration procedures, grant agreements, DRPT oversight, bus procurement, performance data entry, and more.
- The webinar recording and handouts are posted to OLGA on the “News and Information” page at <https://olga.drpt.virginia.gov/news.aspx>

### Federal Discretionary Grant Programs

- Safe Streets and Roads for All Grant Program: Applications due September 15, 2022
  - The following activities are eligible for the SS4A program:
    - Develop or update a comprehensive safety action plan (Action Plan).
    - Conduct planning, design, and development activities in support of an Action Plan.
    - Carry out projects and strategies identified in an Action Plan.
  - Eligible recipients: Metropolitan planning organizations; counties, cities, towns, and transit agencies or other special districts that are subdivisions of a State; federally recognized Tribal governments; and multijurisdictional groups comprised of the previous entities.
- All Stations Accessibility Program: Applications due September 30, 2022
  - \$350 million/year to provide funding upgrades for legacy rail transit stations that remain inaccessible to individuals with disabilities
  - Eligible recipients: designated recipients that operate or allocate funds to inaccessible pre-ADA—or “legacy” — rail fixed guideway public transportation systems, and States (including territories and Washington, D.C.) and local governmental entities that operate or financially support legacy rail fixed guideway public transportation systems and corresponding legacy stations/facilities.
- Railroad Crossing Elimination Program: Applications due October 4, 2022
  - This program provides funding for highway-rail or pathway-rail grade crossing improvement projects that focus on improving the safety and mobility of people and goods.
  - Eligible Applicants: States, political subdivisions of states, tribes, local governments, public port authorities, MPOs, or any group thereof.
  - Minimum Award: \$1 Million
  - Required Local Match: 20%
  - Eligible recipients: states and local government authorities
- Reconnecting Communities Pilot Program: Applications due October 13, 2022
  - Funds for the Fiscal Year (FY) 2022 RCP Program are to be awarded on a competitive basis for projects that reconnect communities by removing, retrofitting, or mitigating highways or other transportation facilities that create barriers to community connectivity, including to mobility, access, or economic development
  - Eligible recipients: States, units of local government, federally recognized Tribal governments, metropolitan planning organizations, and nonprofit organizations.
- Letters of support and technical assistance requests must be submitted as early as possible to allow adequate time to process requests ahead of application deadlines

**HJ 542 Transit Equity and Modernization Study**

- The Virginia Transit Equity and Modernization Study team is working to complete the final review of the Draft Action Plan and will present to CTB in early Fall.
- More information may be found on the study website: [www.vatransitmodernization.com](http://www.vatransitmodernization.com)

## Agenda Item #4 - FY23-26 Transportation Improvement Program

Full document included at end of agenda packet.

### RESOLUTION BY THE EXECUTIVE BOARD OF THE KINGSPORT METROPOLITAN TRANSPORTATION PLANNING ORGANIZATION (MTPO) TO ADOPT THE KINGSPORT AREA FY2023-2026 TRANSPORTATION IMPROVEMENT PROGRAM (TIP)

**WHEREAS**, the Kingsport Metropolitan Transportation Planning Organization (MTPO) is the designated Metropolitan Planning Organization (MPO) for the Kingsport urbanized area in Tennessee and Virginia and is responsible for carrying out a comprehensive, cooperative, and continuous transportation planning process; and

**WHEREAS**, the Kingsport MTPO prepared the Fiscal Year 2023-2026 TIP, a cooperatively developed program of transportation projects selected to be advanced during the program's four-year period, in accordance with planning requirements in federal laws and regulations; and

**WHEREAS**, no local highway or transit projects are eligible for Federal funds until they are programmed in the TIP; and

**WHEREAS**, the Kingsport MTPO has involved the public and interested stakeholders in accordance with the Public Participation Plan prior to finalizing the TIP.

#### **NOW THEREFORE BE IT RESOLVED BY THE EXECUTIVE BOARD OF THE KINGSPORT METROPOLITAN TRANSPORTATION PLANNING ORGANIZATION AS FOLLOWS:**

The FY2023-2026 Transportation Improvement Program has been developed in accordance with all applicable requirements and this resolution is adopted as an endorsement of the FY2023-2026 TIP.

**RESOLUTION APPROVED:**

Date: \_\_\_\_\_

---

Paul Montgomery, Chairman  
Kingsport MTPO Executive Board

---

Lesley Phillips  
Kingsport MTPO Staff

## METROPOLITAN TRANSPORTATION PLANNING PROCESS CERTIFICATION

In accordance with 23 CFR 450.336, the Kingsport Metropolitan Transportation Planning Organization, the Tennessee Department of Transportation, and the Virginia Department of Transportation hereby certify that the metropolitan transportation planning process is addressing major issues facing the Kingsport, TN-VA urbanized area, and is being carried out in accordance with the following requirements:

- I. 23 U.S.C. 134 and 135, 49 U.S.C. 5303 and 5304 (Highways and Transit).
- II. Title VI of the Civil Rights Act of 1964, as amended (42 U.S.C. 2000 d-1) and 49 CFR part 21.
- III. 49 U.S.C. 5332, prohibiting discrimination on the basis of race, color, creed, national origin, sex, or age in employment or business opportunity.
- IV. 49 CFR part 26 regarding the involvement of disadvantaged business enterprises in USDOT-funded projects.
- V. 23 CFR part 230, regarding the implementation of an equal employment opportunity program on Federal and Federal-aid highway construction contracts.
- VI. Provisions of the Americans with Disabilities Act of 1990 (42 U.S.C. 12101 et seq) and 49 CFR parts 27, 37, and 38.
- VII. In nonattainment and maintenance areas, sections 174 and 176 (c) and (d) of the Clean Air Act, as amended, 42 U.S.C. 7504, 7506 (c) and (d), and 40 CFR part 93.
- VIII. The Older Americans Act, as amended (42 U.S.C. 6101), prohibiting discrimination on the basis of age in programs or activities receiving Federal financial assistance.
- IX. Section 324 of Title 23 U.S.C. regarding the prohibition of discrimination based on gender.
- X. Section 504 of the Rehabilitation Act of 1973 (29 U.S.C. 794) and 49 CFR part 27 regarding discrimination against individuals with disabilities.

---

Paul Montgomery, Chairman	Date
Kingsport MTPO Executive Board	

---

Lesley Phillips	Date
Kingsport MTPO Staff	

---

Tabitha Crowder	Date
Bristol District Engineer	
Virginia Department of Transportation	

---

Ronnie Porter	Date
Director, TDOT Program Development & Administration Division	

## Agenda Item #5 - Annual List of Priority Projects

**RESOLUTION BY THE EXECUTIVE BOARD  
OF THE KINGSPORT METROPOLITAN TRANSPORTATION PLANNING ORGANIZATION (MTPO)  
TO APPROVE AND RECOMMEND THE LIST OF PRIORITY PROJECTS TO BE SUBMITTED TO THE TENNESSEE  
DEPARTMENT OF TRANSPORTATION (TDOT) FOR THE THREE-YEAR WORK PROGRAM**

**WHEREAS**, the Kingsport Metropolitan Transportation Planning Organization (MTPO) is the designated Metropolitan Planning Organization (MPO) for the Kingsport urbanized area in Tennessee and Virginia and is responsible for carrying out a comprehensive, cooperative, and continuing transportation planning process; and

**WHEREAS**, annually, TDOT requests that each MPO rank a List of Priority Projects; and

**WHEREAS**, the Kingsport MTPO is ranking and submitting a List of Priority Projects for the Kingsport MTPO area to TDOT as requested; and

**WHEREAS**, the projects included in the list are vital to the transportation infrastructure and economic development for the Kingsport MTPO area.

**NOW THEREFORE BE IT RESOLVED BY THE EXECUTIVE BOARD OF THE KINGSPORT METROPOLITAN TRANSPORTATION PLANNING ORGANIZATION AS FOLLOWS:**

The Executive Board of the Kingsport MTPO does hereby approve and recommend the rankings of the List of Priority Projects as attached to be submitted to TDOT for the three-year work program.

**RESOLUTION APPROVED:**

Date: \_\_\_\_\_

---

Paul Montgomery, Chairman  
Kingsport MTPO Executive Board

---

Lesley Phillips  
Kingsport MTPO Staff

**DRAFT**

**2022 KINGSPORT MTPO PROJECT RANKINGS**

County	PIN	Route	Description	Length	Remaining Phases	2021 Rank	2022 Rank
Sullivan	105467.04	SR-126	(Memorial Blvd.) From east of Briarwood Road to east of Cooks Valley Road (IA)	2.1	Construction	1	1
Sullivan	124590.00	I-81	ITS Expansion along I-81 between I-26 (Exit 57) Interchange and Virginia State Line (IA)	23.3	Construction	3	2
Sullivan	112965.00	SR-347	(Rock Springs Road) from Cox Hollow Rd (LM 9.52) to I-26 (US-23) (LM 10.73) (Local Programs Project, Not IA Project)	1.2	Right-of-Way /Construction	4	3
Sullivan	105467.02	SR-126	(Memorial Blvd.) From East of Cooks Valley Road to I-81 in Kingsport (IA)	4.5	Right-of-Way /Construction	5	4
Washington, Sullivan	124663.00	SR-36	(Fort Henry Dr.) From SR-75 to I-81 (IA)	3.5	Right-of-Way /Construction	6	5

Changes from 2021 Rankings:

County	PIN	Route	Description	Length	Status	2021 Rank
Sullivan	105467.03	SR-126	(Memorial Blvd.) From East Center Street to east of Briarwood Road (IA)	2.0	Committed (105467.01 was split into 105467.03 and 105467.04)	1
Sullivan	112834.03	SR-93	(Sullivan Gardens Parkway) From south of Horse Creek to north of Derby Drive (TPR Option 5, Spot Improvements) (IA)	0.8	Committed	2

**DRAFT**

**Agenda Item #6 - Local Road Safety Plan**

**Full document included at end of agenda packet.**

**RESOLUTION BY THE EXECUTIVE BOARD OF THE  
KINGSPORT METROPOLITAN TRANSPORTATION PLANNING ORGANIZATION (MTPO)  
TO ADOPT THE KINGSPORT MTPO LOCAL ROAD SAFETY PLAN (LRSP)**

**WHEREAS**, the Kingsport Metropolitan Transportation Planning Organization (MTPO) is the designated Metropolitan Planning Organization (MPO) for the Kingsport urbanized area in Tennessee and Virginia and is responsible for carrying out a comprehensive, cooperative, and continuous transportation planning process; and

**WHEREAS**, a Local Road Safety Plan (LRSP) is a locally-focused data-driven plan that considers the unique and diverse safety issues of local roadways and provides a framework to improve safety and save lives; and

**WHEREAS**, the LRSP is a Proven Safety Countermeasure of the FHWA which results in a prioritized list of issues, risks, actions, and improvements that can be used to reduce fatalities and serious injuries on the area roadways; and

**WHEREAS**, the Kingsport MTPO staff has worked with the FHWA Office of Safety, a consultant team from VHB, and a diverse group of stakeholders to develop a LRSP for the Kingsport MTPO area; and

**WHEREAS**, the Kingsport MTPO staff and board recognize the importance of prioritizing roadway safety for everyone; and, therefore, support a goal of zero roadway fatalities and serious injuries by the year 2050.

**NOW THEREFORE BE IT RESOLVED BY THE EXECUTIVE BOARD OF THE KINGSPORT METROPOLITAN TRANSPORTATION PLANNING ORGANIZATION AS FOLLOWS:**

The Local Road Safety Plan has been developed in accordance with all applicable requirements and this resolution is adopted as an endorsement of the plan and goal toward zero roadway fatalities and serious injuries.

**RESOLUTION APPROVED:**

Date: \_\_\_\_\_

\_\_\_\_\_  
Paul Montgomery, Chairman  
Kingsport MTPO Executive Board

\_\_\_\_\_  
Lesley Phillips  
Kingsport MTPO Staff



**LIST OF 2022 FEDERALLY OBLIGATED PROJECTS  
FOR THE KINGSPORT METROPOLITAN  
TRANSPORTATION PLANNING ORGANIZATION**

\* Project (or a portion of the project) is in the MPO planning area outside the urbanized area boundary

OBLIGATIONS FOR  
KINGSPORT MPO  
FY 2022

FED FUNDS OBLIGATED:	\$52,018,082.34
----------------------	-----------------

AUTH											TOTAL FUNDS IN
DATE	PIN #	PROJECT NUMBER	COUNTY	ROUTE	TERMINI	ACTION/PHASE	TYPE	TIP/STIP REFERENCE	FEDERAL FUNDS	TIP	
10/18/21	129091.00	STP/HSIP-93(23)*	Washington	SR-93	From near SR-81 to near Davis Road	CLOSE PROJECT	HSIP	TN-2019-007	(\$1,419.61)	\$250,000.00	
10/18/21	129091.00	STP/HSIP-93(23)*	Washington	SR-93	From near SR-81 to near Davis Road	CLOSE PROJECT	STBG	TN-2019-008	(\$46,908.82)	\$3,000,000.00	
11/01/21	129680.00	NH-I-81-1(132)*	Sullivan	I-81	From near SR-357 to near SR-394	AUTHORIZE CONST	NHPP	TN-2019-006	\$4,998,294.00	\$13,245,000.00	
11/04/21	112834.02	STP-93(14)*	Washington, Sullivan	SR-93	SR-93, near Morgan Lane to South of Baileyton Road in Sullivan County (TPR Option 5, Spot Improvement 3)	AUTHORIZE CONST	ACSTBG	TN-2011-010b	\$0.00	\$4,300,000.00	
12/02/21	129090.00	STP/HSIP-137(4)	Sullivan	SR-137	From near SR-1 to Virginia State Line	CLOSE PROJECT	HSIP	TN-2019-007	\$16,707.10	\$375,000.00	
12/02/21	129090.00	STP/HSIP-137(4)	Sullivan	SR-137	From near SR-1 to Virginia State Line	CLOSE PROJECT	STBG	TN-2019-008	\$33,261.22	\$3,125,000.00	
12/02/21	128784.00	STP-M-9108(50)	Sullivan		Kingsport Greenbelt Extension, SR-1(West Stone Dr) From Lewis Ln through the Exit Ramp to Netherland Inn Road; Netherland Inn Rd From the SR-1 Exit Ramp to Rotherwood Dr	ADJUST PE-N; AUTHORIZE PE-D	L-STBG	KPT-2019-004	\$78,560.00	\$70,000.00	
12/23/21	127103.00	STP/HSIP-93(26)	Sullivan	SR-93	From near SR-1 To Virginia State Line	AUTHORIZE CONST	STBG	TN-2019-008	\$1,761,232.00	\$5,825,000.00	
12/23/21	127103.00	STP/HSIP-93(26)	Sullivan	SR-93	From near SR-1 To Virginia State Line	AUTHORIZE CONST	HSIP	TN-2019-007	\$99,830.00	\$525,000.00	
01/28/22	129680.00	NH-I-81-1(132)*	Sullivan	I-81	From near SR-357 to near SR-394	ADJUST CONST	NHPP	TN-2019-006	\$538,686.00	\$13,245,000.00	
02/01/22	127463.00	NH-I-26(75)	Sullivan	I-26	From near Welcome Center Road to Washington County Line	ADJUST CONST	NHPP	TN-2019-006	\$450,000.00	\$4,885,000.00	
02/11/22	112834.02	STP-93(14)*	Washington, Sullivan	SR-93	SR-93, near Morgan Lane to South of Baileyton Road in Sullivan County (TPR Option 5, Spot Improvement 3)	ADJUST CONST	ACSTBG	TN-2011-010b	\$0.00	\$4,300,000.00	
02/11/22	112834.02	STP-93(14)*	Sullivan	SR-93	SR-93, near Morgan Lane to Sullivan County Line	ADJUST PE-D	S-STP	TN-2011-010b	\$3,200.00	--	
02/18/22	127112.00	STP/HSIP-346(14)*	Hawkins	SR-346	From SR-1 to near SR-1	AUTHORIZE CONST	HSIP	TN-2019-007	\$28,100.00	\$525,000.00	
02/18/22	127112.00	STP/HSIP-346(14)*	Hawkins	SR-346	From SR-1 to near SR-1	AUTHORIZE CONST	STBG	TN-2019-008	\$796,000.00	\$7,325,000.00	
03/14/22	123325.00	STP-M/HIP-9108(48)	Sullivan		Main Street from Sullivan Street to Market Street	AUTHORIZE PART. ADV CONST	CRRSAA- HIP	KPT-2015-002	\$611,612.00	\$611,612.00	
03/14/22	123325.00	STP-M/HIP-9108(48)	Sullivan		Main Street from Sullivan Street to Market Street	AUTHORIZE PART. ADV CONST	AC L-STBG	KPT-2015-002	\$0.00	\$7,888,388.00	
03/15/22	127066.00	STP/HSIP-355(9)	Sullivan	SR-355	From near SR-126 to near SR-36	CLOSE PROJECT	STBG	TN-2019-008	\$22,741.84	\$3,825,000.00	
03/15/22	127066.00	STP/HSIP-355(9)	Sullivan	SR-355	From near SR-126 to near SR-36	CLOSE PROJECT	HSIP	TN-2019-007	(\$29,230.51)	\$478,125.00	
03/30/22	124590.00	NH-I-81-1(130)*	Sullivan	I-81	Near I-26 (Exit 57) Interchange to Near I-381 in Virginia (IA)	CHANGE TERMINI	NHPP	TN-2019-009	\$0.00	\$140,000.00	
05/10/22	124932.00	HSIP-36(65)	Sullivan	SR-36	Intersection at SR-126(Memorial Blvd) and Sherwood Road	CLOSE PROJECT	HSIP	TN-2	(\$137,399.59)	\$4,223,736.00	
05/10/22	125450.25	HSIP-3700(36)*	Hawkins		Various Local Roads in Hawkins County (Local Roads Safety Initiative)	CLOSE PROJECT	HSIP	TN-2	\$14,745.74	\$4,302,802.00	
05/11/22	124614.00	BR-NH-36(68)	Sullivan	SR-36	(Fort Henry Drive), Bridge over South Holston River, LM 5.02 (RL/LL)	AUTHORIZE PE-N	NHPP	TN-2019-006	\$800,000.00	\$15,745,000.00	
05/19/22	114173.00	IM/NH-81-1(119)	Sullivan	I-81	Eastbound Truck Climbing Lane at Mile Marker 60	CLOSE PROJECT	NHPP	TN-1	\$8,323,566.71	--	
05/19/22	127103.00	STP/HSIP-93(26)	Sullivan	SR-93	From near SR-1 To Virginia State Line	ADJUST CONST	STBG	TN-2019-008	\$199,732.00	\$5,825,000.00	
05/19/22	127103.00	STP/HSIP-93(26)	Sullivan	SR-93	From near SR-1 To Virginia State Line	ADJUST CONST	HSIP	TN-2019-007	\$13,025.00	\$525,000.00	
05/25/22	127112.00	STP/HSIP-346(14)*	Hawkins	SR-346	From SR-1 to near SR-1	ADJUST CONST	HSIP	TN-2019-007	\$3,560.00	\$525,000.00	
05/25/22	127112.00	STP/HSIP-346(14)*	Hawkins	SR-346	From SR-1 to near SR-1	ADJUST CONST	STBG	TN-2019-008	\$264,584.00	\$7,325,000.00	
06/01/22	127463.00	NH-I-26(75)	Sullivan	I-26	From near Welcome Center Road to Washington County Line	CLOSE PROJECT	NHPP	TN-2019-006	(\$12,260.15)	\$4,885,000.00	
06/06/22	105467.01	STP-126(16)	Sullivan	SR-126	From East Center Street in Kingsport to East of Cooks Valley Road	CONVERT ADV CONST (ADJ PE-D & ROW)	STBG	TN-2007-022a	\$19,772,800.00	\$24,000,000.00	
06/09/22	123791.00	STP-M-3700(35)	Hawkins		Kingsport Press Road, From SR-1 (US-11W) to Greenland Park Road	CLOSE PROJECT	L-STBG	L-STBG-6	(\$2,706.59)	\$340,000.00	
06/13/22	128742.00	STP-M-9108(49)	Sullivan		Island Road, From SR-126 (Memorial Boulevard) to the Kingsport City Limits	ADJUST PE-N; AUTHORIZE PE-D	L-STBG	KPT-2018-003	\$144,560.00	\$200,000.00	
06/23/22	132450.33	HSIP-3700(39)	Hawkins		Various Local Roads in Hawkins County (Local Roads Safety Initiative)	AUTHORIZE PE-N	HSIP	TN-2019-007	\$90,000.00	\$678,125.00	
07/28/22	129800.00	STP-M-9108(51)	Sullivan, Hawkins		Moreland Drive, Meadow View Parkway, Fall Creek Road, Cooks Valley Road and Netherland Inn Road in Kingsport	AUTHORIZE ROW	L-STBG	KPT-2019-005	\$20,000.00	\$2,540,000.00	
08/12/22	123325.00	STP-M/HIP-9108(48)	Sullivan		Main Street from Sullivan Street to Market Street	CONVERT ADV CONST	L-STBG	KPT-2015-002	\$12,510,710.00	\$15,818,388.00	
08/24/22	129680.00	NH-I-81-1(132)*	Sullivan	I-81	From near SR-357 to near SR-394	ADJUST CONST	NHPP	TN-2019-006	\$652,500.00	\$13,245,000.00	

**Obligation Report for Federal Transit Administration Funds  
Kingsport MTPO Area  
Fiscal Year 2022 (10/01/2021 – 9/30/2022)**

Agency	Fund Type/Phase	Federal Amount
Frontier Health	FTA 5310/Acquisition	\$43,771
First TN Human Resource Agency – NET Trans		Will be updated
Kingsport Area Transit Service (KATS)		Will be updated

## VIRGINIA PROJECTS

STIP Transactions												
Kingsport MPO Study Area												
Federal Obligated Funds: 10/1/2021 - 9/30/2022												
Funding Source/Amount												
District / Jurisdiction	UPC / Description	NHS/NHPP	NHFP	STP/STBG	EB/MG	CMAQ	HIP	RSTP	BR/BROS	DEMO	SAFE	TOTAL
Interstate												
0	No projects identified in the MPO Area											
	TIP:	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
Remaining:												*

DRAFT

# VIRGINIA PROJECTS

STIP Transactions												
Kingsport MPO Study Area												
Federal Obligated Funds: 10/1/2021 - 9/30/2022												
Funding Source/Amount												
District / Jurisdiction	UPC / Description	NHS/NHPP	NHFP	STP/STBG	EB/MG	CMAQ	HIP	RSTP	BR/BROS	DEMO	SAFE	TOTAL
Primary												
0	No projects identified in the MPO Area											
	TIP:	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
Remaining:												*

DRAFT

## VIRGINIA PROJECTS

STIP Transactions												
Kingsport MPO Study Area												
Federal Obligated Funds: 10/1/2021 - 9/30/2022												
Funding Source/Amount												
District / Jurisdiction	UPC / Description	NHS/NHPP	NHFP	STP/STBG	EB/MG	CMAQ	HIP	RSTP	BR/BROS	DEMO	SAFE	TOTAL
Urban												
0	No projects identified in the MPO Area											
	TIP:	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
Remaining:												*

DRAFT

## VIRGINIA PROJECTS

STIP Transactions												
Kingsport MPO Study Area												
Federal Obligated Funds: 10/1/2021 - 9/30/2022												
Funding Source/Amount												
District / Jurisdiction	UPC / Description	NHS/NHPP	NHFP	STP/STBG	EB/MG	CMAQ	HIP	RSTP	BR/BROS	DEMO	SAFE	TOTAL
Secondary												
0	No projects identified in the MPO Area											
	TIP:	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
Remaining:												*

DRAFT

## VIRGINIA PROJECTS

STIP Transactions												
Kingsport MPO Study Area												
Federal Obligated Funds: 10/1/2021 - 9/30/2022												
Funding Source/Amount												
District / Jurisdiction	UPC / Description	NHS/NHPP	NHFP	STP/STBG	EB/MG	CMAQ	HIP	RSTP	BR/BROS	DEMO	SAFE	TOTAL
Miscellaneous												
0	No projects identified in the MPO Area											
	TIP:	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
Remaining:												*

DRAFT

## VIRGINIA PROJECTS

STIP Transactions												
Kingsport MPO Study Area												
Federal Obligated Funds: 10/1/2021 - 9/30/2022												
Funding Source/Amount												
District / Jurisdiction	UPC / Description	NHS/NHPP	NHFP	STP/STBG	EB/MG	CMAQ	HIP	RSTP	BR/BROS	DEMO	SAFE	TOTAL
Public Transportation												
0	No projects identified in the MPO Area											
	TIP:	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
Remaining:												*

## VIRGINIA PROJECTS

STIP Transactions												
Kingsport MPO Study Area												
Federal Obligated Funds: 10/1/2021 - 9/30/2022												
Funding Source/Amount												
District / Jurisdiction	UPC / Description	NHS/NHPP	NHFP	STP/STBG	EB/MG	CMAQ	HIP	RSTP	BR/BROS	DEMO	SAFE	TOTAL
Rail												
0	No projects identified in the MPO Area											
	TIP:	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
Remaining:												*

STIP Transactions												
Kingsport MPO Study Area												
Federal Obligated Funds: 10/1/2021 - 9/30/2022												
Funding Source/Amount												
District / Jurisdiction	UPC / Description	NHS/NHPP	NHFP	STP/STBG	EB/MG	CMAQ	HIP	RSTP	BR/BROS	DEMO	SAFE	TOTAL
Enhancement												
0	No projects identified in the MPO Area											
TIP:		\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
Remaining:												*

DRAFT

# VIRGINIA PROJECTS

STIP Transactions												
Kingsport MPO Study Area												
Federal Obligated Funds: 10/1/2021 - 9/30/2022												
Funding Source/Amount												
District / Jurisdiction	UPC / Description	NHS/NHPP	NHFP	STP/STBG	EB/MG	CMAQ	HIP	RSTP	BR/BROS	DEMO	SAFE	TOTAL
Grouping												
G607 Construction : Bridge Rehabilitation/Replacement/Reconstruction - (T9927607)												
7607	TIP:	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
	Obligated:	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
	Released:	(\$159,157)	\$0	(\$272,322)	\$0	\$0	\$0	\$0	\$0	\$0	\$0	(\$431,479)
Remaining:												*
G606 Construction : Safety/ITS/Operational Improvements - (T9927606)												
7606	TIP:	\$1,585,351	\$0	\$35,000	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$1,620,351
	Obligated:	\$0	\$0	\$221,582	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$221,582
	Released:	\$0	\$0	(\$511,851)	\$0	\$0	\$0	\$0	\$0	\$0	\$0	(\$511,851)
Remaining:												\$1,398,769
GROUPING SUBTOTAL												
	TIP:	\$1,585,351	\$0	\$35,000	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$1,620,351
	Obligated:	\$0	\$0	\$221,582	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$221,582
	Released:	(\$159,157)	\$0	(\$784,173)	\$0	\$0	\$0	\$0	\$0	\$0	\$0	(\$943,330)
Remaining:												\$1,398,769
MPO SUBTOTAL												
	TIP:	\$1,585,351	\$0	\$35,000	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$1,620,351
	Obligated:	\$0	\$0	\$221,582	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$221,582
	Released:	(\$159,157)	\$0	(\$784,173)	\$0	\$0	\$0	\$0	\$0	\$0	\$0	(\$943,330)
Remaining:												\$1,398,769

## STIP Grouping Detail

Kingsport MPO Study Area

Federal Obligated Funds: 10/1/2021 - 9/30/2022

## Funding Source/Amount

District / Jurisdiction	UPC / Description	NHS/NHPP	NHFP	STP/STBG	EB/MG	CMAQ	HIP	RSTP	BR/BROS	DEMO	SAFE	TOTAL
T9927606 - Construction : Safety/ITS/Operational Improvements												
Gate City												
121022	Kane St - Construct New Sidewalk, Curb & Gutter, ADA Ramps - Jackson St; Jones St (0.4680 MI)											
FedID(s)	5404126											
0023	TIP:	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
	Obligated:	\$0	\$0	\$135,582	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$135,582
Remaining:												*
Scott County												
104189	Safety Improvements-Rte. 224 (Phase II-remove curve) - 0.064 Mi. S. Int. Rte. 614; 0.332 Mi. S. Int. rte. 614 (0.2570 MI)											
FedID(s)	5102172											
0224	TIP:	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
InCO	Obligated:	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
	Released:	\$0	\$0	(\$499,361)	\$0	\$0	\$0	\$0	\$0	\$0	\$0	(\$499,361)
Remaining:												*
Scott County												
113765	MANVILLE RD - REPLACE AND CONSTRUCT NEW SIDEWALK - East Jackson St.; Back St. (0.4800 MI)											
FedID(s)	5102214											
0665	TIP:	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
	Obligated:	\$0	\$0	\$51,000	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$51,000
Remaining:												*
Scott County												
113770	RTE. 23 INSTALL RUMBLE STRIPS, GUARDRAIL, DRAINAGE IMPROV. - Int. of Alt. Rte. 58 and Rte. 23; West Jackson Street (2.6840 MI)											
FedID(s)	5B03074											
0023	TIP:	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
	Obligated:	\$0	\$0	\$35,000	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$35,000
Remaining:												*
Scott County												
113892	State Route 72 Scott County Rumble Strips - Intersection VA-71E; Intersection VA-65E (10.8000 MI)											
FedID(s)	5404123											
0072	TIP:	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
InCO	Obligated:	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
	Released:	\$0	\$0	(\$12,490)	\$0	\$0	\$0	\$0	\$0	\$0	\$0	(\$12,490)
Remaining:												*
T9927606 - CONSTRUCTION : SAFETY/ITS/OPERATIONAL IMPROVEMENTS SUBTOTAL												
	TIP:	\$1,585,351	\$0	\$35,000	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$1,620,351
	Obligated:	\$0	\$0	\$221,582	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$221,582
	Released:	\$0	\$0	(\$511,851)	\$0	\$0	\$0	\$0	\$0	\$0	\$0	(\$511,851)
Remaining:												\$1,398,769

# VIRGINIA PROJECTS

## STIP Grouping Detail

Kingsport MPO Study Area

Federal Obligated Funds: 10/1/2021 - 9/30/2022

### Funding Source/Amount

District / Jurisdiction	UPC / Description	NHS/NHPP	NHFP	STP/STBG	EB/MG	CMAQ	HIP	RSTP	BR/BROS	DEMO	SAFE	TOTAL
T9927607 - Construction : Bridge Rehabilitation/Replacement/Reconstruction												
Scott County												
86598 SB&NB 23 over NF Holston R Va struc 1003 & 1108 FED ID 16543 - 0.086 Mi. S. Intersection Rte. 707; 0.154 Mi. N. Intersection Rte. 614 (0.3470 MI)												
FedID(s) 5102162												
0023	TIP:	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
InCO	Obligated:	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
	Released:	(\$159,157)	\$0	(\$272,322)	\$0	\$0	\$0	\$0	\$0	\$0	\$0	(\$431,479)
Remaining:												*
T9927607 - CONSTRUCTION : BRIDGE REHABILITATION/REPLACEMENT/RECONSTRUCTION SUBTOTAL												
	TIP:	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
	Obligated:	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
	Released:	(\$159,157)	\$0	(\$272,322)	\$0	\$0	\$0	\$0	\$0	\$0	\$0	(\$431,479)
Remaining:												*
MPO SUBTOTAL												
	TIP:	\$1,585,351	\$0	\$35,000	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$1,620,351
	Obligated:	\$0	\$0	\$221,582	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$221,582
	Released:	(\$159,157)	\$0	(\$784,173)	\$0	\$0	\$0	\$0	\$0	\$0	\$0	(\$943,330)
Remaining:												\$1,398,769

### PROJECT UPDATES

#### KINGSPORT/SULLIVAN COUNTY

- Greenbelt – West End
- Brickyard Bicycle & Pedestrian Bridge
- Main Street Rebuild
- Island Road Rebuild
- Resurfacing Grouping – Kingsport
- Fort Robinson Bridge over Dry Creek
- SR-126 (Memorial Boulevard) – Phase I
- SR-126 (Memorial Boulevard) – Phase II
- SR-36 (Fort Henry Drive) – SR-75 to I-81
- SR-347 (Rock Springs Road)
- SR-93 Improvements
  - .02 Washington/Sullivan County section
  - .03 Sullivan County section
- I-81 ITS Expansion

#### RECENTLY COMPLETED

- Stone Drive Sidewalk
- US-23 Access Management and Park & Ride Lot (Gate City)
- Memorial Blvd/Fort Henry Dr Intersection
- Independence Avenue
- Hammond Avenue
- SR-93 (.01 Washington County section)

#### HAWKINS COUNTY

- 

#### VIRGINIA

- US-23/58 and Hilton Road Intersection

---

#### PLANS, STUDIES, & OTHER DOCUMENTS

- Local Road Safety Plan
- FY23-26 Transportation Improvement Program
- US-23 – Virginia (Project Pipeline & SMART SCALE)
- Urban Transportation Planning Grant – SR-93/SR-1 Interchange Area Study
- Urban Transportation Planning Grant – East Center Street Corridor Study (Completed March 2022)
- Long Range Transportation Plan (Adopted May 2022)



# **TRANSPORTATION IMPROVEMENT PROGRAM FISCAL YEARS 2023-2026**

Adopted \_\_\_\_\_

This Fiscal Year 2023 – 2026 Transportation Improvement Program was developed by the Kingsport Metropolitan Transportation Planning Organization (MTPO) in cooperation with:

U.S. Department of Transportation

Federal Highway Administration

Federal Transit Administration

Tennessee Department of Transportation

Virginia Department of Transportation

An electronic copy of this document can be found on our website:

<https://www.kingsporttn.gov/city-services/kmtpo/>

or

[www.kptmtpo.com](http://www.kptmtpo.com)

E-mail: [MTPO@KingsportTN.gov](mailto:MTPO@KingsportTN.gov)

*The Kingsport Metropolitan Transportation Planning Organization does not exclude, deny, or discriminate on the basis of race, color, national origin, gender, age, religion, disability, or any other characteristic protected under applicable federal or state law in its hiring or employment practices, or in its admission to, access to, or operations of its programs, services, or activities.*

## Table of Contents

Resolution and Self-Certification .....	5
Abbreviations .....	7
1. Introduction .....	9
1.1 About the Kingsport MTPO .....	9
1.2 Metropolitan Planning Area .....	9
1.3 Organizational Structure .....	10
2. Transportation Improvement Program Development .....	11
2.1 Purpose of the Document .....	11
2.2 Planning Horizon .....	11
2.3 Project Priorities and Criteria .....	12
2.4 Project Selection .....	14
2.5 Project Phases .....	16
2.6 Project Groupings .....	16
2.7 Advance Construction .....	27
3 Public Participation, Coordination, and Consultation .....	28
3.1 Public Participation .....	28
3.2 Consultation with Other Agencies .....	28
3.3 Title VI, Environmental Justice, ADA .....	29
3.4 Annual Listing of Obligated Projects .....	30
4 TIP Amendments and Administrative Modifications .....	30
5 Performance-Based Planning and Programming .....	32
5.1 Safety Performance Measures (PM1) .....	34
5.2 Pavement and Bridge Condition Performance Measures (PM2) .....	34
5.3 System Performance Measures (PM3) .....	35
5.4 Transit Asset Management (TAM) and Transit Safety .....	36
5.5 Linking PBPP to the LRTP and TIP .....	40
6 Financial Plan .....	41
6.1 Fiscal Constraint .....	41
6.2 Federal Funding .....	41
6.3 Federal Apportionment .....	44
6.4 State Funding .....	45

6.5 Local Funding .....	45
6.6 Operations and Maintenance Funding .....	45
7 Status of Projects in FY 2020-2023 TIP .....	46
8 Project Pages.....	49

DRAFT

## Resolution and Self-Certification

### **RESOLUTION BY THE EXECUTIVE BOARD OF THE KINGSPORT METROPOLITAN TRANSPORTATION PLANNING ORGANIZATION (MTPO) TO ADOPT THE KINGSPORT AREA FY 2023-2026 TRANSPORTATION IMPROVEMENT PROGRAM (TIP)**

**WHEREAS**, the Kingsport Metropolitan Transportation Planning Organization (MTPO) is the designated Metropolitan Planning Organization (MPO) for the Kingsport urbanized area in Tennessee and Virginia and is responsible for carrying out a comprehensive, cooperative, and continuous transportation planning process; and

**WHEREAS**, the Kingsport MTPO prepared the Fiscal Year 2023-2026 TIP, a cooperatively developed program of transportation projects selected to be advanced during the program's four-year period, in accordance with planning requirements in federal laws and regulations; and

**WHEREAS**, no local highway or transit projects are eligible for federal funds until they are programmed in the TIP; and

**WHEREAS**, the Kingsport MTPO has involved the public and interested stakeholders in accordance with the Public Participation Plan prior to finalizing the TIP.

#### **NOW THEREFORE BE IT RESOLVED BY THE EXECUTIVE BOARD OF THE KINGSPORT METROPOLITAN TRANSPORTATION PLANNING ORGANIZATION AS FOLLOWS:**

The FY 2023-2026 Transportation Improvement Program has been developed in accordance with all applicable requirements and this resolution is adopted as an endorsement of the FY 2023-2026 TIP.

**RESOLUTION APPROVED:**

Date: \_\_\_\_\_

\_\_\_\_\_  
Paul Montgomery, Chairman  
Kingsport MTPO Executive Board

\_\_\_\_\_  
Lesley Phillips  
Kingsport MTPO Staff

## METROPOLITAN TRANSPORTATION PLANNING PROCESS CERTIFICATION

In accordance with 23 CFR 450.336, the Kingsport Metropolitan Transportation Planning Organization, the Tennessee Department of Transportation, and the Virginia Department of Transportation hereby certify that the metropolitan transportation planning process is addressing major issues facing the Kingsport, TN-VA urbanized area, and is being carried out in accordance with the following requirements:

- I. 23 U.S.C. 134 and 135, 49 U.S.C. 5303 and 5304 (Highways and Transit).
- II. Title VI of the Civil Rights Act of 1964, as amended (42 U.S.C. 2000 d-1) and 49 CFR part 21.
- III. 49 U.S.C. 5332, prohibiting discrimination on the basis of race, color, creed, national origin, sex, or age in employment or business opportunity.
- IV. 49 CFR part 26 regarding the involvement of disadvantaged business enterprises in USDOT-funded projects.
- V. 23 CFR part 230, regarding the implementation of an equal employment opportunity program on federal and federal-aid highway construction contracts.
- VI. Provisions of the Americans with Disabilities Act of 1990 (42 U.S.C. 12101 et seq) and 49 CFR parts 27, 37, and 38.
- VII. In nonattainment and maintenance areas, sections 174 and 176 (c) and (d) of the Clean Air Act, as amended, 42 U.S.C. 7504, 7506 (c) and (d), and 40 CFR part 93.
- VIII. The Older Americans Act, as amended (42 U.S.C. 6101), prohibiting discrimination on the basis of age in programs or activities receiving federal financial assistance.
- IX. Section 324 of Title 23 U.S.C. regarding the prohibition of discrimination based on gender.
- X. Section 504 of the Rehabilitation Act of 1973 (29 U.S.C. 794) and 49 CFR part 27 regarding discrimination against individuals with disabilities.

---

Paul Montgomery, Chairman  
Kingsport MTPO Executive Board

Date

---

Lesley Phillips  
Kingsport MTPO Staff

Date

---

Tabitha Crowder  
Bristol District Engineer  
Virginia Department of Transportation

Date

---

Ronnie Porter  
Director, TDOT Program Development  
& Administration Division

Date

## Abbreviations

3C	Continuous, Cooperative, Comprehensive Transportation Planning Process
AC	Advance Construction
ACQ	Acquisition
ADA	Americans with Disabilities Act
BFP	Bridge Formula Program
BIL	Bipartisan Infrastructure Law
BIP	Bridge Investment Program
CAP	Capital
CFR	Code of Federal Regulations
CMAQ	Congestion Mitigation and Air Quality Improvement Program
CONST	Construction
CPR	Capital Project Revenue
CRP	Carbon Reduction Program
DOT	Department of Transportation
DRPT	Department of Rail and Public Transportation
EPA	Environmental Protection Agency
ER	Emergency Relief Program
EV	Electric Vehicle
FAST Act	Fixing America's Surface Transportation Act
FFY	Federal Fiscal Year
FLAP	Federal Lands Access Program
FLTP	Federal Lands Transportation Program
FY	Fiscal Year
FHWA	Federal Highway Administration
FHWA-TN	Federal Highway Administration – Tennessee Division
FTA	Federal Transit Administration
GARVEES	Grant Anticipation Revenue Vehicles
HSIP	Highway Safety Improvement Program
IIJA	Infrastructure Investment and Jobs Act
ITS	Intelligent Transportation Systems
KATS	Kingsport Area Transit Service
LOS	Level of Service
LRTP	Long Range Transportation Plan
LTS	Level of Traffic Stress
MAP-21	Moving Ahead for Progress in the 21 <sup>st</sup> Century Act
MAINT	Maintenance
MEOC	Mountain Empire Older Citizens
MET	Mountain Empire Transit
MOU	Memorandum of Understanding
MPA	Metropolitan Planning Area
MPO	Metropolitan Planning Organization
MTPO	Metropolitan Transportation Planning Organization
NAAQS	National Ambient Air Quality Standards
NEPA	National Environmental Policy Act

NET Trans	Northeast Tennessee Regional Public Transit
NEVI	National Electric Vehicle Infrastructure Formula Program
NHFP	National Highway Freight Program
NHPP	National Highway Performance Program
NHS	National Highway System
NOx	Nitrogen Oxides
NTD	National Transit Database
OP	Operations
PBPP	Performance Based Planning and Programming
PE-D	Preliminary Engineering – Design
PE-N	Preliminary Engineering – NEPA
PHSIP	Penalty Highway Safety Improvement Program
PM	Performance Measures
PM1	Performance Measures 1 – Safety
PM2	Performance Measures 2 – Infrastructure Condition
PM2.5	Small Particulate Matter
PM3	Performance Measures 3 – System Performance
PPP	Public Participation Plan
PROTECT	Promoting Resilient Operations for Transformative, Efficient, and Cost-Saving Transportation Formula Program
PTASP	Public Transportation Agency Safety Plan
RCP	Reconnecting Communities Pilot Program
ROW	Right-of-Way
RSP	Revenue Sharing Program
SHSP	Strategic Highway Safety Plan
SMS	Safety Management System
SS4A	Safe Streets and Roads for All
STBG	Surface Transportation Block Grant Program
STIP	State Transportation Improvement Program
TAM	Transit Asset Management
TAP	Transportation Alternatives Program
TCC	Technical Coordinating Committee
TDOT	Tennessee Department of Transportation
TEVI	Tennessee Electric Vehicle Infrastructure Deployment Plan
TIP	Transportation Improvement Program
TR	Training
ULB	Useful Life Benchmark
Uniform Act	Uniform Relocation Assistance and Real Property Acquisition Policies Act
UPWP	Unified Planning Work Program
USC	United States Code
VDOT	Virginia Department of Transportation
VMT	Vehicle Miles Traveled
VOC	Volatile Organic Compounds
YOE	Year of Expenditure

# 1. Introduction

## 1.1 About the Kingsport MTPO

The Kingsport Metropolitan Transportation Planning Organization (MTPO) is an inter-governmental agency that is responsible for transportation planning and programming in the greater Kingsport metropolitan area. Each urban area with a population of more than 50,000 in the United States has a designated Metropolitan Planning Organization (MPO/MTPO) which acts as a liaison between local communities, their citizens, and the state departments of transportation (DOTs). MTPOs are important because they direct where and how available state and federal dollars for transportation improvements will be spent.

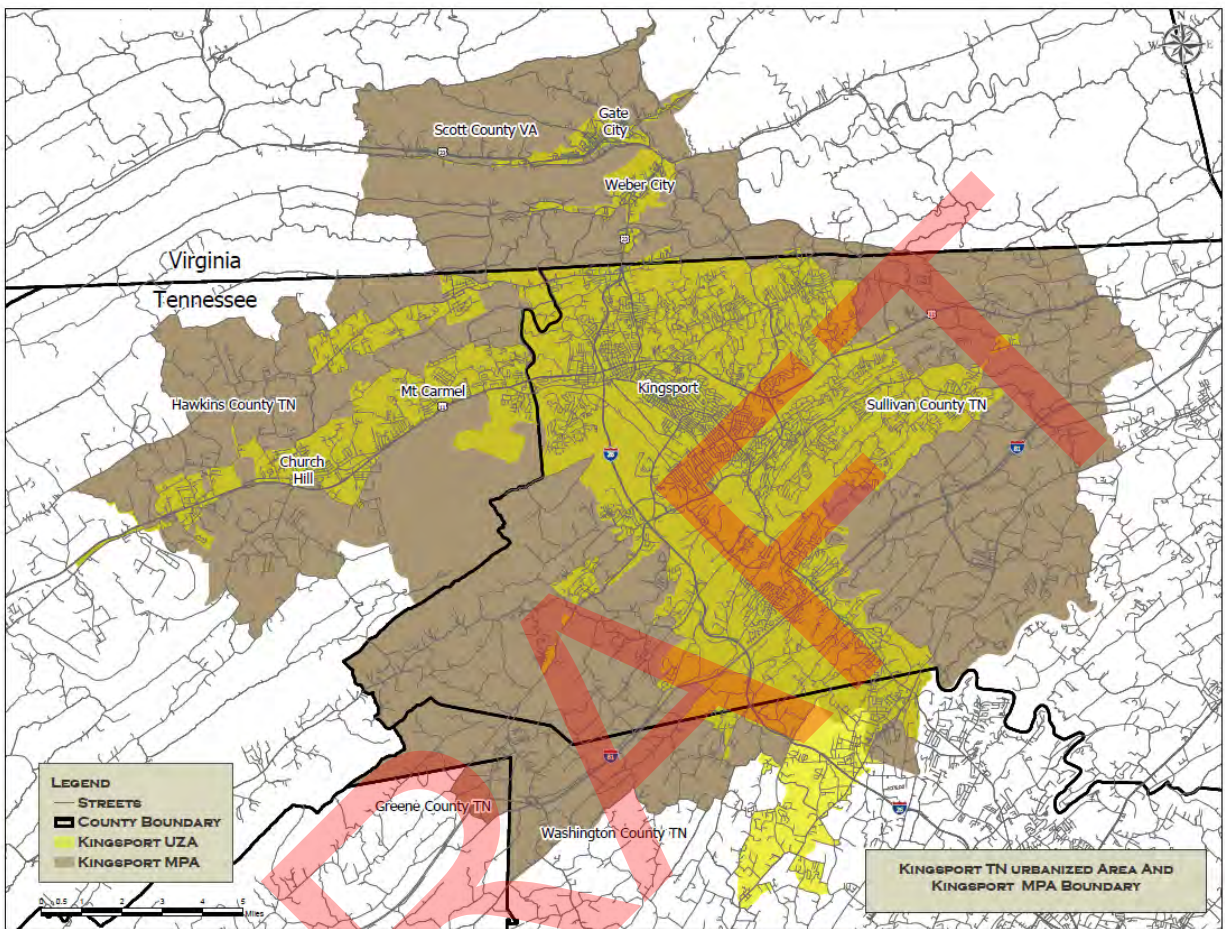
The Kingsport metropolitan area became eligible for MPO/MTPO status when it reached the minimum requirement of 50,000 in population with the 1970 census. The Kingsport MTPO was established in 1977 through the efforts of the Tennessee Department of Transportation (TDOT), the Virginia Department of Transportation (VDOT), the Federal Highway Administration (FHWA), and the Federal Transit Administration (FTA). The Kingsport MTPO is a bi-state MPO meaning the Kingsport Urbanized Area lies in two states (Tennessee and Virginia). Federal law requires the Kingsport MTPO to conduct transportation planning activities within the Kingsport Urbanized Area in a continuous, cooperative, and comprehensive (3C) process as defined in the following federal legislation and regulations:

- Infrastructure Investment and Jobs Act (IIJA)/Bipartisan Infrastructure Law (BIL) – Current Transportation Authorization
- Fixing America's Surface Transportation (FAST) Act – Previous Transportation Authorization;
- Title 23 of the United States Code (USC), Section 134 – Metropolitan Transportation Planning;
- Title 49 of the USC, Section 5303 – Formula Grant Program for Metropolitan Transportation Planning;
- Title 23 of the Code of Federal Regulations (CFR), Section 450 – Metropolitan Transportation Planning and Programming; and
- Title 49 CFR, Section 613, Subpart A – Metropolitan Transportation Planning and Programming.

## 1.2 Metropolitan Planning Area

Under current federal law, any urbanized area with a population over 50,000 must be in a Metropolitan Planning Area (MPA) for a Metropolitan Planning Organization (MPO). A MPA is the geographic area determined by agreement between the MPO for the area and the Governor, in which the metropolitan transportation planning process is carried out. At a minimum, the MPA must encompass the Census Urbanized Area and the contiguous geographic area likely to become urbanized within the next twenty (20) years. In Tennessee, the Kingsport MTPO MPA consists of the City of Church Hill, the Town of Mount Carmel, the City of Kingsport, and portions of Hawkins County, Sullivan County, Washington County, and Greene County. In Virginia, the Kingsport MTPO MPA consists of Weber City, Gate City, and a portion of Scott County. **Figure 1** shows the Kingsport MTPO Urbanized Area and the MPA boundary. Please note, in Washington County, the portion of the Kingsport Urbanized Area that falls outside the Kingsport MPA boundary is under the neighboring Johnson City MTPO's MPA. Through a Memorandum of Agreement (MOA), the Johnson City MTPO is responsible for transportation planning activities in that area of the Kingsport Urbanized Area.

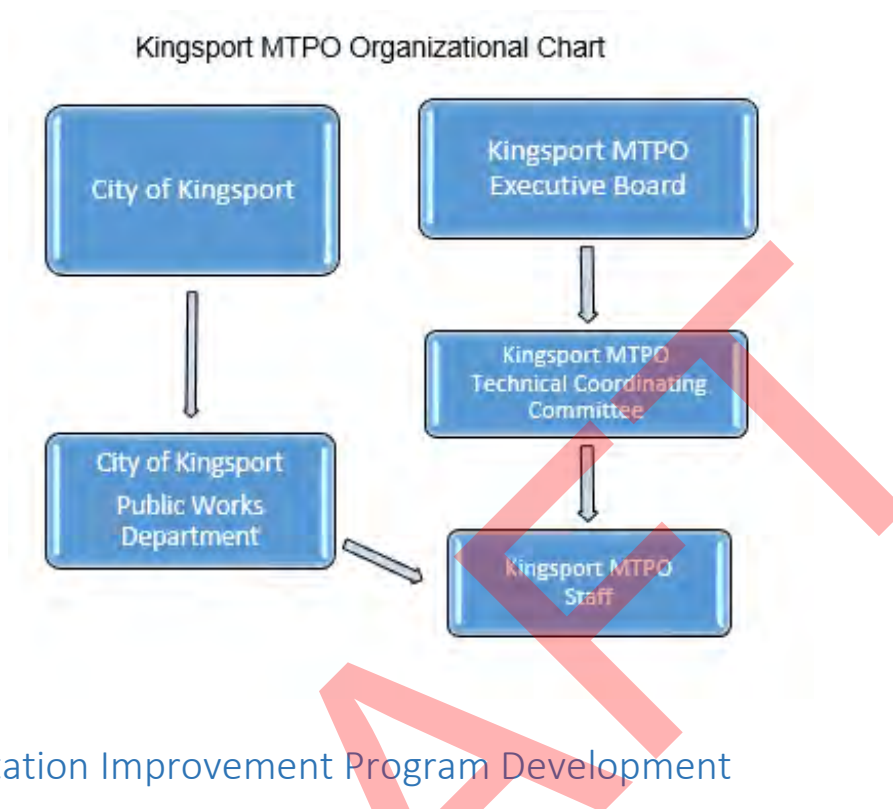
Figure 1 – Kingsport MTPO Planning Area



### 1.3 Organizational Structure

The Kingsport MTPO is comprised of an Executive Board, a Technical Coordinating Committee (TCC), and administrative staff. The Executive Board is the overall governing body for the Kingsport MTPO. The Executive Board has the authority to adopt regional transportation plans and programs. The TCC will make recommendations to the MTPO Executive Board at key points during the planning process. The administrative staff is housed as a division of the Public Works Department of the City of Kingsport. **Figure 2** shows the Organizational Structure of the Kingsport MTPO.

Figure 2 – Kingsport MTPO Organizational Chart



## 2. Transportation Improvement Program Development

### 2.1 Purpose of the Document

The purpose of the Transportation Improvement Program (TIP) is to identify and program funds for all transportation projects within the Kingsport MPA that are funded by federal programs in Titles 23 (Highways) and 49 (Transportation) of the USC. The TIP identifies the region's highest priority transportation projects, develops a multi-year implementation program, and identifies necessary funding. The TIP is cooperatively developed at least every four years by the Kingsport MTPO staff in coordination with its member jurisdictions, TDOT, VDOT, FHWA, FTA, and public transportation providers. The TIP contains all federally funded projects and regionally significant projects regardless of the funding source.

Once the draft TIP is completed, it is submitted to TDOT, VDOT, FHWA, and FTA for comments. Once the comments have been addressed, the TIP follows the process described in the Public Participation Plan (PPP) to provide public notice and an opportunity for the public to comment. After any public comments are addressed, the TIP is recommended for adoption by the Kingsport MTPO Executive Board. The final TIP is forwarded to TDOT and VDOT to be included by reference in the State Transportation Improvement Program (STIP) and to be approved by FHWA and FTA.

### 2.2 Planning Horizon

Projects that are included in the TIP must be consistent with the Kingsport MTPO Long Range Transportation Plan (LRTP), which is required to cover at least a twenty (20) year timeframe of planning for projects in the future. The LRTP provides the foundation for all regionally significant transportation projects within the MTPO area. Consistency between the LRTP and the TIP occurs when projects are drawn

from the LRTP and recommended for immediate implementation in the TIP (next 1 to 4 years). The 2045 LRTP was adopted by the Kingsport MTPO Executive Board on May 12, 2022. At a minimum, the TIP is required to cover at least a four (4) year horizon. This TIP covers the federal fiscal years (FFYs) period of October 1, 2022 through September 30, 2026. The previous TIP covered the FFYs period of October 1, 2019 to September 30, 2022 and was adopted by the Kingsport MTPO Executive Board on November 7, 2019. The next TIP will cover the FFYs period of October 1, 2026 through September 30, 2029, the development cycle will begin in early 2026.

### 2.3 Project Priorities and Criteria

The development of the FY2023-2026 TIP was shaped largely by the goals of the LRTP, federal transportation legislation, ten (10) planning factors, seven (7) national goals, performance measures and targets, current and emerging trends within the region relative to population and employment growth, and the desires of local jurisdictions and citizens within the region.

As part of Kingsport's 2045 LRTP, three (3) goals were established to guide the development of future transportation solutions for the region over the next 20 years.

#### **2045 Long Range Transportation Plan Regional Goals:**

**Goal 1 – Livability** – Provide safe, secure, convenient, and active transportation choices to all citizens that strengthen the livability and health of our communities and region.

- a) Improve safety by reducing transportation-related fatalities and injuries.
- b) Make streets a place for all users – “Complete Streets”.
- c) Promote active transportation by increasing opportunities for short trips through improved accessibility to alternative modes.
- d) Strengthen local and regional partnerships to advance viable and affordable public transportation and mobility options.
- e) Strive to balance capacity and mobility needs for all users whereby connections to and across modes and land uses function harmoniously.

**Goal 2 – Sustainability** – Promote and advance sustainable transportation choices for the greater Kingsport region that support long-term economic, social, and environmental sustainability within and throughout the region.

- a) Maintain what we have – take a “state of good repair” approach to our community's transportation assets.
- b) Seek cost-effective management solutions and new technologies as a means of addressing congestion, improving travel time reliability, reducing transportation delay, and improving system operations.
- c) Seek improvement options which minimize adverse impacts of surface transportation to historical, social, cultural, and natural environments, including stormwater impacts.
- d) Promote investment solutions that improve the resiliency of the transportation system and reduce transportation impacts on air-quality.

**Goal 3 – Prosperity** – Promote transportation policies and investments that advance quality economic development and redevelopment, economic competitiveness, and efficient access to people, places, and goods and services within and throughout the region.

- a) Strategically target transportation investments to areas supportive and conducive to growth and redevelopment initiatives.
- b) Support equitable transportation investments and policies that work to create jobs, efficiently move freight, and improve access to all modes and destinations while embracing access management and corridor management strategies that preserve the long-term functionality of a roadway's capacity and safety.
- c) Support multimodal investments, especially bicycle and pedestrian enhancements. Promote tourism and health contribute to the local and regional economy.
- d) Support land use and development patterns that reduce transportation costs and expenditures and improve accessibility for all.
- e) Continue to promote and foster an environment by which citizens, communities, jurisdictions, elected officials, and other stakeholders can collaboratively advance a sustainable multimodal transportation system that provides safe and secure connections throughout a livable and prosperous region.

On November 15, 2021, President Biden signed the Infrastructure Investment and Jobs Act (IIJA), also known as the Bipartisan Infrastructure Law (BIL) into law. The IIJA/BIL superseded the Fixing America's Surface Transportation (FAST) Act and represents the current federal legislation funding source for transportation programs. The IIJA/BIL is the largest long-term investment in our infrastructure and economy in our Nation's history. It provides funding over fiscal years 2022 through 2026 for infrastructure including roads, bridges, and mass transit.

**National Goals:** Title 23 USC § 150 lists a set of seven (7) national transportation goals for the federal-aid highway system:

- 1) **Safety** – To achieve a significant reduction in traffic fatalities and serious injuries on all public roads.
- 2) **Infrastructure condition** – To maintain the highway infrastructure asset system in a state of good repair.
- 3) **Congestion reduction** – To achieve a significant reduction in congestion on the National Highway System.
- 4) **System reliability** – To improve the efficiency of the surface transportation system.
- 5) **Freight movement and economic vitality** – To improve the National Highway Freight Network, strengthen the ability of rural communities to access national and international trade markets, and support regional economic development.
- 6) **Environmental sustainability** – To enhance the performance of the transportation system while protecting and enhancing the natural environment.
- 7) **Reduce project delivery delays** – To reduce project costs, promote jobs and the economy, and expedite the movement of people and goods by accelerating project completion through eliminating delays in the project development and delivery process, including reducing regulatory burdens and improving agencies' work practices.

**Federal Planning Factors:** Title 23 USC § 134 lists ten planning factors to be considered by the MTPo in developing transportation plans and programs:

- 1) Support the economic vitality of the metropolitan area, especially by enabling global competitiveness, productivity, and efficiency;

- 2) Increase the safety of the transportation system for motorized and non-motorized users;
- 3) Increase the security of the transportation system for motorized and non-motorized users;
- 4) Increase the accessibility and mobility of people and freight;
- 5) Protect and enhance the environment, promote energy conservation, improve the quality of life, and promote consistency between transportation improvements and state and local planned growth and economic development patterns;
- 6) Enhance the integration and connectivity of the transportation system, across and between modes, for people and freight;
- 7) Promote efficient system management and operation;
- 8) Emphasize the preservation of the existing transportation system;
- 9) Improve the resiliency and reliability of the transportation system and reduce or mitigate stormwater impacts and surface transportation; and
- 10) Enhance travel and tourism.

To create a stronger link between the stated goals and objectives of the 2045 LRTP and transportation improvements ultimately selected for funding by the MTPO, the MTPO Executive Board established evaluation criteria to guide the review and development of projects ultimately selected for inclusion into the 2045 LRTP. Each transportation recommendation considered for inclusion in the 2045 LRTP was evaluated by comparing the project's need with the criteria listed below.

<b>2045 LONG RANGE TRANSPORTATION PLAN PROJECT EVALUATION CRITERIA</b>		
<b>Priority</b>	<b>Measure</b>	<b>Points</b>
Safety	Number of vehicle crashes, number of bike/ped crashes, fatal and serious injury vehicle crashes.	25
Operational Efficiency	Existing level of service (LOS), future LOS, traffic operations, system redundancy, and traffic volume.	20
Accessibility	Population growth, employment growth served and improved system connectivity.	10
Active Transportation	Non-motorized demand, targeted populations served (age 65+, low income, disabled, etc.), and level of traffic stress (LTS) for pedestrians and bicyclists.	15
Environmental	Number of challenging areas the project touches (floodplains, historical areas, steep slopes, parks). Capacity improving projects without widening or adding a new facility.	10
Economic	Percent of trucks in existing network, project within half mile of identified economic development nodes, job access, and improved access to tourist destinations.	20

## 2.4 Project Selection

The Kingsport MTPO issued a Call for Projects to member jurisdictions, interested parties, and the public on April 7, 2022. The MTPO, in cooperation with the state and public transportation operators, has the authority to select projects for inclusion in the TIP.

Projects included in the TIP are selected from the region's Long Range Transportation Plan (LRTP). In addition to the regional goals of the LRTP, the ten (10) Planning Factors, the seven (7) National Goals, and the LRTP Project Evaluation Criteria, the MTPO also used more specific criteria to select projects for

inclusion in the TIP. Projects included in prior TIPs, which have federal funds obligated, are given funding priority for the next phase of development.

TIP PROJECT EVALUATION CRITERIA		
Priority	Measure	Points
System Maintenance	Project maintains or improves an existing roadway, highway, or transit operation.	10
System Efficiency	Project improves the efficiency of the regional transportation system.	10
Environmental Quality	<ul style="list-style-type: none"> <li>• Project decreases pollution (air, water, noise, etc.).</li> <li>• Project improves the quality of life for the user and/or community.</li> </ul>	10
Mobility Options	<ul style="list-style-type: none"> <li>• Project contains transit enhancements, bike accommodations, or pedestrian accommodations.</li> <li>• Project improves or enhances the movement of freight.</li> <li>• Adverse or positive effects the project may have on the transportation of the disadvantaged, including minorities, elderly, and disabled residents. (-10 to +5 points for this item)</li> </ul>	25
Regional Approach	Project supports regional planning, future land uses, and economic development initiatives.	15
Safety	<ul style="list-style-type: none"> <li>• Project improves safety for all users.</li> <li>• Site of project is considered a high incident location.</li> </ul>	15
Security	Project addresses or improves the security of the transportation system and its users.	10
Financial Investments	Local match for this project is currently available.	5
ADDITIONAL PROJECT REQUIREMENTS		
Performance Measures	The TIP must link investment priorities to the Long Range Transportation Plan and adopted Performance Measures (PMs). Project sponsor must indicate the Performance Measures for which the project will provide a benefit and provide additional information about the project's impact on the selected PMs.	
ADA Transition Plan	Every city and county with fifty (50) employees or more must have an ADA Transition Plan and Self-Evaluation in order to receive Federal Transportation Funds. FHWA required all Transition Plans be completed by the end of 2019. Project sponsors are required to document their Transition Plan status with any application for funding.	

The projects eligible for inclusion in the TIP range from new construction and capital improvements for highways, transit, bicycle and pedestrian facilities, intercity transportation, to operational and safety improvements. Consideration is also given to the Tri-Cities Region Coordinated Public Transit – Human Services Transportation Plan, Americans with Disabilities Act (ADA) Transition Plans, the Kingsport MTPO Unified Planning Work Program (UPWP), Strategic Highway Safety Plans (SHSP) for Tennessee and Virginia, TDOT's Three Year Comprehensive Multimodal Program of Projects, as well as other corridor studies, subarea plans, and modal plans, such as the Kingsport MTPO Regional Bicycle and Pedestrian Plan.

Virginia Smart Scale (House Bill 2) was adopted in 2014 and requires the development of a prioritization and scoring process for project funding. The prioritization process evaluates projects as they relate to congestion, mitigation, economic development, accessibility, safety, environmental quality, and land use coordination. Although Smart Scale provides a quantifiable process for making project funding decisions, projects still require inclusion in the MTPO planning process and long-range transportation plan for Smart Scale eligibility and subsequently inclusion in the TIP for implementation.

## 2.5 Project Phases

Inclusion in the TIP is just one part of a project's journey through the planning and approval process. Projects in the TIP must first appear in the 2045 LRTP, which was adopted on May 12, 2022. One project can have many phases including preliminary engineering, environmental, design, right-of-way acquisition, and construction. It can take many years for one project to complete all phases and be ready for construction so all phases of a project may not be included in this TIP. In order to add a project phase to the TIP, funding must be identified and expected to be readily available to ensure the TIP remains fiscally constrained. The following table lists the types of project phases found in the TIP.

PROJECT PHASES		
Project Phase	Acronym	Description
Acquisition/Purchase	ACQ	Procuring equipment, software, or vehicles
Capital	CAP	Capital expenditures
Construction	CONST	Work by the agency or contractor(s) to build the project, possibly including utility relocation
Intelligent Transportation Systems	ITS	Procuring, developing, or integrating technology to manage transportation facilities, improve safety, or mobility
Maintenance	MAINT	Activities to preserve the transportation/transit system
Operations	OP	Operating the transportation system such as incurring costs related to the day-to-day operations or maintenance of transit vehicle systems, traffic signal systems, or intelligent transportation systems
Preliminary Engineering – NEPA	PE-N	Includes activities from the inception of the project, fulfilling the requirements of the National Environmental Policy Act of 1969 and all applicable legislation, regulations, executive orders, and directives, up to the approval of the environmental document
Preliminary Engineering - Design	PE-D	Preliminary engineering design work, according to accepted engineering practices, after approval of the environmental document
Right-of-Way	ROW	Work from the distribution of ROW plans up to advertising for bids or commencement of work by the agency, dealing with real property acquisition, temporary and permanent easements, and utility relocation
Training	TR	Training activities


## 2.6 Project Groupings

By agreement with TDOT and VDOT, the MTPO is including grouped projects in the TIP for funding categories or groupings. The use of project groupings is permitted under 23 CFR 450.326(h). Projects that

are funded by such groupings are to be of a scale small enough not to warrant individual identification and may be grouped by function, work type, and/or geographic area using the applicable classifications under 23 CFR 771.117(c) and (d) and/or CFR 40 part 93. Project groupings may only include projects that meet the following conditions: non-regionally significant, environmentally neutral, and exempt from air quality conformity.

Project groupings are structured by function and system. In this TIP, TDOT project groupings include the Surface Transportation System Preservation and Operation Urban Grouping utilizing Surface Transportation Block Grant Program (STBG) funds, the Safety Urban Grouping utilizing Highway Safety Improvement Program (HSIP) funds, and the National Highway System Preservation and Operation Urban Grouping utilizing National Highway Performance Program (NHPP) funds. VDOT program activities for state-wide and district-wide funding categories include Rail, Bridge Replacement and Repair, Safety/ITS/Operational Improvements, Transportation Alternatives, as well as maintenance categories and public transportation activities.

TDOT PROJECT GROUPINGS		
Grouping	Function	Allowable Work Types
Safety Grouping	Any strategy, activity or project on a public road that is consistent with the data-driven State Strategic Highway Safety Plan (SHSP) and corrects or improves a hazardous road location or feature or addresses a highway safety problem, including workforce development, training and education activities.	
Safety Grouping	<p>Eligibility of specific projects, strategies, and activities is generally based on:</p> <ul style="list-style-type: none"> <li>• Consistency with SHSP,</li> <li>• Crash experience, crash potential, or other data-supported means,</li> <li>• Compliance with the requirements of Title 23 of the U.S.C., and</li> </ul>	<ul style="list-style-type: none"> <li>• Intersection safety improvements</li> <li>• Pavement and shoulder widening (including a passing lane to remedy an unsafe condition)</li> <li>• Installation of rumble strips or another warning devices, if they do not adversely affect the safety or mobility of bicyclists and pedestrians</li> <li>• Installation of skid-resistant surface at intersections or locations with high crash frequencies</li> <li>• Improvements for pedestrian or bicyclist safety</li> <li>• Construction and improvement of a railway-highway grade crossing safety</li> </ul>

- 
- State's strategic or performance-based safety goals to reduce fatalities and serious injuries on all public roads.
  - Projects to upgrade railway-highway grade crossings by eliminating hazards and installing protective devices.
  - feature, including installation of protective devices
  - The conduct of a model traffic enforcement activity at a railway-highway crossing
  - Construction of a traffic calming feature
  - Elimination of a roadside hazard
  - Installation, replacement, and other improvements of highway signage and pavement markings, or a project to maintain minimum levels of retro-reflectivity that addresses a highway safety problem consistent with the SHSP
  - Installation of emergency vehicle priority control systems at signalized intersections
  - Installation of traffic control or other warning devices at locations with high crash potential
  - Transportation safety planning
  - Collection, analysis, and improvement of safety data
  - Planning integrated interoperable emergency communications equipment or operational or traffic enforcement activities (including police assistance) related to work zone safety
  - Installation of guardrails, barriers (including barriers between construction work zones and traffic lanes), and crash attenuators.
  - The addition or retrofitting of structures or other measures to eliminate or reduce crashes involving vehicles and wildlife
  - Installation of yellow-green signs and signals at pedestrian and bicycle crossings and in school zones.
  - Construction and operational improvements on high risk rural roads.
  - Geometric improvements to a road for safety purposes that improve safety.

**Grouping**

Safety  
Grouping  
(Section 130 or  
HSIP-R)

**Function**

Activities included as part of the  
Highway Railroad Grade Crossing  
program:

- Road safety audits.
- Roadway safety infrastructure improvements consistent with FHWA's "Highway Design Handbook for Older Drivers and Pedestrians" (FHWA-RD-01-103)
- Truck parking facilities eligible for funding under Section 1401 of MAP-21
- Systemic safety improvements
- Installation of vehicle-to-infrastructure communication equipment.
- Pedestrian hybrid beacons.
- Roadway improvements that provide separation between pedestrians and motor vehicles, including medians and pedestrian crossing islands.
- Other physical infrastructure projects not specifically enumerated in the list of eligible projects.
- Workforce development, training, and education activities

**Allowable Work Types**

- Elimination of hazards of railway-highway crossings, including the separation or protection of grades at crossings.
- Reconstruction of existing railroad grade crossing structures.
- Relocation of highways to eliminate grade crossings.
- Installation of protective devices.

**Grouping**

Highway  
Infrastructure  
Program (HIP)

**Function**

Provide flexible funding to  
address State and local  
transportation needs through the  
construction of highways, bridges,  
tunnels, including designated  
routes of the Appalachian  
development highway system and

**Allowable Work Types**

Construction of highways, bridges, tunnels, including designated routes of the Appalachian development highway system and local access roads under Section 14501 of Title 40.

local access roads under Section 14501 of Title 40.

**Grouping**

**Function**

**Allowable Work Types**

National Highway System Infrastructure Grouping

Projects for the preservation and improvement of the conditions and performance of the National Highway System (NHS), including

**Grouping**

**Function**

**Allowable Work Types**

National Highway System Infrastructure Grouping

- Rehabilitation, resurfacing, restoration, preservation, and operational improvements,
- Traffic operations,
- Bridge and tunnel improvements,
- Safety improvements,
- Bicycle and pedestrian improvements, and
- Environmental mitigation.

- Minor rehabilitation, pavement resurfacing, preventative maintenance, restoration, and pavement preservation treatments to extend the service life of highway infrastructure, including pavement markings and improvements to roadside hardware or sight distance
- Highway improvement work including slide repair, rock fall mitigation, drainage repairs, or other preventative work necessary to maintain or extend the service life of the existing infrastructure in a good operational condition
- Minor operational and safety improvements to intersections and interchanges such as adding turn lanes, addressing existing geometric deficiencies, and extending on/off ramps
- Capital and operating costs for intelligent transportation systems (ITS) and traffic monitoring, management, and control facilities and programs:
- Infrastructure-based intelligent transportation systems (ITS) capital improvements.
- Traffic Management Center (TMC) operations and utilities.
- Freeway service patrols.
- Traveler information.

		<ul style="list-style-type: none"> <li>• Bridge and tunnel construction (no additional travel lanes), replacement, rehabilitation, preservation, protection, inspection, evaluation, and inspector training and inspection and evaluation of other infrastructure assets, such as signs, walls, and drainage structures.</li> <li>• Development and implementation of a State Asset Management Plan including data collection, maintenance and integration, software costs, and equipment costs that support the development of performance-based management systems for infrastructure.</li> <li>• Rail-highway grade crossing improvements.</li> <li>• Highway safety improvements:</li> <li>• Installation of new or improvement of existing guardrail.</li> <li>• Installation of traffic signs and signals/lights.</li> <li>• Spot safety improvements.</li> <li>• Sidewalk improvements.</li> <li>• Pedestrian and/or bicycle facilities.</li> <li>• Traffic calming and traffic diversion improvements.</li> <li>• Noise walls,</li> <li>• Wetland and/or stream mitigation,</li> <li>• Environmental restoration and pollution abatement,</li> <li>• Control of noxious weeds and establishment of native species.</li> </ul>
<b>Grouping</b>	<b>Function</b>	<b>Allowable Work Types</b>
Surface Transportation Program Grouping	Projects and programs for the preservation and improvement of the conditions and performance of federal-aid highways and public roads, including:	Activities previously authorized under the Surface Transportation Program (STP):

Projects and programs for the preservation and improvement of the conditions and performance of federal-aid highways and public roads, including:

- Rehabilitation, resurfacing, restoration, preservation, and operational improvements on federal-aid highways and designated routes of the Appalachian Development Highway System (ADHS) and local access roads under 40 U.S.C. 14501,
- Traffic operations on federal-aid highways,
- Bridge and tunnel improvements on public roads,
- Safety improvements on public roads,
- Environmental mitigation
- Scenic and historic highway programs,
- Landscaping and scenic beautification,
- Historic preservation,
- Infrastructure projects for improving non-driver access

Activities previously authorized under the Surface Transportation Program (STP):

- Minor rehabilitation, pavement resurfacing, preventative maintenance, restoration, and pavement preservation treatments to extend the service life of highway infrastructure, including pavement markings and improvements to roadside hardware or sight distance
- Highway improvement work including slide repair, rock fall mitigation, drainage repairs, or other preventative work necessary to maintain or extend the service life of the existing infrastructure in a good operational condition
- Minor operational and safety improvements to intersections and interchanges such as adding turn lanes, addressing existing geometric deficiencies, and extending on/off ramps.
- Capital and operating costs for intelligent transportation systems (ITS) and traffic monitoring, management, and control facilities and programs:
  - Infrastructure-based intelligent transportation systems (ITS) capital improvements.
  - Traffic Management Center (TMC) operations and utilities.
  - Freeway service patrols,
  - Traveler information.
- Bridge and tunnel construction (no additional travel lanes), replacement, rehabilitation, preservation, protection, inspection, evaluation, and inspector training and inspection and evaluation of other infrastructure assets, such as signs, walls, and drainage structures
- Development and implementation of a State Asset Management Plan including data collection, maintenance and

to public transportation and enhanced mobility,

- Community improvement activities,

integration, software costs, and equipment costs that support the development of performance-based management systems for infrastructure.

- Rail - Highway grade crossing improvements
- Highway safety improvements:
  - Installation of new or improvement of existing guardrail.
  - Installation of traffic signs and signals/lights.
  - Spot safety improvements.
- Sidewalk improvements,
- Pedestrian and/or bicycle facilities,
- Traffic calming and traffic diversion improvements,
- Transportation Alternatives as defined by 23 U.S.C. 213(B), 23 U.S.C.. 101(A)(29), and Section 1122 of MAP-21.
- Noise walls,
- Wetland and/or stream mitigation,
- Environmental restoration and pollution abatement,
- Control of noxious weeds and establishment of native species

Activities previously authorized under the Transportation Enhancement Program:

- Pedestrian and bicycle facilities, safety, and educational activities.
- Acquisition of scenic easements and scenic or historic sites.
- Scenic or historic highway programs,
- Landscaping and other scenic beautification activities,
- Historic preservation,
- Rehabilitation and operation of historic transportation buildings, structures, or facilities,

Surface  
Transportation  
Program  
Grouping

- Transportation Enhancement projects,

Surface  
Transportation  
Program  
Grouping

- Safe Routes to School (SRTS) projects,

- Safe Routes to School (SRTS) projects,

- Preservation of abandoned railway corridors,
- Advertising,
- Archaeological planning and research,
- Environmental mitigation to address water pollution due to highway runoff or reduce vehicle-caused wildlife mortality while maintaining habitat connectivity.
- Establishment of transportation museums,
- Activities under the Tennessee Roadscapes grant program, including landscaping, irrigation, benches, trash cans, paths, and signage.

Infrastructure related activities:

- Sidewalk improvements
- Traffic calming and speed reduction improvements
- Pedestrian and bicycle crossing improvements
- On-street bicycle facilities
- Off-street bicycle and pedestrian facilities
- Secure bicycle parking facilities
- Traffic diversion improvements approximately within 2 miles of a school location.

Non-infrastructure related activities:

- Public awareness campaigns and outreach to press and community leaders.
- Traffic education and enforcement in the vicinity of schools
  - Student sessions on bicycle and pedestrian safety, health, and environment
  - Funding for training, volunteers, and managers of safe routes to school program.

Surface  
Transportation  
Program  
Grouping

- Transportation Alternatives projects,
- On- and off-road pedestrian and bicycle facilities,

Activities previously authorized under the Transportation Alternatives Program (TAP):

- Transportation Alternatives projects, construction, planning, and design of on-road and off-road trail facilities for pedestrians, bicyclists, and other non-motorized forms of transportation, including:
  - Sidewalk improvements.
  - Bicycle infrastructure.
  - Pedestrian and bicycle signals.
  - Traffic calming techniques.
  - Lighting and other safety-related infrastructure.
  - Transportation projects to achieve compliance with the Americans with Disabilities Act of 1990

- Transportation Alternatives projects,

- Construction, planning, and design of infrastructure-related projects and systems that will provide safe routes for non-drivers, including children, older adults, and individuals with disabilities to access daily needs
- Conversion and use of abandoned railroad corridors for trails for pedestrians, bicyclists, or other non-motorized transportation users
- Construction of turnouts, overlooks, and viewing areas

Surface  
Transportation  
Program  
Grouping

- Transportation Alternatives projects,

Community improvement activities, which include but are not limited to:

- Inventory, control, or removal of outdoor advertising.
- Historic preservation and rehabilitation of historic transportation facilities.
- Vegetation management in transportation rights-of-way to improve

Surface  
Transportation  
Program  
Grouping

- Transportation Alternatives projects,

roadway safety, prevents invasive species, and provides erosion control.

- Archaeological activities relating to impacts from implementation of a transportation project eligible under Title 23 of the U.S.C.

Any environmental mitigation activity, including pollution prevention and pollution abatement activities and mitigation to:

- Address storm water management, control, and water pollution prevention or abatement related to highway construction or due to highway runoff.
- Reduce vehicle-caused wildlife mortality or to restore and maintain connectivity among terrestrial or aquatic habitats

- Projects for the creation, rehabilitation, and maintenance of multi-use recreational trails.

- SRTS Program infrastructure-related projects, non-infrastructure-related activities (such as pedestrian and bicycle safety and educational activities advanced under the SRTS program), and SRTS Coordinator positions.
- Planning, designing, or constructing boulevards and other roadways largely in the right-of-way of former Interstate System routes or other divided highways

Surface  
Transportation  
Program  
Grouping

- Recreational Trail Program projects,

Recreational Trails Program activities under 23 U.S.C. 206.

- Maintenance and restoration of existing recreational trails
- Development and rehabilitation of trailside and trailhead facilities and trail linkages for recreational trails
- Purchase and lease of recreational trail construction and maintenance equipment
- Construction of new recreational trails

		<ul style="list-style-type: none"> <li>• Acquisition of easements and fee simple title to property for recreational trails or recreational trail corridors</li> <li>• Assessment of trail conditions for accessibility and maintenance</li> <li>• Development and dissemination of publications and operation of educational programs to promote safety and environmental protection</li> <li>• Payment of costs to the State incurred in administering the program</li> </ul>
<b>Grouping</b>	<b>Function</b>	<b>Allowable Work Types</b>
Workforce Development, Training, and Education Grouping	Surface transportation workforce development, training, and education activities.	<ul style="list-style-type: none"> <li>• Direct educational expenses (not including salaries) in connection with the education and training of transportation employees</li> <li>• National Highway Institute (NHI) course participation</li> <li>• College and University cooperative education programs relating to surface transportation including student internships, outreach to develop interest and promote participation in transportation careers, or activities that will help students prepare for a career in transportation</li> <li>• Local technical assistance programs (LTAP)</li> </ul>

## 2.7 Advance Construction

As allowed under 23 USC 115, Advance Construction (AC) is a technique which allows initiation of a project using non-federal funds while preserving eligibility for future federal-aid funds. Eligibility means that FHWA has determined that the project technically qualifies for federal-aid; however, no present or future federal funds are committed to the project. After an AC project is authorized, the project may be converted to regular federal-aid funding provided federal funds are made available for the project.

An AC project must meet the same requirements and be processed in the same manner as a regular federal-aid project. All phases of a project must meet federal requirements for the National Environmental Policy Act (NEPA), Uniform Relocation Assistance and Real Property Acquisition Policies Act (Uniform Act), etc., when any phase is implemented with federal-aid funds.

## 3 Public Participation, Coordination, and Consultation

### 3.1 Public Participation

Public involvement is a critical element in the development of plans and programs by the MTPO. The TIP is an important document because it provides citizens, the business community, and agencies a comprehensive understanding of the types of transportation projects that will be funded and implemented over the next several years. The Kingsport MTPO Public Participation Plan (PPP) provides guidelines for how the public and interested stakeholders will be involved in the development of the TIP and other documents. The full PPP is available on the MTPO website at <https://www.kingsporttn.gov/city-services/kmtpo/plans-and-documents/ppp/>. Throughout the development of the LRTP and the TIP, the public and interested stakeholders are given opportunities to review the draft documents and provide feedback. Since all projects included in the TIP must be in the LRTP or consistent with the LRTP, the public has already been made aware of planned projects. Following the process outlined in the PPP, before final adoption, the draft TIP is available for public review and comment for a minimum of ten (10) calendar days from the date of the public notice. All meetings, public hearings, and comment periods for the TIP are published on the MTPO website. In addition, the MTPO may post notices on social media, in other publications, and send news releases and media alerts as needed. Public involvement activities and time established for public review and comment on the TIP will satisfy the Program of Projects requirements for the Federal Transit Administration Urbanized Area Formula Program.

A Call for Projects was emailed to Kingsport MTPO member jurisdictions and announced on the MTPO website on April 7, 2022. The public review and comment period for the draft FY23-26 TIP was held October 24, 2022 through November 2, 2022. This public review period was announced on October 24, 2022 on the MTPO website and via email to stakeholders, partners, and interested parties. The document was updated based on comments received during the public comment period. In the event the Executive Board determines there are significant unresolved comments, it may defer adoption of the program until a subsequent meeting. If the TIP document changes significantly, the Executive Board may request an additional review period to allow the public the opportunity to comment on the revisions.

During the public review period, paper copies of the draft TIP document were available in the lobby of Kingsport City Hall, the Kingsport Public Library, and the MTPO office. The draft and final TIP documents are also available on the Kingsport MTPO website at <https://www.kingsporttn.gov/city-services/kmtpo/plans-and-documents/tip/>.

### 3.2 Consultation with Other Agencies

During development of the LRTP and TIP, the MTPO is required to consult and coordinate, as appropriate, with agencies and officials responsible for other planning activities within the MPA. Consultation and consideration of other related planning activities that are affected by transportation includes agencies

and officials representing state and local planned growth, economic development, tourism, environmental protection, airport operations, freight movers, recipients of Federal Transit Administration (FTA) funds, and other similar agencies. This consultation process, required by CFR Section 450.316, will help identify effective mitigation strategies for potential impacts of projects included in the Kingsport MTPO LRTP and TIP. Coordination with these agencies is primarily conducted through email correspondence but may also consist of phone calls or face to face meetings. These agencies are included in our email distribution list so they receive notices of MTPO meetings or other events and also receive notice of the development of MTPO plans/programs, including public review/comment periods. Before it was adopted, the TIP was available for public review and comment. This includes the draft document being emailed directly to stakeholders, partners, and interested parties for review. The public participation process shall be coordinated with the statewide transportation public involvement process through review and communication wherever possible. The Kingsport MTPO Interagency Consultation List is available in the PPP.

### 3.3 Title VI, Environmental Justice, ADA

Title VI, Environmental Justice, and the Americans with Disabilities Act (ADA) are priorities in all processes and projects of the Kingsport MTPO. Title VI of the Civil Rights Act of 1964 states “No person in the United States shall, on the grounds of race, color, or national origin be excluded from participation in, be denied the benefits of, or be subjected to discrimination under any program or activity receiving federal financial assistance.” The MTPO and the local transit systems maintain Title VI reporting requirements for appropriate federal and state agencies to assess current and proposed projects in relation to the requirements of Title VI. Correspondingly, Environmental Justice Executive Order 12898 of 1994 affirms “Each federal agency shall make achieving environmental justice part of its mission by identifying and addressing, as appropriate, disproportionately high and adverse human health or environmental effects of its programs, policies, and activities on minority populations and low-income populations.” Additionally, the Department of Transportation (DOT) updated Order 5610.2(a), Actions to Address Environmental Justice in Minority Populations and Low-Income Populations, which provides directives about how Environmental Justice communities are to be addressed in the planning process.

As part of FHWA’s regulatory responsibility under Title II of the ADA and Section 504 of the Rehabilitation Act of 1973, the FHWA ensures that recipients of federal aid and state and local entities that are responsible for roadways and pedestrian facilities do not discriminate on the basis of disability in any highway transportation program activity, service, or benefit they provide to the general public and to ensure that people with disabilities have equitable opportunities to use the public rights-of-way system.

In the fall of 2016 each city and county in Tennessee received a letter from TDOT explaining FHWA-TN informed TDOT that they must ensure every city and county with fifty (50) or more employees must complete an ADA Transition Plan and Self-Evaluation in order to receive Transportation Funds. The Transition Plan must be completed and submitted by December 2019 or the agency risks losing TDOT funding. The table below gives the current status of ADA Transition Plans and Self-Evaluations for Kingsport MTPO’s member jurisdictions with fifty (50) or more employees.

ADA TRANSITION PLAN COMPLIANCE STATUS				
	City of Kingsport	Hawkins County	Sullivan County	Washington County
Has the agency identified an ADA Coordinator?	Yes	Yes	Yes	Yes
Has the agency developed and published an ADA Grievance procedure?	Yes	Yes	Yes	Yes
Has the agency completed a self-evaluation in accordance with the ADA and the Rehabilitation Act?	Yes	Yes	Yes	Yes
What is the status of the agency's ADA Transition Plan?	Complete	Complete	Complete	Complete

All projects using federal highway trust funds for the Kingsport MTPO must comply with Title VI, Environmental Justice, and the ADA.

### 3.4 Annual Listing of Obligated Projects

At the end of each federal fiscal year, the MTPO makes available to the public an obligation report or listing of projects for which federal funds have been obligated in the preceding fiscal year (October 1 through September 30). The list will be consistent with the funding categories identified in the TIP. The list will be distributed and discussed at the Executive Board meeting. The report is available on the MTPO website at <https://www.kingsporttn.gov/city-services/kmtpo/plans-and-documents/obligated-projects/>.

## 4 TIP Amendments and Administrative Modifications

The TIP is subject to changes throughout the life of the document. These revisions may be due to changes in project scope, added funding for project phases, shifts in funding from one phase to another, additions of entirely new projects, changes in funding source(s), changes in scheduling, and other factors. The TIP may be changed at any time through two processes: an amendment or an administrative modification. At present, the Kingsport MTPO MPA is designated as "attainment" by the Environmental Protection Agency (EPA) and is not required to develop a regional air quality conformity finding.

An amendment to the TIP is a revision that involves a major change to a project or the overall program and must meet the requirements of 23 CFR 450.316, 23 CFR 450.326, and 23 CFR 450.328 regarding public review and comment, re-demonstration of fiscal constraint, and transportation conformity. An amendment also requires approval of the MTPO Executive Board, review by TDOT or VDOT, and approval by FHWA/FTA. An administrative modification is a minor change to the approved TIP. These changes do not require public review and comment. Administrative modification information is sent to TDOT or VDOT and FHWA/FTA for review but does not require action by the MTPO Executive Board. More information to determine if a change is an amendment or an administrative modification follows.

The policy outlined by TDOT for Tennessee MPO programmed projects includes a sliding scale for changes to the total costs of projects to determine which category of revision is required.

<b>TDOT PROJECT COST THRESHOLDS</b>		
<b>Total Project Cost of all Phases Programmed in the TIP</b>	<b>Amendment</b>	<b>Administrative Modification</b>
Up to \$2 million	≥ 75%	< 75%
\$2 million to \$15 million	≥ 50%	< 50%
\$15 million to \$75 million	≥ 40%	< 40%
\$75 million and above	≥ 30%	< 30%

**TDOT TIP Amendment Examples:**

- A major change in the total project cost (see TDOT Project Cost Threshold table above).
- Adding a new project or deleting a programmed project.
- A major change in the scope of a project. Examples include, but are not limited to, changing the number of through lanes, adding/deleting non-motorized facilities, changing mode (e.g., rolling stock or facility type for transit), changing capital category for transit funding, or changing termini.
- A change requiring a new regional air quality conformity finding, where applicable.

**TDOT TIP Administrative Modification Examples:**

- Any change to funds in groupings.
- Removing funds from a project.
- A minor change in the total project cost (see TDOT Project Cost Threshold table above).
- A minor change in project description/termini for clarification that does not change the project scope.
- Shifting funds between projects within the TIP (see TDOT Project Cost Threshold table above).
- Adding funds already identified in the TIP in an existing project or as available funds (see TDOT Project Cost Threshold table above).
- Adding a project phase to a project in the TIP (see TDOT Project Cost Threshold table above).
- Moving a project from year to year within the TIP.
- A minor change that does not or will not alter the air quality conformity finding, where applicable.
- Changes requested by FHWA/FTA as to the withdrawal or re-establishment of funds in the TIP.
- Moving funds between similarly labeled groupings, regardless of the percentage change.
- Adjustments in revenue to match actual revenue receipts.

For Virginia funded projects, a sliding scale establishes limits where amendments will be required and is based on the specific phase being authorized.

## VDOT Amendment or Administrative Modification Scale

VDOT AMENDMENT OR ADMINISTRATIVE MODIFICATION SCALE	
TIP/STIP Estimate Amount	Limit Requiring Amendment
Up to \$2 million	100%
>\$2 million to \$10 million	50%
>\$10 million to \$20 million	25%
>\$20 million to \$35 million	15%
>\$35 million	10%*

\*Not to exceed \$10 million

### VDOT TIP Amendment Examples:

- Adding a new project or deleting a programmed project.
- Change in project phasing.
- A significant change in project description or scope.
- Any change which is not air quality neutral.
- Funding changes greater than allowable under the sliding scale.

### VDOT TIP Administrative Modification Examples:

- Minor changes in project description.
- Moving a project from year to year within the TIP.
- Minor changes within a project phase.
- Funding changes less than the threshold established in the sliding scale.

## 5 Performance-Based Planning and Programming

Performance-based planning was first emphasized in the 2012 transportation funding authorization bill, Moving Ahead for Progress in the 21st Century (MAP-21), continued through the Fixing America's Surface Transportation Act (FAST Act), and the current transportation funding authorization bill the Infrastructure Investment and Jobs Act (IIJA) or Bipartisan Infrastructure Law (BIL). The bills direct the use of a performance-based planning and programming (PBPP) process to form strategic transportation investment decisions with a focus on achieving performance outcomes. A PBPP process can serve to encourage progress toward the region's desired multimodal transportation system in addition to its link to national goals. Through data collection and monitoring of the transportation system's performance, transportation agencies can strategically allocate resources to critical need areas. Investing in projects based on their ability to meet established goals is a key element of a PBPP process.

Section 2.3 of this document defines seven (7) national goals that were established to address safety, infrastructure, traffic congestion, efficiency, environment, transportation delays, and project delivery delays. To monitor the performance of the transportation system, and the effectiveness of programs and projects as they relate to the National Goals, a series of performance measures were established in the areas of safety (PM1), infrastructure condition (PM2), and system performance (PM3).

Recipients of public transit funds are required to establish performance targets, develop transit asset management and safety plans, and report on their progress toward achieving targets. Public transportation operators are directed to share information with MPOs and states so that all plans and performance reports are coordinated.

These measures are outlined in 49 USC 625 and 23 CFR 490. The Kingsport MTPO has partnered with TDOT, VDOT, and the local transit providers by signing a Memorandum of Understanding (MOU) to establish a cooperative process to develop, share, and report information related to performance measures and performance targets that will show progress toward national goals, which are explained in more detail below.

FEDERAL HIGHWAY PERFORMANCE MEASURES (23 CFR 490)			
Rulemaking	National Goal	Performance Area	Performance Measures
PM1	Safety	Injuries and Fatalities	<ul style="list-style-type: none"> <li>Number of fatalities</li> <li>Fatality Rate (per 100 million vehicle-miles traveled)</li> <li>Number of serious injuries</li> <li>Serious injury rate (per 100 million vehicle-miles traveled)</li> <li>Number of non-motorized fatalities and serious injuries</li> </ul>
PM2	Infrastructure Condition	Pavement Condition	<ul style="list-style-type: none"> <li>% of pavement on the Interstate System in good condition</li> <li>% of pavement on the Interstate System in poor condition</li> <li>% of pavement on the non-Interstate NHS in good condition</li> <li>% of pavement on the non-Interstate NHS in poor condition</li> </ul>
		Bridge Condition	<ul style="list-style-type: none"> <li>% of NHS bridges classified as in good condition</li> <li>% of NHS bridges classified as in poor condition</li> </ul>
PM3	System Reliability	System Performance: Performance of the National Highway System (NHS)	<ul style="list-style-type: none"> <li>% of person-miles traveled on the Interstate System that are reliable</li> <li>% of person-miles traveled on the non-Interstate NHS that are reliable</li> </ul>
	Freight Movement and Economic Vitality	System Performance: Freight Movement of the Interstate System	Truck Travel Time Reliability index
	Congestion Reduction	System Performance: Traffic Congestion	<ul style="list-style-type: none"> <li>Annual hours of peak hour excessive delay per capita</li> <li>% of non-single occupant vehicle travel</li> </ul>
	Environmental Sustainability	System Performance:	Total emissions reduction

FEDERAL TRANSIT PERFORMANCE MEASURES (49 USC 625)		
National Goal	Performance Area	Performance Measures
Infrastructure Condition	Equipment	% of vehicles that have met or exceeded their Useful Life Benchmark
	Rolling Stock	% of revenue vehicles within a particular asset class that have met or exceeded their Useful Life Benchmark
	Infrastructure	% of track segments with performance restrictions
	Facilities	% of facilities within an asset class rated below 3.0 on the FTA Transit Economic Requirements Model scale

## 5.1 Safety Performance Measures (PM1)

The FHWA published the Highway Safety Improvement Program and Safety Performance Management Measures (PM1) Final Rules in the Federal Register on March 15, 2016, with an effective date of April 14, 2016. TDOT and VDOT established statewide safety performance targets and the MTPO adopted the initial targets, for both Tennessee and Virginia, at the February 8, 2018 Executive Board meeting. These targets are updated and adopted annually. The MTPO most recently adopted the updated targets, for both Tennessee and Virginia, at the February 3, 2022 Executive Board meeting.

<b>TENNESSEE/TDOT SAFETY (PM1) TARGETS</b>		
<b>Performance Measures</b>	<b>5 Year Rolling Average</b>	
	<b>Baseline</b>	<b>Target</b>
	<b>2017-2021</b>	<b>2018-2022</b>
Number of Fatalities	1090.8	1201.4
Fatality Rate	1.367	1.476
Number of Serious Injuries	6310.8	5588.6
Serious Injury Rate	7.910	6.869
Number of Non-motorized Fatalities and Serious Injuries	521.6	534.8

<b>VIRGINIA/VDOT SAFETY (PM1) TARGETS</b>		
<b>Performance Measures</b>	<b>Virginia Target Reduction by Percentage*</b>	<b>MTPO Area Target</b>
		<b>2022</b>
Number of Fatalities	+1.37%	1
Fatality Rate	NA	1.093
Number of Serious Injuries	-2.36%	14
Serious Injury Rate	NA	24.341
Number of Non-motorized Fatalities and Serious Injuries	-2.37%	0
Vehicle Miles Traveled (VMT) % Increase	+6.8%	NA

\*A positive value represents an increase and a negative value represents a reduction in five-year averages each year from 2020 to 2022. Year 2020 VMT was 11% lower than 2019 and predicted to recover in 2021 and grow 0.4% in 2022 resulting in 6.8% per year growth.

## 5.2 Pavement and Bridge Condition Performance Measures (PM2)

The FHWA published the Pavement and Bridge Condition Measures (PM2) Final Rules in the Federal Register on January 18, 2017, with an effective date of May 20, 2017. TDOT and VDOT first established statewide pavement and bridge condition targets by the May 20, 2018 deadline. The MTPO adopted the initial 4-year targets, for both Tennessee and Virginia, at the November 1, 2018 Executive Board meeting. In 2020, states were allowed to adjust their 4-year targets. Tennessee and Virginia each adjusted one of their initial PM2 4-year targets. The MTPO Executive Board supported Tennessee and Virginia's PM2 targets (both unchanged and adjusted).

### TENNESSEE/TDOT PAVEMENT AND BRIDGE CONDITION (PM2) TARGETS

Performance Measures	Baseline	Initial 4-Year Target	Adjusted 4-Year Target
Percentage of pavement on the Interstate System in good condition	75.6%	60.0%	
Percentage of pavement on the Interstate System in poor condition	0.14%	1.0%	
Percentage of pavement on the non-Interstate NHS in good condition	44.8%	40.0%	
Percentage of pavement on the non-Interstate NHS in poor condition	3.24%	4.0%	5.0%
Percentage of NHS bridges classified as in good condition	39.5%	36.0%	
Percentage of NHS bridges classified as in poor condition	4.9%	6.0%	

### VIRGINIA/VDOT PAVEMENT AND BRIDGE CONDITION (PM2) TARGETS

Performance Measures	Initial 4-Year Target	Adjusted 4-Year Target
Percentage of pavement on the Interstate System in good condition	45%	
Percentage of pavement on the Interstate System in poor condition	<3%	
Percentage of pavement on the non-Interstate NHS in good condition	25%	
Percentage of pavement on the non-Interstate NHS in poor condition	<5%	
Percentage of NHS bridges classified as in good condition	33%	30.5%
Percentage of NHS bridges classified as in poor condition	3%	

### 5.3 System Performance Measures (PM3)

The FHWA published the System Performance Measures (PM3) Final Rules in the Federal Register on January 18, 2017, with an effective date of May 20, 2017. TDOT and VDOT first established System Performance targets by the May 20, 2018 deadline. The MTPO adopted the initial 4-year targets, for both Tennessee and Virginia, at the November 1, 2018 Executive Board meeting. In 2020, states were allowed to adjust their 4-year targets. Tennessee adjusted one of their initial PM3 4-year targets; Virginia did not adjust any of their initial 4-year PM3 targets. The MTPO Executive Board supported Tennessee and Virginia's PM3 targets (both unchanged and adjusted).

### TENNESSEE/TDOT SYSTEM PERFORMANCE (PM3) TARGETS

Performance Measures	Baseline	Initial 4-Year Target	Adjusted 4-Year Target
Interstate Reliability (percent of person-miles traveled on the Interstate System that are reliable)	87.7%	83.03%	
Non-Interstate NHS Reliability (percent of person-miles traveled on the non-Interstate NHS that are reliable)	NA	87.5%	
Freight Reliability (Truck Travel Time Reliability Index)	1.35	1.33	1.37

### VIRGINIA/VDOT SYSTEM PERFORMANCE (PM3) TARGETS

Performance Measures	4-Year Target
Interstate Reliability (percent of person-miles traveled on the Interstate System that are reliable)	82%
Non-Interstate NHS Reliability (percent of person-miles traveled on the non-Interstate NHS that are reliable)	82.5%
Freight Reliability (Truck Travel Time Reliability Index)	1.56

#### 5.4 Transit Asset Management (TAM) and Transit Safety

The federal performance measurement requirement for transit agencies focuses on Transit Asset Management (TAM) and Transit Safety. The Transit Asset Management 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 Administration'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 across all fixed route modes combined during peak operation, OR has 101 vehicles or more in one non-fixed route mode during peak operation.
- A Tier II agency is a subrecipient of FTA 5311, OR is an American Indian Tribe, OR has 100 or less vehicles across all fixed route modes during peak operation, OR has 100 vehicles or less in one non-fixed route mode during peak operation.

In Tennessee, TDOT has opted to sponsor a group TAM Plan for Tier II rural agencies. NET Trans has decided to adopt the TDOT plan and targets. Kingsport Area Transit Service (KATS) has developed their own plan and targets. In Virginia, the Department of Rail and Public Transportation (DRPT) has opted to sponsor a group TAM plan for Tier II providers. Mountain Empire Older Citizens (MEOC)/Mountain Empire Transit (MET) has decided to adopt the DRPT plan and targets. All local transit agencies have adopted TAM targets and submitted TAM Plans to the MTPO. The MTPO adopted TAM Performance Targets at the September 20, 2018 Executive Board meeting.

The projects in this TIP support the TAM targets by programming funds that help achieve a strategic and systematic process for operating, maintaining, and improving public transit capital assets effectively throughout their entire life cycle.

## NET Trans TAM Targets

# TDOT Tier II Sponsored TAM Plan Performance Measurement Targets

### Rolling Stock

TDOT utilizes the FTA default ULB for revenue vehicle targets.

Vehicle Type	FTA Default Useful Life Benchmark	TDOT-Set Performance Measure Target
Automobile (AO)	8	Less than 25% of automobiles will exceed the ULB
Bus (BU)	14	Less than 25% of buses will exceed the ULB
Cutaway Bus (CU)	10	Less than 25% of cutaway busses will exceed the ULB
Minivan (MV)	8	Less than 25% of minivans will exceed the ULB
Other Rubber Tire (OR)	14	Less than 25% of other rubber tire vehicles will exceed the ULB
Van (VN)	8	Less than 25% of vans will exceed the ULB

### Equipment (Non-Revenue Service Vehicles)

TDOT utilizes the FTA default ULB for non-revenue service vehicles performance targets.

Vehicle Type	FTA Default Useful Life Benchmark	TDOT-Set Performance Measure Target
Non-Revenue/Service Automobile	8	Less than 25% of automobiles will exceed the ULB
Trucks/Other Rubber Tire	14	Less than 25% of other rubber tire vehicles will exceed the ULB

### Facilities

TDOT utilizes the FTA TERM scale for facility conditioning targets.

Facility Type	FTA TERM RATING	TDOT-Set Performance Measure Target
Administrative/Maintenance	3	Less than 25% of Administrative Facilities will be below a 3
Passenger/Parking	3	Less than 25% of Administrative Facilities will be below a 3

## KATS TAM Targets

### KATS Transit Asset Management Targets

Vehicles	Quantity	# Vehicles > ULB	Current % Exceed ULB	2018 Target %	2019 Target %
Fixed Route	12	0	0%	0%	0%
Demand Response	8	3	37.5	37.5%	12.5%
Staff Vehicles	2	0	0%	0%	50%
Facilities				Targets With Rating > 3	
Transit Station				100%	100%
Storage Facility				100%	100%
Trolley Barn				100%	100%

1) KATS Transit Station	Current Rating	2018 Target	2019 Target
Substructure	4	4	5
Shell	3	3	5
Interiors	4	4	5
Elevators	n/a	n/a	5
Plumbing	3	3	5
HVAC	3	3	5
Fire Protection	4	4	5
Electrical	4	4	5
Site	4	4	5
Equipment	n/a	n/a	n/a
Fare Collection	n/a	n/a	n/a
2) Storage Facility	Current Rating	2018 Target	2019 Target
Substructure	4	4	4
Shell	3	3	3
Interiors	3	3	3
Elevators	n/a	n/a	n/a
Plumbing	n/a	n/a	n/a
HVAC	n/a	n/a	n/a
Fire Protection	n/a	n/a	n/a
Electrical	4	4	4
Site	3.5	3.5	3.5
Equipment	n/a	n/a	n/a
Fare Collection	n/a	n/a	n/a
3) Maintenance Facility (Trolley Barn)	Current Rating	2018 Target	2019 Target
Substructure	4	4	4
Shell	3	3	3
Interiors	4	4	4
Elevators	n/a	n/a	n/a
Plumbing	3.5	3.5	3.5
HVAC	3	3	3
Fire Protection	n/a	n/a	n/a
Electrical	4	4	4
Site	3.5	3.5	3.5
Equipment	n/a	n/a	n/a
Fare Collection	n/a	n/a	n/a
4) Equipment	Current Rating	2018 Target	2019 Target
*KATS does not own any equipment valued \$50,000 or more; therefore, there are no targets for this category.			

*[Signature]*  
Kingsport Transit Executive Signature

*9-12-15*  
Date

#### Definitions ULB

5  
4  
3  
2  
1

#### Useful Life Benchmark

Excellent No visible defects, new or near new condition-Still under warranty

Good Good, but no longer new, may have slight defects or deteriorations, but is overall functional

Adequate Moderately defective or deteriorated, but has not exceed useful life

Marginal Defective or deteriorated, in need of replacement, exceeded useful life

Poor Critically damaged or in need of immediate repair, well past useful life

## MEOC/MET TAM Targets

### Virginia Department of Rail and Public Transportation

### Mountain Empire Older Citizens (MEOC) TAM Targets

#### Performance Targets & Measures

Asset Category - Performance Measure	Asset Class	2018 Target	2019 Target
<b>Revenue Vehicles</b>			
Age - % of revenue vehicles within a particular asset class that have met or exceeded their Useful Life Benchmark (ULB)	AB - Articulated Bus	20%	15%
	BU - Bus	10%	10%
	CU - Cutaway	10%	10%
	MB - Minibus	25%	20%
	BR - Over-the-Road Bus	20%	15%
	TB - Trolley Bus	10%	10%
	VN - Van	25%	25%
<b>Equipment</b>			
Age - % of vehicles that have met or exceeded their Useful Life Benchmark (ULB)	Non Revenue/Service Automobile	25%	25%
	Trucks and other Rubber Tire Vehicles	25%	25%
<b>Facilities</b>			
Condition - % of facilities with a condition rating below 3.0 on the FTA TERM Scale	Administrative and Maintenance Facility	10%	10%
	Administrative Office	10%	10%
	Maintenance Facility	10%	10%
	Passenger Facilities	10%	10%

In July 2018, FTA published the Public Transportation Agency Safety Plan (PTASP) Final Rule, which requires certain operators of public transportation systems, such as KATS and NET Trans that receive federal funds under the FTA's Urbanized Area Formula Grants (FTA 5307) to develop safety plans that include processes and procedures to implement Safety Management Systems (SMS). As part of the PTASP requirements, transit agencies set safety performance targets based on the following safety performance measures:

- Fatalities – Total number of reportable fatalities and rate per total vehicle revenue miles.
- Injuries – Total number of reportable injuries and rate per total vehicle revenue miles.
- Safety Events – Total number of reportable events and rate per total vehicle revenue miles.
- System Reliability – Mean distance between major mechanical failures. The National Transit Database (NTD) defines a major mechanical system failure as a failure of some mechanical element of the revenue vehicle that prevents the vehicle from completing a scheduled revenue trip or starting the next scheduled revenue trip because vehicle movement is limited due to safety concerns.

The plan must include safety performance targets and transit operators must also certify they have a safety plan in place meeting the requirements of the rule. The plan must be updated and certified by the transit agency annually. KATS and NET Trans have adopted PTASP plans and safety targets for 2021. As required, the Kingsport MTPO Executive Board adopted the PTASP targets in February 2022. Note: MEOC/MET is not required to have a PTASP or adopt safety targets because they do not receive FTA 5307 funds.

2021 TRANSIT SAFETY TARGETS			
Performance Measures	KATS		NET Trans
	Fixed Route VRM = 200,000	Demand Response VRM = 115,000	Demand Response VRM = 2,009,935
Number of Fatalities	0	0	0
Rate of Fatalities per 100K VRM	0	0	0
Number of Injuries	1	1	0
Rate of Injuries per 100K VRM	.5	1	0
Number of Safety Events	1	1	0
Rate of Safety Events per 100K VRM	.5	1	0
Total Major Mechanical Failures	30	5	19
System Reliability – Miles between Major Mechanical Failures	6,666	23,000	105,786

The current resolution to support KATS and NET Trans safety targets effectively agrees to plan and program projects so that they contribute toward the accomplishment of each transit agency's FY21 PTASP Safety Targets. The overarching goal of the PTASP is to enhance all aspects of safety within the participating public transportation agency by guiding effective and proactive management of safety risks in their operations and prioritizing capital investments using performance based planning. To the extent practicable, Kingsport MTPO will continue to coordinate with the State DOTs and local transit providers to integrate each agency's PTASP goals, objectives, and plans into the MTPO planning process. This includes linking investment priorities in the TIP toward projects that have the potential to effectively and proactively manage safety risks related to public transportation.

### 5.5 Linking PBPP to the LRTP and TIP

All projects utilizing federal funding in the TIP are selected from the region's Long Range Transportation Plan (LRTP), which was last updated in 2022. The MTPO uses the ten (10) Planning Factors and the seven (7) National Goals as guiding principles to select projects to include in the LRTP and TIP. The most recent update to the LRTP includes a Transportation System Performance Report that summarizes the status of performance-based planning and programming for the MTPO and describes how the MTPO, and specifically the LRTP, supports progress toward achieving the performance targets, and ultimately supports national transportation goals and performance measures. The TIP must link investment priorities to the targets in the LRTP and describe, to the maximum extent practicable, the anticipated effect of the program toward achieving established targets. Projects are subject to a performance-based analysis, utilizing a variety of quantitative measures as well as staff analysis. Project selection criteria prioritize projects that promote safety and security with additional points being given if the project contains accommodations for alternative modes. Safety and security is a primary evaluation category for projects evaluated by the MTPO and included in both the LRTP and the TIP. More information on project evaluation

and selection can be found in this TIP in section 2.3 (Project Priorities and Criteria) and section 2.4 (Project Selection) and in the LRTP in Chapter 6 (Potential Transportation Investments), Appendix G (Project Scoring Methodology), and Appendix H (Project Scoring Results). The program of projects and investment priorities included in the TIP support all state performance measure targets.

## 6 Financial Plan

Each project listed in this TIP has a cost estimate assigned to it. Cost estimates are established by phase. As with the LRTP, these cost estimates were derived through consultation with local jurisdictions, consultants, Kingsport MTPO staff, TDOT, VDOT, and public transportation providers. A cost estimation tool, provided by TDOT, is available as a tool to calculate expected costs. Based on the Kingsport MTPO 2045 Long Range Transportation Plan, a 5% annual inflation rate was assumed. The MTPO provides this inflation rate to local jurisdictions to assist in cost estimation; however, project costs are ultimately left to the judgement of the sponsoring agency due to primary project knowledge, the variety of inflationary pressures by project type and schedule, and knowledge of historical project costs. All revenues and expenditures reflect year of expenditure (YOE) dollars. Most transportation projects are funded with a combination of federal, state, and local funds. The financial plan for this TIP is based on an annual comparison of reasonably available revenues to the calculated costs various project phases are expected to incur, with the understanding that these costs will not exceed available revenues. The projects in this TIP have been funded in accordance with current and proposed revenue sources. TDOT, VDOT, and local jurisdictions and agencies with projects in the TIP have indicated that they have the financial resources to provide the necessary matching funds to complete their projects. In addition, these agencies have determined that funding is available for the maintenance of all existing transportation systems.

### 6.1 Fiscal Constraint

The TIP is required to include a financial plan that demonstrates how the program of projects can be implemented. This includes identifying eligible federal, state, and local funding sources. The TIP is considered fiscally constrained when all the programmed project costs do not exceed the available or anticipated revenues. Detailed financial breakdowns are included in the Summary Tables in the Project Section of this document. The total amount of money available in each funding category is shown, as well as the total amount of programmed expenditures and remaining funds by funding source by year. The tables show that the programmed expenditures are within the balance of expected fund allocations in accordance with the requirements of the IIJA/BIL. If funding revenues change, the TIP will be modified or amended when necessary.

### 6.2 Federal Funding

The greatest funding source for highway and road projects, as well as public transportation, is from the federal government. Surface transportation authorization acts authorize spending for transportation programs and funding apportionments at the federal level. Over the years, new transportation authorizations have eliminated, consolidated, or created transportation funding programs. The IIJA/BIL was signed into law on November 15, 2021 providing surface transportation program funding for Federal fiscal years 2022 through 2026. The following list summarizes the major funding categories available for transportation projects in the TIP. Although all of these funding sources may not be in the current TIP, this information is provided to educate stakeholders on some of the funding types that are available. For

additional information regarding the federal share of these and other funding programs, visit <https://www.fhwa.dot.gov/bipartisan-infrastructure-law/>.

**Bridge Formula Program (BFP)** – Established under the IIJA/BIL, provides formula funds to replace, rehabilitate, preserve, protect, and construct highway bridges. Funding ratio = 80% Federal, 20% Non-federal.

**Bridge Investment Program (BIP)** – Established under the IIJA/BIL, provides funding on a discretionary/competitive basis to replace, rehabilitate, preserve, or protect one or more bridges on the National Bridge Inventory or to replace or rehabilitate culverts to improve flood control and improve habitat connectivity for aquatic species. Funding ratio = 80% Federal, 20% Non-federal.

**Carbon Reduction Program (CRP)** – Established under the IIJA/BIL, provides formula funds for projects designed to reduce transportation emissions, defined as carbon dioxide (CO<sub>2</sub>) emissions from on-road highway sources. Requires state, in consultation with MPOs, to develop (and update at least every 4 years) a carbon reduction strategy and submit to DOT for approval. DOT must certify a state's strategy meets the statutory requirements. Funding ratio = 80%-100% Federal, 0%-20% Non-federal.

**Congestion Mitigation and Air Quality Improvement Program (CMAQ)** – Provides funding for transportation projects in air quality non-attainment or maintenance areas. CMAQ projects are designed to contribute toward meeting the National Ambient Air Quality Standards (NAAQS). Funding ratio = 80%-90% Federal, 10%-20% Non-federal. At the discretion of the state, funding may be up to 100% Federal (23 USC 120).

**Emergency Relief Program (ER)** – Provides funding for emergency repairs and permanent repairs on federal-aid highways and roads on federal lands that have suffered serious damage as a result of natural disasters or catastrophic failure from an external cause. Funding ratio = 80%-100% Federal, 0%-20% Non-federal.

**Federal Lands and Tribal Transportation Programs (FLTP) (FLAP)** – Federal Lands Transportation Program (FLTP) and Federal Lands Access Program (FLAP) provide funding for roads providing access to and within federal and Indian Lands. Funding ratio = 80-100% Federal, 0%-20% Non-federal.

**Highway Safety improvement Program (HSIP)** – Provides funding to achieve a significant reduction in the traffic fatalities and serious injuries on all public roads including non-state owned public roads. The program provides flexibility for states to target funds to their most critical safety needs. This program requires a data-driven, strategic approach to improving highway safety and projects must be consistent with the State Strategic Highway Safety Plan (SHSP). Under the provisions of USC Section 154, Open Container Transfer Provision, states are required to enact a law that prohibits the possession of open alcohol beverages in the passenger area of motor vehicles. Funding ratio = 90% Federal, 10% Non-federal (except as provided in 23 USC 120 and 130). States that fail to enact an open container law have a portion of their highway funds transferred to the **Penalty Highway Safety Improvement Program (PHSIP)/Section 154 Funds** for HSIP eligible activities. A portion of the funds extracted from the highway funds that TDOT receives are shared with the Tennessee Highway Safety Office. Funding ratio = 100% Federal, 0% Non-federal.

**National Electric Vehicle Infrastructure Formula Program (NEVI)** – Established under the IIJA/BIL, provides formula funds to states to strategically deploy electric vehicle (EV) charging infrastructure and

to establish an interconnected network to facilitate data collection, access, and reliability. Funding ratio = 80% Federal, 20% Non-federal.

**National Highway Freight Program (NHFP)** – Funds are apportioned among states by formula for freight related highway improvements. Under the program, states will designate a national freight network comprised of the interstate system and other roads, both urban and rural, that are critical to the safe and efficient shipment of freight. States are required to establish a freight advisory committee and develop a state freight investment plan to be eligible for funding. Funding ratio = 80%-90% Federal, 10%-20% Non-federal.

**National Highway Performance Program (NHPP)** – Provides funding to support the condition and performance of the National Highway System (NHS), for the construction of new facilities on the NHS, and to ensure that investments of federal-aid funds in highway construction are directed to support progress toward the achievement of performance targets established in a state's asset management plan for the NHS. Funding distributed to each state is based on lane-miles of principal arterials (excluding Interstate), vehicle-miles traveled on those arterials, diesel fuel used on the state's highways, and per capita principal arterial lane-miles. Funding ratio = 80%-90% Federal, 10%-20% Non-federal.

**Promoting Resilient Operations for Transformative, Efficient, and Cost-saving, Transportation (PROTECT) – Formula to States** – Established under the IIJA/BIL, provides funding for evacuation routes, coastal resilience, making existing infrastructure more resilient, or efforts to move infrastructure to nearby locations not continuously impacted by extreme weather and natural disasters. Higher Federal share if the state develops a resilience improvement plan and incorporates it into its long range transportation plan. Funding ratio = 80%-100% Federal, 0%-20% Non-federal.

**Reconnecting Communities Pilot Program (RCP) – Planning Grants and Capital Construction Grants** – Established under the IIJA/BIL, provides funding on a discretionary/competitive basis to support planning, capital construction, and technical assistance to equitably and safely restore community connectivity through the removal, retrofit, mitigation, or replacement of eligible transportation infrastructure facilities that create barriers to mobility, access, or economic development. A Notice of Funding Opportunity is expected in summer 2022 with more details.

**Safe Streets and Roads for All (SS4A) Grant Program** – Established under the IIJA/BIL, provides funding on a discretionary/competitive basis to support planning, infrastructure, behavioral, and operational initiatives to prevent death and serious injury on roads and streets involving all roadway users, including pedestrians; bicyclists; public transportation, personal conveyance, and micromobility users; motorists; and commercial vehicle operators. Funding ratio = 80% Federal, 20% Non-federal.

**Surface Transportation Block Grant Program (STBG)** – Provides a flexible funding program for planning, construction, reconstruction, and rehabilitation that may be used by states and localities for projects on any federal-aid Highway and bridge projects on any public road. These funds can also be used for non-highway projects such as transit capital projects and pedestrian/bicycle facilities. Generally, STBG funds cannot be used on local roads or rural minor collectors; however, a number of exceptions to this requirement are identified in federal legislation. STBG funds are distributed to the states based on lane-miles of federal-aid highways, total vehicle-miles traveled on those highways, and contributions to the Highway Trust Fund. Funding ratio = 80%-90% Federal, 10%-20% Non-federal.

**Transportation Alternatives (TA or TAP)** – This program is a set-aside in the STBG program for alternative transportation projects such as pedestrian and bicycle facilities, recreational trails, historic preservation, environmental mitigation, etc. Funding ratio = 80%-90% Federal, 10%-20% Non-federal.

**FTA Section 5307 Formula Grants** – This is a formula grant program for urbanized areas (greater than 50,000 in population) providing capital, operating, and planning assistance for public transportation. Other eligible activities include job access and reverse commute projects. The funding formula is based on population, population density, and the number of low income individuals. Operators must maintain equipment and facilities according to the Transit Asset Management Plan. Funding ratios = **Capital** = 80% Federal, 20% Non-federal; **ADA Capital** = 85% Federal, 15% Non-federal; **Operating** = 50% Federal, 50% Non-federal.

**FTA Section 5310 Enhanced Mobility of Seniors and Individuals with Disabilities** – This is a competitive grant program for programs that service the special needs of transit-dependent populations beyond the traditional public transportation services or the complementary paratransit services of the Americans with Disabilities Act (ADA). Eligible activities include capital and operating projects that assist seniors and individuals with disabilities. Funding ratios = **Capital** = 80% Federal, 20% Non-federal; **Operating** = 50% Federal, 50% Non-federal.

**FTA Section 5311 Formula Grants** – This is a formula grant program for rural areas (less than 50,000 in population) providing capital, operating, and planning assistance for public transportation. A majority of the funding is based on land area and population in rural areas with a small percentage apportioned based on revenue vehicle miles and number of low income individuals. Funding ratios = **Capital** = 80% Federal, 20% Non-federal; **ADA Capital** = 85% Federal, 15% Non-federal; **Operating** = 50% Federal, 50% Non-federal.

**FTA Section 5339 Bus and Bus Facilities** – This is a competitive grant program that provides capital funding to replace revenue vehicles and vehicle-related equipment to support the continuation of public transportation services. Funding ratios = **Capital** = 80% Federal, 20% Non-federal; **ADA Capital** = 85% Federal, 15% Non-federal.

### 6.3 Federal Apportionment

Apportionment is the federal distribution of transportation funds to each state as prescribed by a statutory formula. Prior to MAP-21, each apportioned federal program had its own formula for distribution and the federal assistance received by the state was the sum of the amounts it received for each program. MAP-21, and subsequently the FAST Act, and now the IIJA/BIL changed this process and provides a total combined federal apportionment to each state and then divides that apportionment among the state's individual formula programs.

The division of federal funding among states includes an adjustment, if needed, to ensure that each state receives an equitable return on its share of federal gas tax contributions to the Highway Trust Fund. Previously, this minimum guarantee was apportioned to each state under the Equity Bonus Program as a separate funding category. With federal legislation, this funding adjustment is now included in the statutory formula for each state's total federal apportionment (prior to the division of a state's funding among the various programs).

## 6.4 State Funding

The State of Tennessee has legislation that establishes funding for highways and public transportation through motor fuel taxes and vehicle registrations. A variety of programs exist including allocations to cities and counties for maintenance and construction projects. A portion of the money is retained by TDOT for ongoing maintenance and operations, resurfacing, bridges, construction/reconstruction, and to match federal funds.

The Commonwealth of Virginia's legislation that establishes funding for highways and public transit programs is through a combination of sales and transportation related taxes. In addition to the Commonwealth Transportation Fund, the General Assembly also authorizes the issuance of Capital Project Revenue (CPR) bonds for special transportation projects as well as the Revenue Sharing Program (RSP) to match local project funding on a dollar for dollar basis.

## 6.5 Local Funding

Local jurisdictions have demonstrated a continuing commitment in annually funding the local share of costs necessary to implement transportation projects and have included in the budget planning process any funding required for the local share of funds identified in the TIP. In addition, these agencies have determined that funding is available for the maintenance of all existing transportation systems. Funding for Fiscal Year 2023 is appropriated through the legislative budget process. The remaining three years indicate the intent to include those projects in their respective budgets.

## 6.6 Operations and Maintenance Funding

The Kingsport MTPo and its member jurisdictions are committed to working closely with TDOT and VDOT to maintain the existing transportation infrastructure throughout the MTPo area. Both Tennessee and Virginia provide local jurisdictions funding for the maintenance of certain highways. In Virginia, most local roads are state routes so there is very little funding included within local government budgets. The allocation of maintenance funds is on a district wide basis and is based on the number of moving lane miles of highways; therefore, it is difficult to break out specific amounts for Gate City, Weber City, and Scott County individually. In Tennessee, state maintenance funds are distributed to local jurisdictions based on population to maintain state routes within city or county limits. At the local level, the two major sources of transportation revenue for operations and maintenance include the general fund and the issuance of bonds for major improvements or reconstruction. The interstate system is operated and maintained by the State Department(s) of Transportation. Maintenance activities are those that occur primarily in reaction to situations that have an immediate or imminent adverse impact on the safety or availability of transportation facilities. This may include tasks such as pavement resurfacing and markings, street light repair/replacement, sidewalk repair, sinkhole repair, bridge repair, guardrail and sign replacement, and signal maintenance. Operations may include more routine items such as painting and right-of-way maintenance. These activities are not funded through or scheduled in the TIP but are included here for informational purposes and to demonstrate that jurisdictions and agencies have the resources to operate and maintain the new or improved facilities, equipment, and services programmed in the TIP. The following tables provide the estimated annual revenue and costs by jurisdiction that falls within the MTPo boundary and the total estimated revenue and costs by fiscal year. These numbers are based on uncertain economic growth and actual numbers may vary. For future years, an annual growth rate of three percent (3%) was applied and is reflected in the table below. In the event federal transportation funds were to be made available for operations and maintenance, it would be identified in

the TIP.

ESTIMATED OPERATIONS AND MAINTENANCE ANNUAL BUDGETS BY JURISDICTION		
Jurisdiction	Estimated Annual Revenues	Estimated Annual Costs
City of Kingsport	\$11,818,750	\$11,818,750
Sullivan County (MTPO Area)	\$3,451,500	\$3,451,500
Hawkins County (MTPO Area)	\$883,750	\$883,750
Washington County (MTPO Area)	\$486,250	\$486,250
Church Hill	\$1,359,750	\$1,359,750
Mount Carmel	\$366,000	\$366,000
VDOT District (MTPO Area)	\$364,250	\$364,250
TDOT (MTPO Area)	\$3,106,119	\$3,106,119

ESTIMATED OPERATIONS AND MAINTENANCE REVENUE AND COSTS BY FISCAL YEAR							
FY23		FY24		FY25		FY26	
Estimated Revenues	Estimated Costs	Estimated Revenues	Estimated Costs	Estimated Revenues	Estimated Costs	Estimated Revenues	Estimated Costs
\$20,962,454	\$20,962,454	\$21,591,327	\$21,591,327	\$22,239,066	\$22,239,066	\$22,906,237	\$22,906,237

For Kingsport Area Transit Service (KATS), funds are spent on daily operation activities and maintenance of vehicles and equipment, which are principal components in sustaining a safe and efficient public transportation system. The following table provides estimated annual operations and maintenance costs for KATS.

OPERATIONS AND MAINTENANCE ESTIMATED ANNUAL BUDGETS – PUBLIC TRANSPORTATION		
Jurisdiction	Estimated Annual Revenues	Estimated Annual Costs
Kingsport Area Transit Service (KATS)	\$2,750,000	\$2,750,000

## 7 Status of Projects in FY 2020-2023 TIP

Status of Projects in FY 2020-2023 TIP			
TIP # TDOT PIN	Project Name (Location)	Description	Status
TN-2014-001 112965.00	Rock Springs Road Rebuild (Kingsport)	Reconstruction of portions of Rock Springs Road (SR-347) beginning at I-26 and ending at Cox Hollow Road.	Currently in PE-N Phase
KPT-2015-002 123325.00	Main Street Rebuild (Kingsport)	Rebuild Main Street from Sullivan Street to Market Street.	Currently in CONST Phase
KPT-2018-003 128742.00	Island Road Rebuild (Kingsport)	From SR-126 to near Golf Ridge Drive - Shifting road southeast, improving vertical and horizontal geometry. Leave current section of road for separated multimodal path.	Currently in PE-D Phase

KPT-2018-020 120812.01	Hammond Avenue (Mount Carmel)	Safety improvements including signage, pavement markings, guardrails, and other items eligible for 100% federal reimbursement.	Completed in 2022
KPT-2019-004 128784.00	Greenbelt – West End (Kingsport)	Construct an approximate half mile extension of Kingsport Greenbelt west from end of current trail at Rotherwood Drive to Lewis Lane	Currently in PE-D Phase
KPT-2019-005 129800.00	Resurfacing Grouping - Kingsport	Resurfacing of various functionally classified roadways including milling, grading, repairing, sidewalk ADA compliance as necessary, striping, and signage.	Currently in PE-D Phase
KPT-2020-021 131049.00	Brickyard Bridge	Pedestrian bridge over the CSX railroad at Centennial Park connecting downtown Kingsport to the Brickyard Park development.	Currently in PE-N Phase
TAP-1 118524.01	TAP Grant – Greenbelt East End (Kingsport)	Construct an approximate 1-mile extension of Kingsport Greenbelt east from end of current trail to Cleek Road.	Completed in 2021
TN-2019-006 126818.00	NHPP Grouping – Entire MTPO Area	National Highway Performance Program (NHPP) Grouping	Continuous
TN-2019-007 126820.00	HSIP Grouping – Entire MTPO Area	Highway Safety Improvement Program (HSIP) Grouping	Continuous
TN-2019-008 126819.00	STBG Grouping – Entire MTPO Area	Surface Transportation Block Grant Program (STBG) Grouping	Continuous
TN-2007-022a 105467.01	SR-126 (Memorial Boulevard) – Phase I	From East Center Street in Kingsport to East of Cooks Valley Road - Widen 2-lane to 4-lane, 5-lane, and 3-lane	Currently in ROW Phase
TN-2019-009 124590.00	I-81 ITS Expansion	From near I-26 (exit 57) interchange to near I-381 in Virginia – Intelligent Transportation System Expansion	Currently in PE-N Phase
NA 105467.02	SR-126 (Memorial Boulevard) – Phase II	From East of Cooks Valley Road to I-81 – Construct a 3-lane section from East of Cooks Valley Road to Harr Town Road and a 2-lane section from Harr Town Road to I-81	Currently in PE-D Phase
TN-2011-010a 112834.01	SR-93	From near Davis Road to near Fire Hall Road – Flatten the existing horizontal curves and improve intersection sight distance, widen from 2 to 3 lanes with curb and gutter and sidewalks.	Completed in 2021
TN-2011-010b 112834.02	SR-93	From near Morgan Lane in Washington County to south of Baileyton Road in Sullivan County – Miscellaneous safety improvements,	Currently in CONST Phase

		proposed realignment of SR-93 to improve sight distance, provide two 12-foot lanes and 6-foot shoulders.	
TN-2019-011	SR-36	From SR-75 to I-81 – Widen from 2-lanes to 5-lanes, curb and gutter, and 5-foot sidewalks in both sides of road.	Currently in PE-N Phase

DRAFT

DRAFT

## TIP Project Report

<b>TIP ID</b>	<b>PIN #</b>	<b>Length in Miles</b>	<b>Lead Agency</b>
1	2	3	4
<b>State</b>	<b>County</b>		
5	6		
<b>State Route</b>	<b>Total Project Cost</b>		
7	8		
<b>Project Name</b>			
9			
<b>Termini</b>			
10			
<b>Project Description</b>			
11			
<b>Long Range Plan #</b>		<b>Conformity Status</b>	
12		13	

<b>FY</b>	<b>Phase</b>	<b>Funding</b>	<b>Programmed Funds</b>	<b>Fed Funds</b>	<b>State Fund</b>	<b>Local Funds</b>
14	15	16	17	18	19	20
<b>Total</b>						
21						

Comments:

22

23 - Project Location Map

- 1 - Project number assigned by Kingsport MTPO\*
- 2 - Project number assigned by TDOT or VDOT (if available)
- 3 - Length of project
- 4 - The agency responsible for development/administration of the project
- 5 - State where project is located
- 6 - County where project is located
- 7 - State Route number (if applicable)
- 8 - Total cost for the project for all phases
- 9 - Project name
- 10 - Beginning and ending location of project
- 11 - Description of the project
- 12 - Project number and/or page number in the Kingsport MTPO LRTP
- 13 - If the project is subject to air quality standards (our area is in attainment)
- 14 - Federal fiscal year the project phase is programmed
- 15 - Phase of work programmed (PE-N, PE-D, ROW, CONST, etc.)
- 16 - Funding source being utilized
- 17 - Total amount of funds for the identified project phase/fiscal year
- 18 - Amount of federal funds programmed for the identified project phase/fiscal year
- 19 - Amount of state funds programmed for the identified project phase/fiscal year
- 20 - Amount of local funds programmed for the identified project phase/fiscal year
- 21 - Totals programmed in the current TIP
- 22 - Any additional project notes or comments
- 23 - Location map provides a visual guide of where the project is located

\*Project Numbers/TIP ID are in the following format:

**Prefix:** KPT, TN, VA, or PT indicates if the project is a local project (KPT), state project (TN or VA), or Public Transit project (PT)**Four Digit Number:** Calendar year the project was first placed in the TIP**Three Digit Number:** Random three digit number (consecutive numbering order)

# TIP Project Report

10/21/2022

TIP ID	PIN #	Length in Miles	Lead Agency
KPT KPT-2018-003	128742.00	1.04	City of Kingsport
State	County		
TN	Sullivan		
State Route	Total Project Cost		
	\$3,530,700		

**Project Name**  
Island Road

**Termini**  
From SR-126 (Memorial Boulevard) to the Kingsport City Limits near Golf Ridge Drive

**Project Description**  
This project will realign Island Road to the southeast to improve vertical and horizontal roadway geometry for better traffic management and safety. The remaining now unused portion of Island Road will be converted into a separated buffered multi use path connecting residential and commercial properties along the former roadway.

Long Range Plan #	Conformity Status
Ch 6, Page 86	Not Applicable

FY	Phase	Funding	Programmed Funds	Fed Funds	State Fund	Local Funds
2024	ROW	STBG-L	\$700,000	\$560,000	\$0	\$140,000
2026	CONST	STBG-L	\$2,500,000	\$2,000,000	\$0	\$500,000
<b>Total</b>			<b>\$3,200,000</b>	<b>\$2,560,000</b>	<b>\$0</b>	<b>\$640,000</b>

Comments:

- Previous Obligations (Federal Funds Only): PE-N = \$120,000 (FY19), Adjust PE-N/Authorize PE-D = \$144,560 (FY22)



# TIP Project Report

8/18/2022

TIP ID	PIN #	Length in Miles	Lead Agency
KPT KPT-2019-004	128784.00	0.5	City of Kingsport
State	County		
TN	Hawkins, Sullivan		
State Route	Total Project Cost		
	\$1,172,200		

**Project Name**  
Kingsport Greenbelt - West End Extension

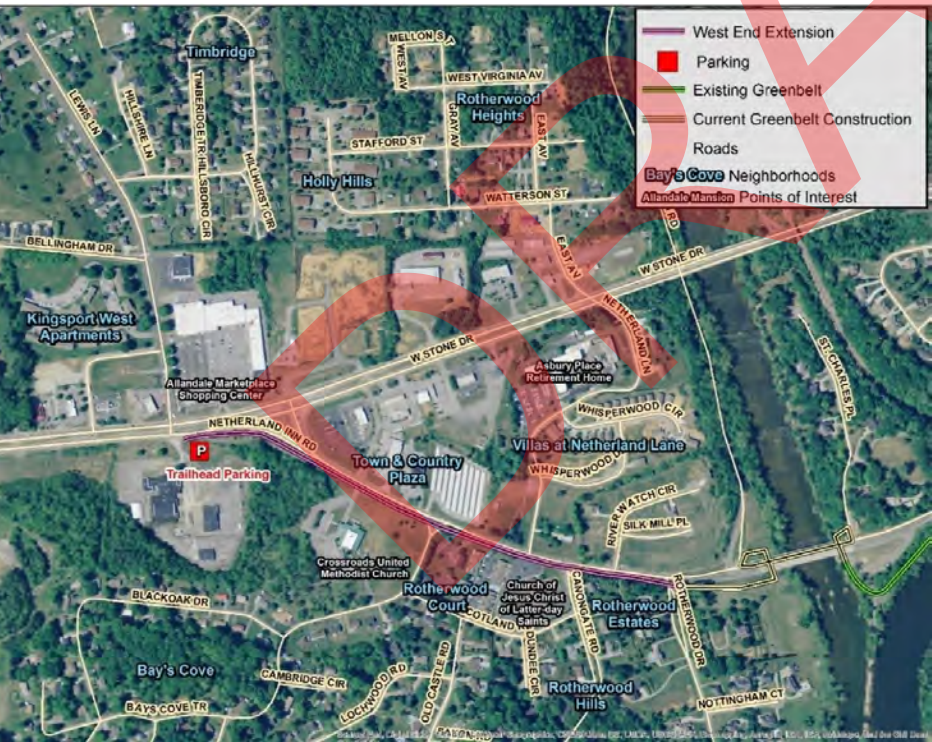
**Termini**  
SR-1(West Stone Dr) From Lewis Ln through the Exit Ramp to Netherland Inn Road; Netherland Inn Rd From the SR-1 Exit Ramp to Rotherwood Dr

**Project Description**  
This project will build an extension of the Kingsport Greenbelt walking and biking path west from the end of the current Greenbelt at Rotherwood Drive to Lewis Lane on SR-1(West Stone Drive).

Long Range Plan #	Conformity Status
Chapter 7, Page 113	Not Applicable

FY	Phase	Funding	Programmed Funds	Fed Funds	State Fund	Local Funds
2023	ROW	STBG-L	\$144,000	\$115,200	\$0	\$28,800
2025	CONST	LOCAL	\$800,000	\$0	\$0	\$800,000
<b>Total</b>			<b>\$944,000</b>	<b>\$115,200</b>	<b>\$0</b>	<b>\$828,800</b>

- Comments:
- Previous Obligations (Federal Funds Only): PE-N = \$24,000 (FY19), Adjust PE-N/Authorize PE-D = \$78,560 (FY22)



# TIP Project Report

10/21/2022

TIP ID	PIN #	Length in Miles	Lead Agency
KPT KPT-2019-005			City of Kingsport
State	County		
TN	Hawkins, Sullivan		
State Route	Total Project Cost		
	\$4,290,000		

**Project Name**  
Resurfacing Grouping

**Termini**  
Moreland Drive, Fall Creek Road, Cooks Valley Road and Netherland Inn Road in Kingsport.

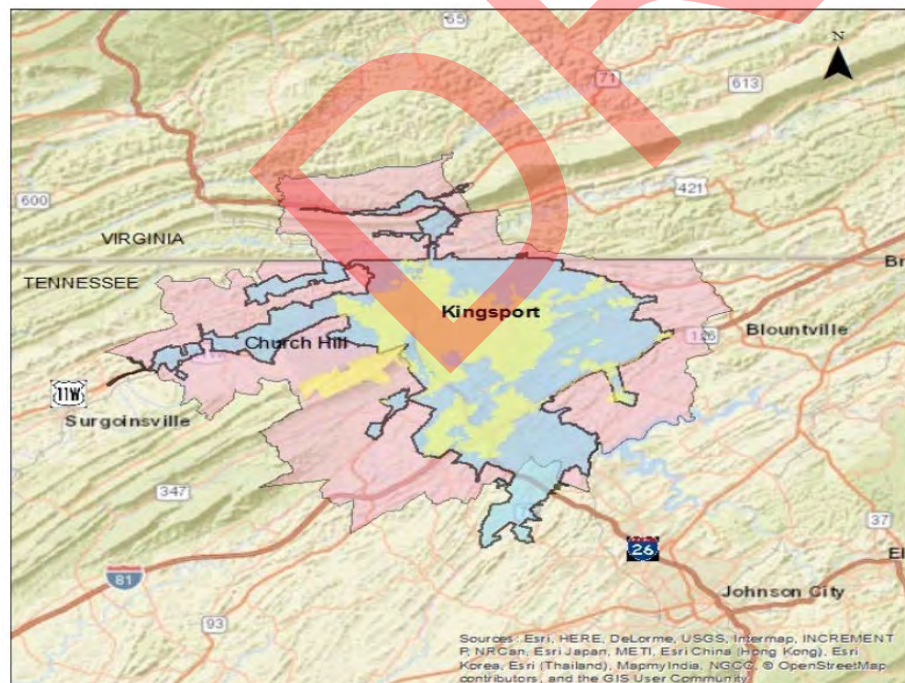
**Project Description**  
Resurfacing of various functionally classified roadways including milling, grading, repairing, ADA improvements, striping, and signage. Road segments are Moreland Drive, from SR-36 to the Kingsport City limits; Fall Creek Road, from Warriors' Path State Park limits to the Kingsport City limits; Cooks Valley Road, from Harbor Chapel Road to Old Cooks Valley Road; and Netherland Inn Road, from SR-1 to Big Elm Road.

Long Range Plan #	Conformity Status
Table 3 Pg 8/Ch 7 Pg 107	Not Applicable

FY	Phase	Funding	Programmed Funds	Fed Funds	State Fund	Local Funds
2023	PE-N	STBG-L	\$40,000	\$32,000	\$0	\$8,000
2023	CONST	STBG-L	\$2,399,846	\$1,919,877	\$0	\$479,969
2024	PE-D	STBG-L	\$60,000	\$48,000	\$0	\$12,000
2025	ROW/CONST	STBG-L	\$1,690,000	\$1,352,000	\$0	\$338,000
<b>Total</b>			<b>\$4,189,846</b>	<b>\$3,351,877</b>	<b>\$0</b>	<b>\$837,969</b>

- Comments:
- Previous Obligations (Federal Funds Only): PIN 129800.00: PE-N = \$20,000 (FY20), PE-D = \$40,123 (FY21), ROW = \$20,000 (FY22)
  - Resurfacing Grouping #2 = 132587.00 (Clinchfield Street and North Eastman Road)
  - Resurfacing Grouping #1 = 129800.00 (Moreland Drive, Fall Creek Road, Cooks Valley Road, Netherland Inn Road) - Note: Meadowview Parkway has been removed from this grouping and will be included in a future grouping.

Kingsport Resurfacing Grouping Area in Yellow (Kingsport City Limits)



# TIP Project Report

10/21/2022

TIP ID	PIN #	Length in Miles	Lead Agency
KPT KPT-2020-021	131049.00	0.02	City of Kingsport
State	County		
TN	Sullivan		
State Route	Total Project Cost		
	\$3,791,250		

**Project Name**  
Brickyard Park Bicycle-Pedestrian Bridge

**Termini**  
Cherokee Street at CSX Railroad

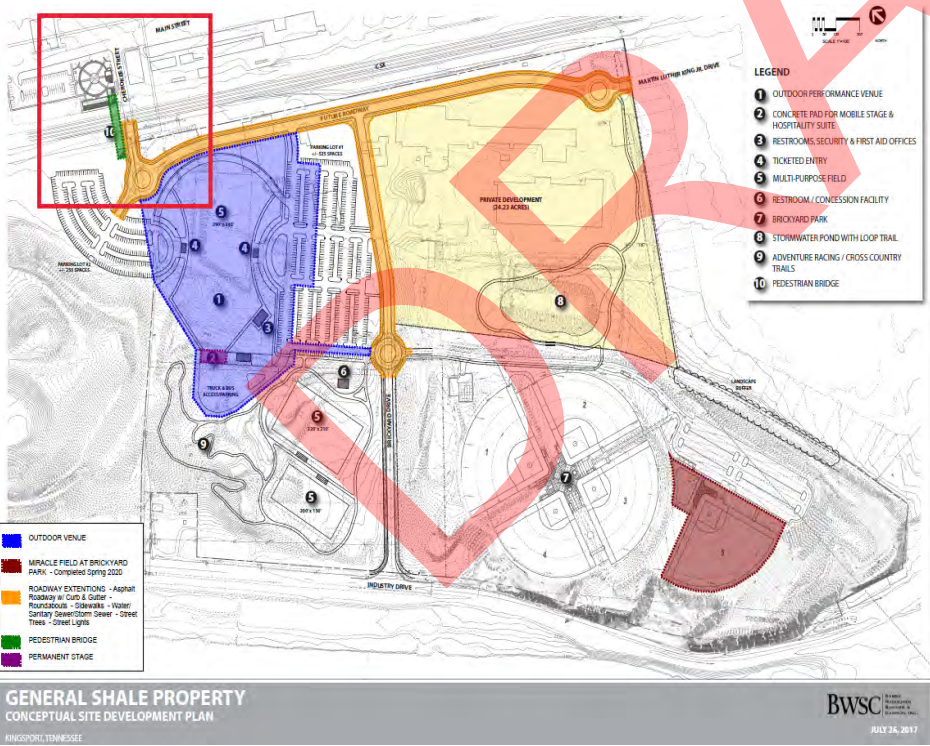
**Project Description**  
This project will construct a pedestrian bridge over the CSX Railroad at Centennial Park connecting downtown Kingsport to the Brickyard Park development.

Long Range Plan #	Conformity Status
Chapter 7, Page 113	Not Applicable

FY	Phase	Funding	Programmed Funds	Fed Funds	State Fund	Local Funds
2023	PE-D	STBG-L	\$260,000	\$208,000	\$0	\$52,000
2023	ROW	STBG-L	\$125,000	\$100,000	\$0	\$25,000
2024	Const	TAP	\$3,281,250	\$2,625,000	\$0	\$656,250
<b>Total</b>			<b>\$3,666,250</b>	<b>\$2,933,000</b>	<b>\$0</b>	<b>\$733,250</b>

Comments:

- Previous Obligations (Federal Funds Only): PE-N = \$100,000 (FY21)



**TIP Project Report**  
10/7/2022

<b>TIP ID</b>	<b>PIN #</b>	<b>Length in Miles</b>	<b>Lead Agency</b>
KPT TN-2014-001	112965.00	1.21	TDOT
<b>State</b>	<b>County</b>		
TN	Sullivan		
<b>State Route</b>	<b>Total Project Cost</b>		
SR-347	\$13,552,600		
<b>Project Name</b>			
SR-347 (Rock Springs Road)			
<b>Termini</b>			
(Rock Springs Road) from Cox Hollow Rd (LM 9.52) to I-26 (US-23) (LM 10.73)			
<b>Project Description</b>			
Widen to two lanes and three lanes with 2 foot shoulder throughout			
<b>Long Range Plan #</b>		<b>Conformity Status</b>	
Project #200		Not Applicable	

FY	Phase	Funding	Programmed Funds	Fed Funds	State Fund	Local Funds
2023	PE-D	STBG-L	\$400,000	\$320,000	\$80,000	\$0
<b>Total</b>			<b>\$400,000</b>	<b>\$320,000</b>	<b>\$80,000</b>	<b>\$0</b>

Comments:

- Kingsport MTPO will provide \$1,000,000 in PE/ROW. TDOT has agreed to complete the project per state route. Local STBG funds previously obligated = PE-N = \$280,000 (FY16)



**TIP Project Report**  
8/18/2022

TIP ID	PIN #	Length in Miles	Lead Agency
KPT TN-2019-006	126818.00		TDOT
State	County		
TN	Greene, Hawkins, Sullivan, Washington, Washington		
State Route	Total Project Cost		
	\$19,346,000		

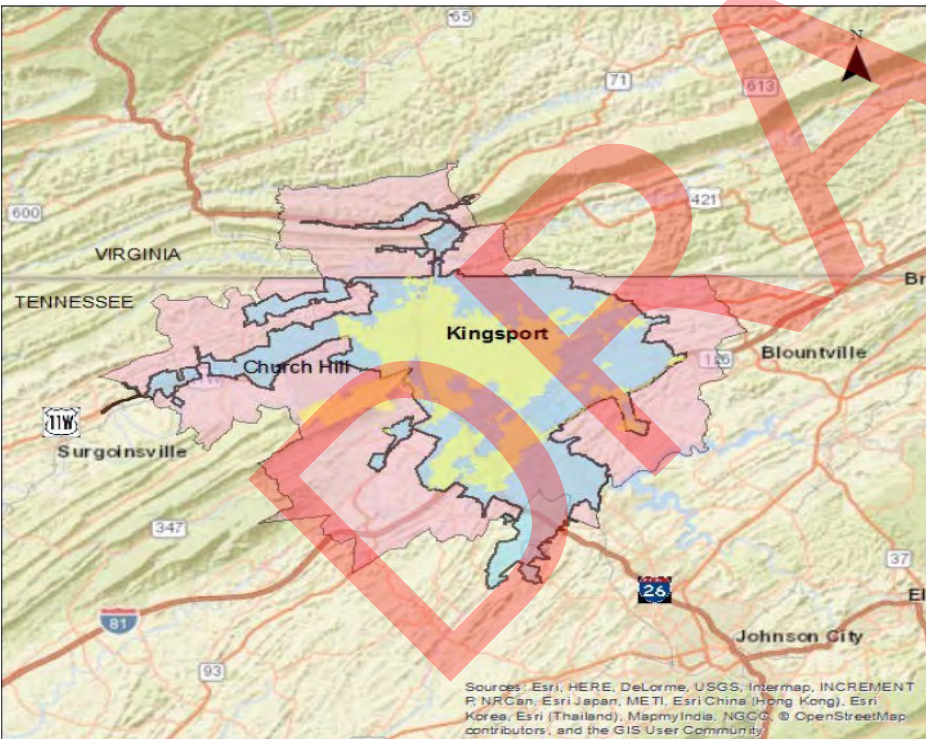
**Project Name**  
TDOT National Highway Performance Program (NHPP) Grouping

**Termini**  
KINGSPORT MPO - NATIONAL HIGHWAY SYSTEM PRESERVATION AND OPERATION URBAN GROUPING

**Project Description**  
See TIP grouping description for a comprehensive listing of activities included but not limited for eligibility

Long Range Plan #	Conformity Status
Chapter 7, Page 115	Not Applicable

FY	Phase	Funding	Programmed Funds	Fed Funds	State Fund	Local Funds
2023	PE/ROW/CONST	NHPP	\$5,912,500	\$4,730,000	\$1,182,500	\$0
2024	PE/ROW/CONST	NHPP	\$5,613,000	\$4,490,400	\$1,122,600	\$0
2025	PE/ROW/CONST	NHPP	\$4,378,000	\$3,502,400	\$875,600	\$0
2026	PE/ROW/CONST	NHPP	\$3,442,500	\$2,754,000	\$688,500	\$0
<b>Total</b>			<b>\$19,346,000</b>	<b>\$15,476,800</b>	<b>\$3,869,200</b>	<b>\$0</b>



**TIP Project Report**  
8/18/2022

<b>TIP ID</b>	<b>PIN #</b>	<b>Length in Miles</b>	<b>Lead Agency</b>
KPT TN-2019-007	126820.00		TDOT
<b>State</b>	<b>County</b>		
TN	Greene, Hawkins, Sullivan, Washington, Washington		
<b>State Route</b>	<b>Total Project Cost</b>		
	\$60,000		

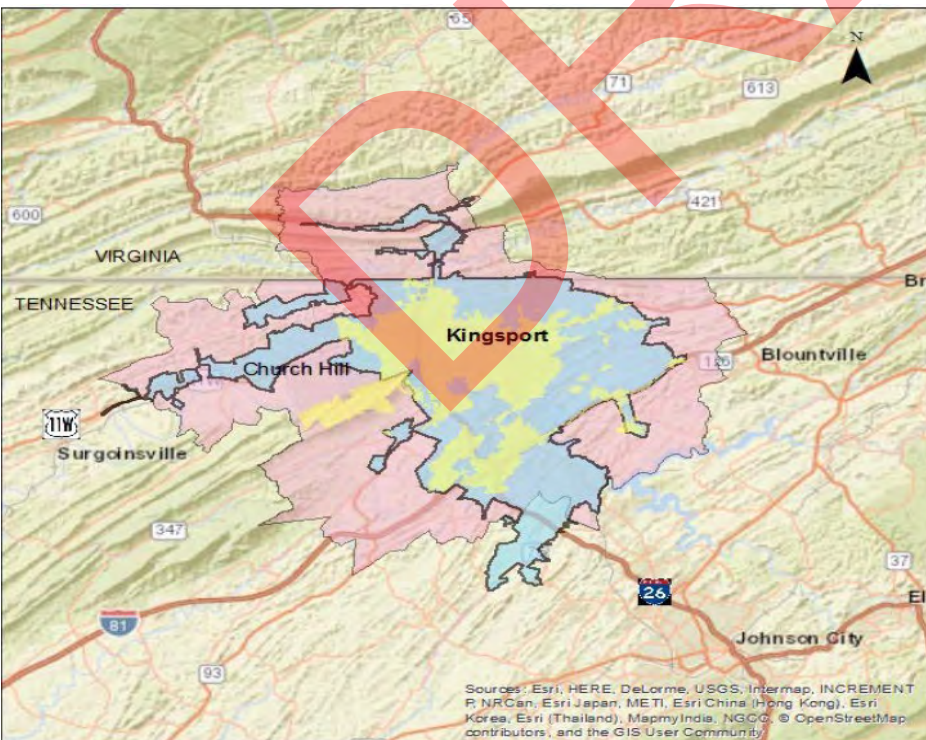
**Project Name**  
TDOT Highway Safety Improvement Program (HSIP) Grouping

**Termini**  
KINGSPORT MTPO - SAFETY - URBAN GROUPING

**Project Description**  
See TIP grouping description for a comprehensive listing of activities included but not limited for eligibility.

<b>Long Range Plan #</b>	<b>Conformity Status</b>
Chapter 7, Page 115	Not Applicable

FY	Phase	Funding	Programmed Funds	Fed Funds	State Fund	Local Funds
2023	PE/ROW/CONST	HSIP	\$16,000	\$14,400	\$1,600	\$0
2023	PE/ROW/CONST	HSIP-R	\$14,000	\$12,600	\$1,400	\$0
2023	PE/ROW/CONST	PHSIP	\$0	\$0	\$0	\$0
2024	PE/ROW/CONST	HSIP	\$2,000	\$1,800	\$200	\$0
2024	PE/ROW/CONST	HSIP-R	\$14,000	\$12,600	\$1,400	\$0
2024	PE/ROW/CONST	PHSIP	\$0	\$0	\$0	\$0
2025	PE/ROW/CONST	HSIP	\$1,000	\$900	\$100	\$0
2025	PE/ROW/CONST	HSIP-R	\$8,000	\$7,200	\$800	\$0
2025	PE/ROW/CONST	PHSIP	\$0	\$0	\$0	\$0
2026	PE/ROW/CONST	HSIP	\$1,000	\$900	\$100	\$0
2026	PE/ROW/CONST	HSIP-R	\$4,000	\$3,600	\$400	\$0
2026	PE/ROW/CONST	PHSIP	\$0	\$0	\$0	\$0
<b>Total</b>			<b>\$60,000</b>	<b>\$54,000</b>	<b>\$6,000</b>	<b>\$0</b>



**TIP Project Report**  
8/18/2022

TIP ID	PIN #	Length in Miles	Lead Agency
KPT TN-2019-008	126819.00		TDOT
State	County		
TN	Greene, Hawkins, Sullivan, Washington, Washington		
State Route	Total Project Cost		
	\$4,055,000		

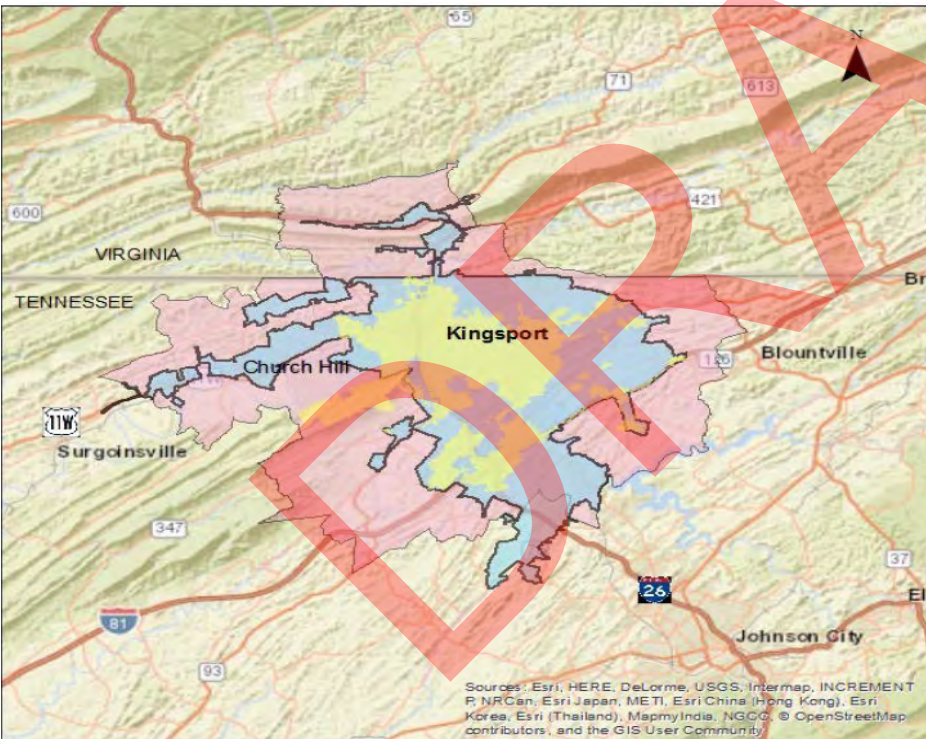
**Project Name**  
TDOT Surface Transportation Block Grant (STBG) Grouping

**Termini**  
KINGSPORT MPO - SURFACE TRANSPORTATION SYSTEM PRESERVATION AND OPERATION URBAN GROUPING

**Project Description**  
See TIP grouping description for a comprehensive listing of activities included but not limited for eligibility.

Long Range Plan #	Conformity Status
Chapter 7, Page 115	Not Applicable

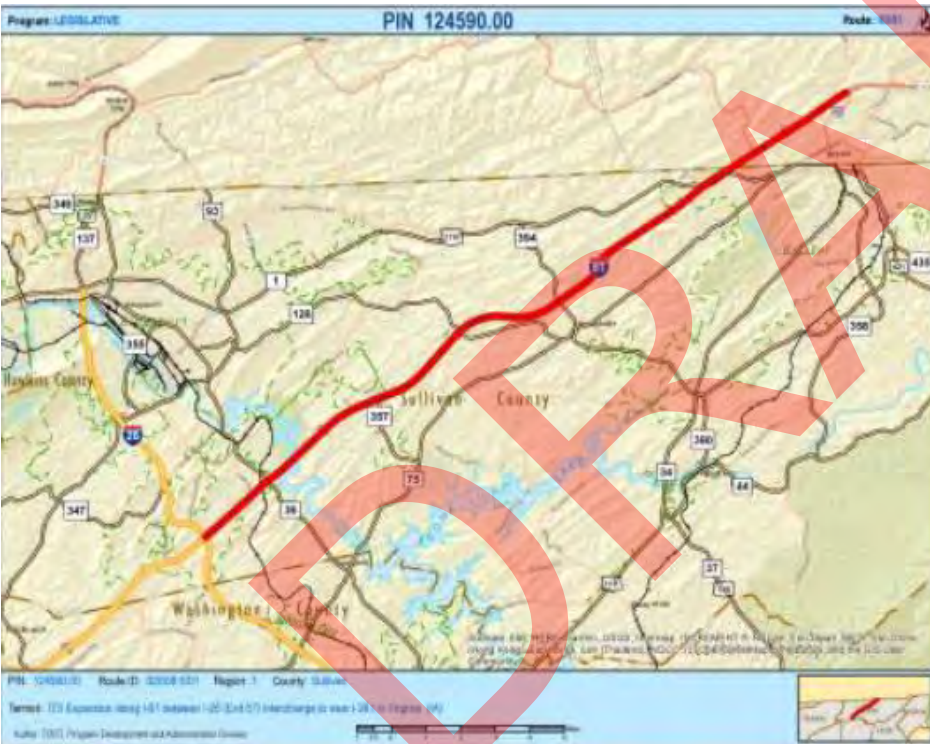
FY	Phase	Funding	Programmed Funds	Fed Funds	State Fund	Local Funds
2023	PE/ROW/CONST	STBG	\$1,622,000	\$1,297,600	\$324,400	\$0
2024	PE/ROW/CONST	STBG	\$1,419,250	\$1,135,400	\$283,850	\$0
2025	PE/ROW/CONST	STBG	\$811,000	\$648,800	\$162,200	\$0
2026	PE/ROW/CONST	STBG	\$202,750	\$162,200	\$40,550	\$0
<b>Total</b>			<b>\$4,055,000</b>	<b>\$3,244,000</b>	<b>\$811,000</b>	<b>\$0</b>



**TIP Project Report**  
8/18/2022

<b>TIP ID</b>	<b>PIN #</b>	<b>Length in Miles</b>	<b>Lead Agency</b>
KPT TN-2019-009	124590.00	23.3	TDOT
<b>State</b>	<b>County</b>		
TN	Sullivan		
<b>State Route</b>	<b>Total Project Cost</b>		
I-81	\$9,490,000		
<b>Project Name</b>			
I-81 ITS Expansion			
<b>Termini</b>			
Near I-26 (Exit 57) Interchange to Near I-381 in Virginia (IA)			
<b>Project Description</b>			
Intelligent Transportation System Expansion			
<b>Long Range Plan #</b>		<b>Conformity Status</b>	
Project #176		Not Applicable	

FY	Phase	Funding	Programmed Funds	Fed Funds	State Fund	Local Funds
2023	PE-D	NHPP	\$350,000	\$315,000	\$35,000	\$0
<b>Total</b>			<b>\$350,000</b>	<b>\$315,000</b>	<b>\$35,000</b>	<b>\$0</b>



**TIP Project Report**  
8/18/2022

<b>TIP ID</b>	<b>PIN #</b>	<b>Length in Miles</b>	<b>Lead Agency</b>
KPT TN-2011-010c	112834.03	0.78	TDOT
<b>State</b>	<b>County</b>		
TN	Sullivan		
<b>State Route</b>	<b>Total Project Cost</b>		
SR-93	\$18,000,000		
<b>Project Name</b>			
SR-93			
<b>Termini</b>			
From South of Horse Creek to North of Derby Drive (TPR Option 5, Spot Improvement 4 & 5) (IA)			
<b>Project Description</b>			
SR-93, South of Horse Cr to N of Derby Dr (TPR Option 5, Spot Improvement 4 & 5))-Reconstruction and Bridges			
<b>Long Range Plan #</b>		<b>Conformity Status</b>	
Project #107		Not Applicable	

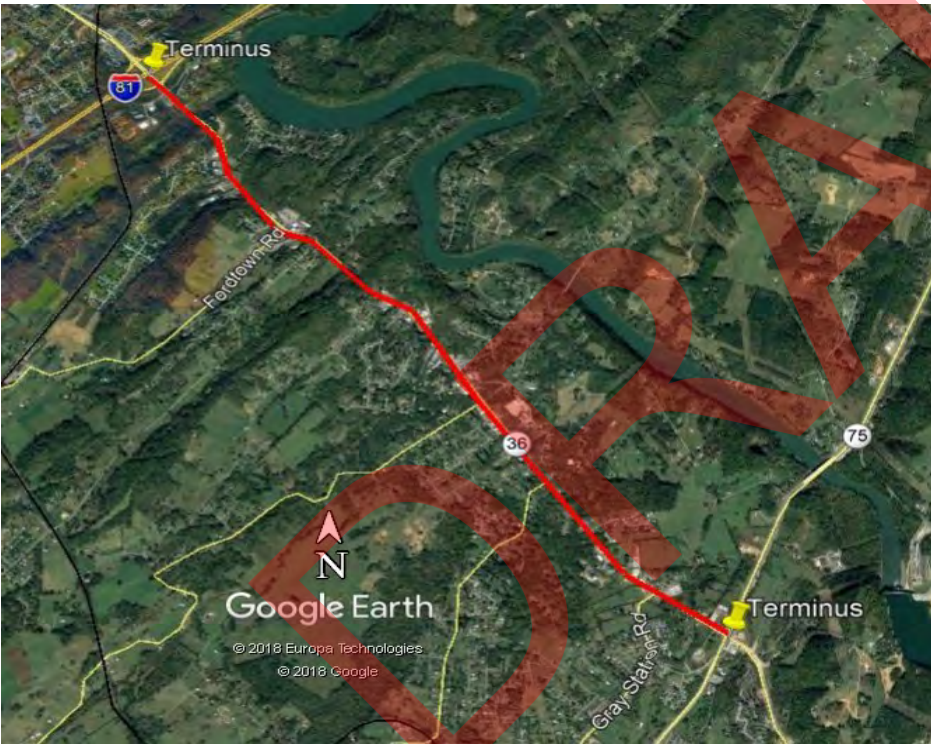
FY	Phase	Funding	Programmed Funds	Fed Funds	State Fund	Local Funds
2024	Const	STBG	\$14,600,000	\$13,140,000	\$1,460,000	\$0
<b>Total</b>			<b>\$14,600,000</b>	<b>\$13,140,000</b>	<b>\$1,460,000</b>	<b>\$0</b>



**TIP Project Report**  
8/18/2022

<b>TIP ID</b>	<b>PIN #</b>	<b>Length in Miles</b>	<b>Lead Agency</b>
KPT TN-2019-011	124663.00	3.53	TDOT
<b>State</b>	<b>County</b>		
TN	Sullivan, Washington, Washington		
<b>State Route</b>	<b>Total Project Cost</b>		
SR-36	\$88,600,000		
<b>Project Name</b>			
SR-36			
<b>Termini</b>			
From SR-75 in Washington County to I-81 in Sullivan County (IA)			
<b>Project Description</b>			
Widen from 2 to 5 lanes.			
<b>Long Range Plan #</b>		<b>Conformity Status</b>	
Project #128		Not Applicable	

FY	Phase	Funding	Programmed Funds	Fed Funds	State Fund	Local Funds
2023	PE-D	STBG	\$2,000,000	\$1,600,000	\$400,000	\$0
<b>Total</b>			<b>\$2,000,000</b>	<b>\$1,600,000</b>	<b>\$400,000</b>	<b>\$0</b>



**TIP Project Report**  
8/18/2022

<b>TIP ID</b>	<b>PIN #</b>	<b>Length in Miles</b>	<b>Lead Agency</b>
KPT PT-2015-015			Kingsport
<b>State</b>	<b>County</b>		
TN	Sullivan		
<b>State Route</b>	<b>Total Project Cost</b>		
	\$8,250,000		

**Project Name**  
KATS Comprehensive Transit Facility

**Termini**  
Kingsport Foundry Site: bounded by Sullivan Street, Main Street, and Unicoi Street

**Project Description**  
Construct a comprehensive transit facility for passenger boarding and transferring, vehicle storage facility, vehicle wash system, as well as to house various transit related functions related to operating and administrating services.

<b>Long Range Plan #</b>	<b>Conformity Status</b>
Chapter 7, Pages 108-112	Not Applicable

FY	Phase	Funding	Programmed Funds	Fed Funds	State Fund	Local Funds
2023	CONST	5307	\$2,900,000	\$2,320,000	\$290,000	\$290,000
<b>Total</b>			<b>\$2,900,000</b>	<b>\$2,320,000</b>	<b>\$290,000</b>	<b>\$290,000</b>

Comments:

- NEPA, Design, and ROW performed during previous TIP. Image shown is conceptual and subject to change.



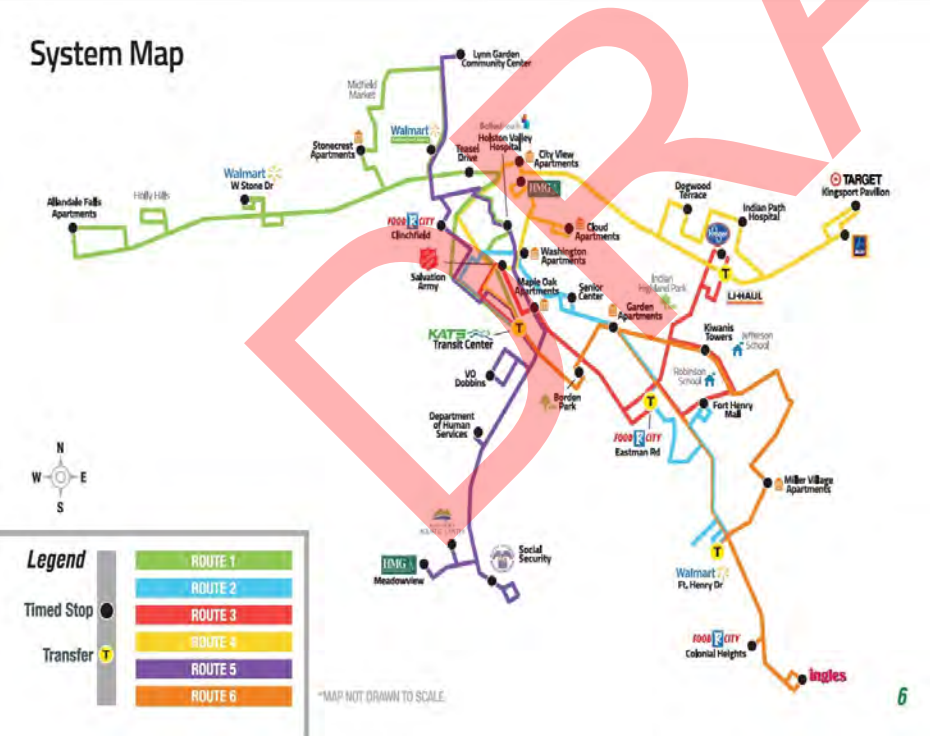
# TIP Project Report

8/18/2022

<b>TIP ID</b>	<b>PIN #</b>	<b>Length in Miles</b>	<b>Lead Agency</b>
KPT PT-2022-023			Kingsport
<b>State</b>	<b>County</b>		
TN	Hawkins, Sullivan		
<b>State Route</b>	<b>Total Project Cost</b>		
	\$9,030,000		
<b>Project Name</b>			
KATS Operations			
<b>Termini</b>			
NA			
<b>Project Description</b>			
Funds utilized to operate Transit Fixed-route Service, microtransit, and ADA/Paratransit Service.			
<b>Long Range Plan #</b>		<b>Conformity Status</b>	
Chapter 7, Pages 108-112		Not Applicable	

FY	Phase	Funding	Programmed Funds	Fed Funds	State Fund	Local Funds
2023	OPERATIONS	5307	\$2,070,000	\$1,000,000	\$670,000	\$400,000
2024	OPERATIONS	5307	\$2,195,000	\$1,100,000	\$685,000	\$410,000
2025	OPERATIONS	5307	\$2,320,000	\$1,200,000	\$700,000	\$420,000
2026	OPERATIONS	5307	\$2,445,000	\$1,300,000	\$715,000	\$430,000
<b>Total</b>			<b>\$9,030,000</b>	<b>\$4,600,000</b>	<b>\$2,770,000</b>	<b>\$1,660,000</b>

- Comments:
- State Funds are UROP funds



**TIP Project Report**  
8/18/2022

<b>TIP ID</b>	<b>PIN #</b>	<b>Length in Miles</b>	<b>Lead Agency</b>
KPT PT-2022-024			Kingsport
<b>State</b>	<b>County</b>		
TN	Hawkins, Sullivan		
<b>State Route</b>	<b>Total Project Cost</b>		
	\$2,000,000		

<b>Project Name</b>
KATS Capital

<b>Termini</b>
NA

<b>Project Description</b>
Funds utilized to purchase and replace transit fleet vehicles, preventive maintenance, overhaul and rebuild vehicles, maintain fleet vehicles, remove and maintain transit buildings/facilities/equipment, purchase transit related equipment, software, hardware, crime prevention and security equipment, construction and maintenance of passenger facilities and infrastructure.

<b>Long Range Plan #</b>	<b>Conformity Status</b>
Chapter 7, Pages 108-112	Not Applicable

FY	Phase	Funding	Programmed Funds	Fed Funds	State Fund	Local Funds
2023	CAPITAL	5307	\$500,000	\$400,000	\$50,000	\$50,000
2024	CAPITAL	5307	\$500,000	\$400,000	\$50,000	\$50,000
2025	CAPITAL	5307	\$500,000	\$400,000	\$50,000	\$50,000
2026	CAPITAL	5307	\$500,000	\$400,000	\$50,000	\$50,000
<b>Total</b>			<b>\$2,000,000</b>	<b>\$1,600,000</b>	<b>\$200,000</b>	<b>\$200,000</b>



**TIP Project Report**  
8/18/2022

<b>TIP ID</b>	<b>PIN #</b>	<b>Length in Miles</b>	<b>Lead Agency</b>
KPT PT-2022-025			Kingsport
<b>State</b>	<b>County</b>		
TN	Hawkins, Sullivan		
<b>State Route</b>	<b>Total Project Cost</b>		
	\$600,000		

<b>Project Name</b>
KATS Capital

<b>Termini</b>
NA

<b>Project Description</b>
Funds utilized to purchase and replace paratransit equipped fleet vehicles, preventive maintenance, overhaul and rebuild vehicles, maintain fleet vehicles, remove and maintain transit buildings/facilities/equipment, purchase transit related equipment, software, hardware, crime prevention and security equipment, construction and maintenance of passenger facilities and infrastructure.

<b>Long Range Plan #</b>	<b>Conformity Status</b>
Chapter 7, Pages 108-112	Not Applicable

FY	Phase	Funding	Programmed Funds	Fed Funds	State Fund	Local Funds
2023	CAPITAL	5339	\$150,000	\$127,500	\$11,250	\$11,250
2024	CAPITAL	5339	\$150,000	\$127,500	\$11,250	\$11,250
2025	CAPITAL	5339	\$150,000	\$127,500	\$11,250	\$11,250
2026	CAPITAL	5339	\$150,000	\$127,500	\$11,250	\$11,250
<b>Total</b>			<b>\$600,000</b>	<b>\$510,000</b>	<b>\$45,000</b>	<b>\$45,000</b>



**TIP Project Report**  
8/18/2022

<b>TIP ID</b>	<b>PIN #</b>	<b>Length in Miles</b>	<b>Lead Agency</b>
KPT PT-2022-026			Kingsport
<b>State</b>	<b>County</b>		
TN	Hawkins, Sullivan		
<b>State Route</b>	<b>Total Project Cost</b>		
	\$200,000		
<b>Project Name</b>			
KATS Planning			
<b>Termini</b>			
NA			
<b>Project Description</b>			
Planning, engineering design, evaluation of transit projects, and other technical transportation-related studies			
<b>Long Range Plan #</b>		<b>Conformity Status</b>	
Chapter 7, Pages 108-112		Not Applicable	

FY	Phase	Funding	Programmed Funds	Fed Funds	State Fund	Local Funds
2023	PLANNING	5307	\$50,000	\$40,000	\$5,000	\$5,000
2024	PLANNING	5307	\$50,000	\$40,000	\$5,000	\$5,000
2025	PLANNING	5307	\$50,000	\$40,000	\$5,000	\$5,000
2026	PLANNING	5307	\$50,000	\$40,000	\$5,000	\$5,000
<b>Total</b>			<b>\$200,000</b>	<b>\$160,000</b>	<b>\$20,000</b>	<b>\$20,000</b>



# TIP Project Report

8/18/2022

<b>TIP ID</b>	<b>PIN #</b>	<b>Length in Miles</b>	<b>Lead Agency</b>
KPT PT-2022-027			Kingsport
<b>State</b>	<b>County</b>		
TN	Hawkins, Sullivan		
<b>State Route</b>	<b>Total Project Cost</b>		
	\$170,000		

<b>Project Name</b>
KATS Capital

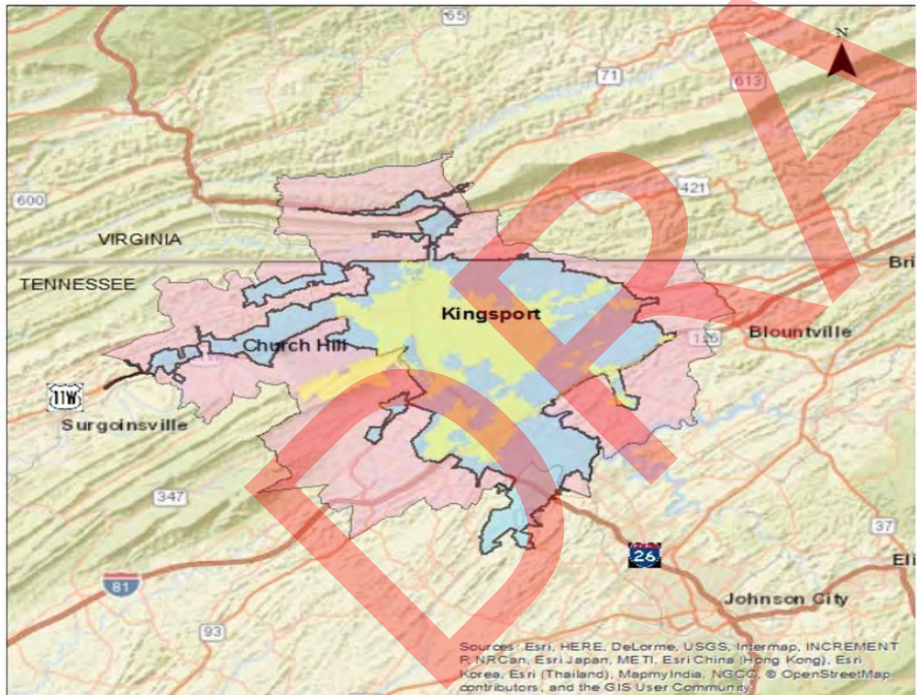
<b>Termini</b>
NA

<b>Project Description</b>
Funds utilized to purchase and replace transit fleet vehicles, preventive maintenance, overhaul and rebuild vehicles, maintain fleet vehicles, renovate and maintain transit buildings/facilities/equipment, purchase transit related equipment, software, hardware, crime prevention and security equipment, construction and maintenance of passenger facilities and infrastructure.

<b>Long Range Plan #</b>	<b>Conformity Status</b>
Chapter 7, Pages 108-112	Not Applicable

FY	Phase	Funding	Programmed Funds	Fed Funds	State Fund	Local Funds
2023	CAPITAL	5339(B)	\$170,000	\$103,700	\$49,300	\$17,000
<b>Total</b>			<b>\$170,000</b>	<b>\$103,700</b>	<b>\$49,300</b>	<b>\$17,000</b>

KATS Service Area in Yellow (Kingsport City Limits)



**TIP Project Report**  
8/18/2022

<b>TIP ID</b>	<b>PIN #</b>	<b>Length in Miles</b>	<b>Lead Agency</b>
KPT PT-2022-028			FTHRA
<b>State</b>	<b>County</b>		
TN	Greene, Hawkins, Sullivan, Washington, Washington		
<b>State Route</b>	<b>Total Project Cost</b>		
	\$1,708,843		

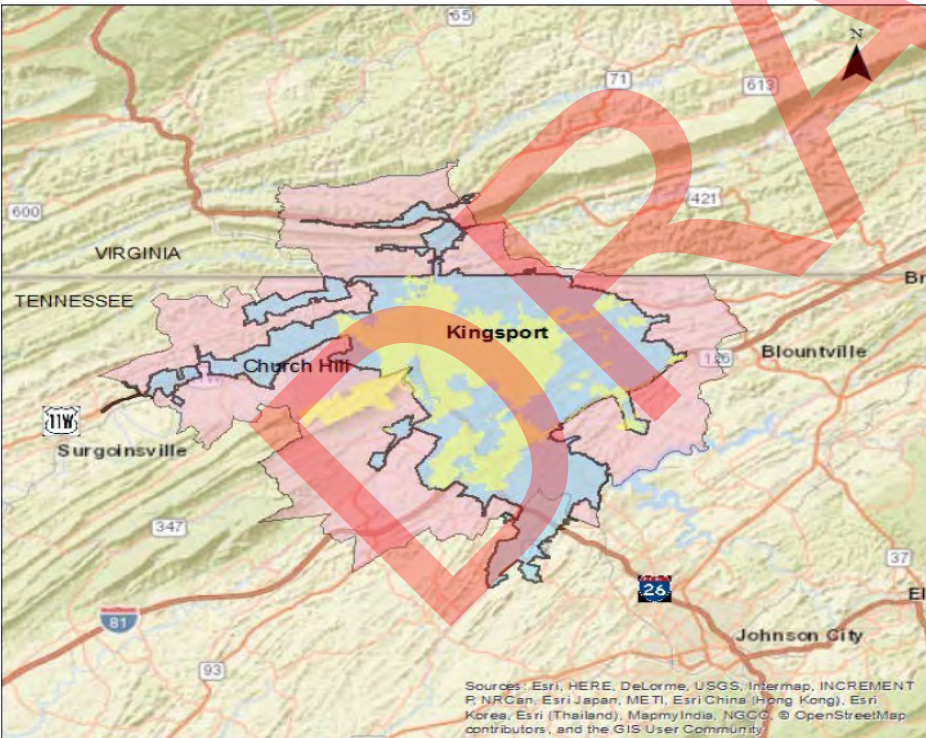
**Project Name**  
NET Trans - Operating Expenses

**Termini**  
NA

**Project Description**  
Daily operating of demand response service (including employees' wages, fuel, insurance, radio communications, operating supplies and utilities) to provide transportation services in the urbanized area outside of the corporate City limits including but not limited to; Mt. Carmel, Church Hill, Surgoinville, Rogersville. Service will also provide regional connectivity between UZA's.

<b>Long Range Plan #</b>	<b>Conformity Status</b>
Chapter 7, Pages 108-112	Not Applicable

FY	Phase	Funding	Programmed Funds	Fed Funds	State Fund	Local Funds
2023	OPERATIONS	5307	\$362,832	\$181,416	\$0	\$181,416
2024	OPERATIONS	5307	\$402,744	\$201,372	\$0	\$201,372
2025	OPERATIONS	5307	\$447,046	\$223,523	\$0	\$223,523
2026	OPERATIONS	5307	\$496,220	\$248,110	\$0	\$248,110
<b>Total</b>			<b>\$1,708,842</b>	<b>\$854,421</b>	<b>\$0</b>	<b>\$854,421</b>



**TIP Project Report**  
8/18/2022

<b>TIP ID</b>	<b>PIN #</b>	<b>Length in Miles</b>	<b>Lead Agency</b>
KPT PT-2022-029			FTHRA
<b>State</b>	<b>County</b>		
TN	Greene, Hawkins, Sullivan, Washington, Washington		
<b>State Route</b>	<b>Total Project Cost</b>		
	\$231,485		

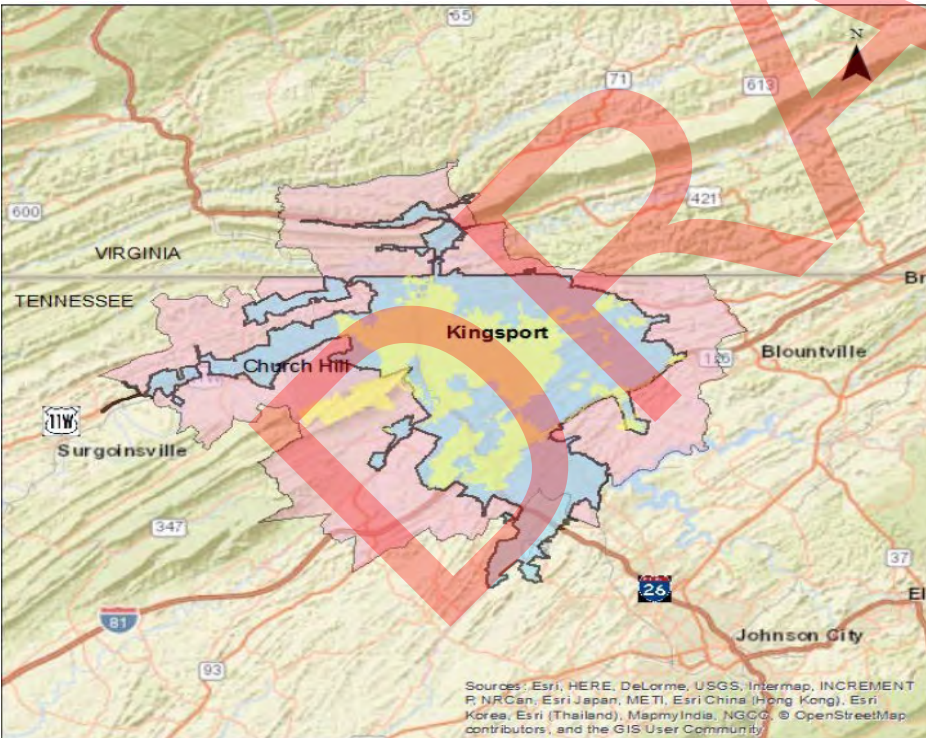
**Project Name**  
NET Trans - Capital Purchases (Revenue Vehicles)

**Termini**  
NA

**Project Description**  
These vehicles will be used to provide demand response transportation services in the urbanized area outside of the corporate City limits of Sullivan county. Service will also provide regional connectivity between UZA's. This allows us to continue providing safe and reliable public transportation to our customers. They will have a useful life of 4 years and 100,000 miles.

<b>Long Range Plan #</b>	<b>Conformity Status</b>
Chapter 7, Pages 108-112	Not Applicable

FY	Phase	Funding	Programmed Funds	Fed Funds	State Fund	Local Funds
2023	CAPITAL	5339	\$53,708	\$42,966	\$5,371	\$5,371
2024	CAPITAL	5339	\$56,392	\$45,114	\$5,639	\$5,639
2025	CAPITAL	5339	\$59,212	\$47,370	\$5,921	\$5,921
2026	CAPITAL	5339	\$62,173	\$49,739	\$6,217	\$6,217
<b>Total</b>			<b>\$231,485</b>	<b>\$185,189</b>	<b>\$23,148</b>	<b>\$23,148</b>



# TIP Project Report

8/18/2022

<b>TIP ID</b>	<b>PIN #</b>	<b>Length in Miles</b>	<b>Lead Agency</b>
KPT PT-2022-030			FTHRA
<b>State</b>	<b>County</b>		
TN	Greene, Hawkins, Sullivan, Washington, Washington		
<b>State Route</b>	<b>Total Project Cost</b>		
	\$82,783		

**Project Name**

NET Trans - Mobility Management

**Termini**

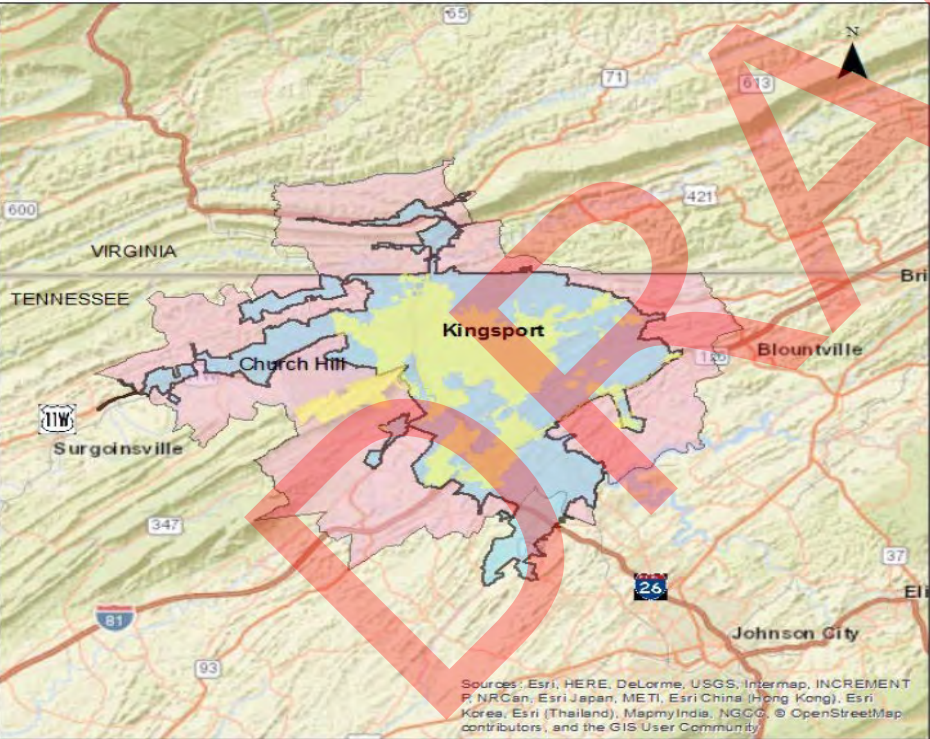
NA

**Project Description**

This will fall under the Enhanced Mobility of Seniors & Individuals with Disabilities - Section 5310 grant program. This will help us continue our Mobility Management program for the urbanized areas.

<b>Long Range Plan #</b>	<b>Conformity Status</b>
Chapter 7, Pages 108-112	Not Applicable

FY	Phase	Funding	Programmed Funds	Fed Funds	State Fund	Local Funds
2025	CAPITAL	5310	\$40,780	\$32,624	\$4,078	\$4,078
2026	CAPITAL	5310	\$42,003	\$33,603	\$4,200	\$4,200
<b>Total</b>			<b>\$82,783</b>	<b>\$66,227</b>	<b>\$8,278</b>	<b>\$8,278</b>

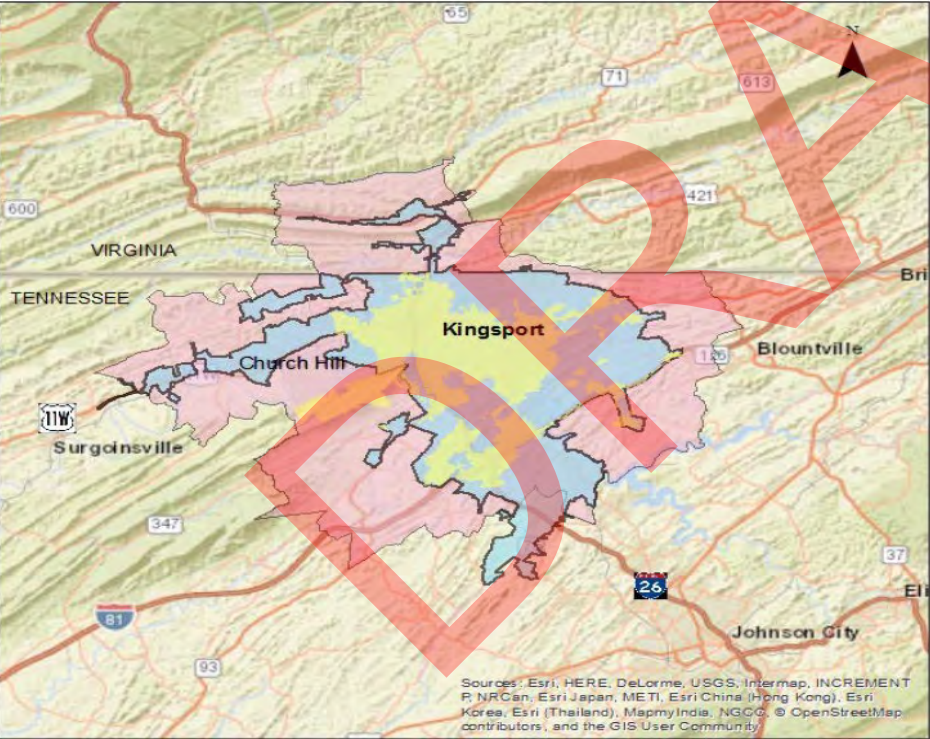


# TIP Project Report

8/18/2022

<b>TIP ID</b>	<b>PIN #</b>	<b>Length in Miles</b>	<b>Lead Agency</b>
KPT PT-2022-031			Frontier Health
<b>State</b>	<b>County</b>		
TN	Hawkins, Sullivan		
<b>State Route</b>	<b>Total Project Cost</b>		
	\$160,000		
<b>Project Name</b>			
Frontier Health - Capital			
<b>Termini</b>			
NA			
<b>Project Description</b>			
Acquisition on 1 standard rear lift conversion van to provide transportation services for clients in the Kingsport urbanized area.			
<b>Long Range Plan #</b>		<b>Conformity Status</b>	
Chapter 7, Pages 108-112		Not Applicable	

FY	Phase	Funding	Programmed Funds	Fed Funds	State Fund	Local Funds
2023	CAPITAL	5310	\$40,000	\$32,000	\$4,000	\$4,000
2024	CAPITAL	5310	\$40,000	\$32,000	\$4,000	\$4,000
2025	CAPITAL	5310	\$40,000	\$32,000	\$4,000	\$4,000
2026	CAPITAL	5310	\$40,000	\$32,000	\$4,000	\$4,000
<b>Total</b>			<b>\$160,000</b>	<b>\$128,000</b>	<b>\$16,000</b>	<b>\$16,000</b>





eSTIP Fiscal Constraints Report for STIP Period 2023  
Kingsport MPO

Fund Code	Fiscal Year	Budget Total	Programmed Funds	Federal Funding	State Funding	Local Funding	Federal Carryover	Remaining Balance
5307	2023	\$5,882,832	\$5,882,832	\$3,941,416	\$1,015,000	\$926,416	\$0	\$0
5307	2024	\$3,147,744	\$3,147,744	\$1,741,372	\$740,000	\$666,372	\$0	\$0
5307	2025	\$3,317,046	\$3,317,046	\$1,863,523	\$755,000	\$698,523	\$0	\$0
5307	2026	\$3,491,220	\$3,491,220	\$1,988,110	\$770,000	\$733,110	\$0	\$0
5310	2023	\$40,000	\$40,000	\$32,000	\$4,000	\$4,000	\$0	\$0
5310	2024	\$40,000	\$40,000	\$32,000	\$4,000	\$4,000	\$0	\$0
5310	2025	\$80,780	\$80,780	\$64,624	\$8,078	\$8,078	\$0	\$0
5310	2026	\$82,003	\$82,003	\$65,603	\$8,200	\$8,200	\$0	\$0
5339	2023	\$203,708	\$203,708	\$170,466	\$16,621	\$16,621	\$0	\$0
5339	2024	\$206,392	\$206,392	\$172,614	\$16,889	\$16,889	\$0	\$0
5339	2025	\$209,212	\$209,212	\$174,870	\$17,171	\$17,171	\$0	\$0
5339	2026	\$212,173	\$212,173	\$177,239	\$17,467	\$17,467	\$0	\$0
5339(B)	2023	\$170,000	\$170,000	\$103,700	\$49,300	\$17,000	\$0	\$0
HSIP	2023	\$16,000	\$16,000	\$14,400	\$1,600	\$0	\$0	\$0
HSIP	2024	\$2,000	\$2,000	\$1,800	\$200	\$0	\$0	\$0
HSIP	2025	\$1,000	\$1,000	\$900	\$100	\$0	\$0	\$0
HSIP	2026	\$1,000	\$1,000	\$900	\$100	\$0	\$0	\$0
HSIP-R	2023	\$14,000	\$14,000	\$12,600	\$1,400	\$0	\$0	\$0
HSIP-R	2024	\$14,000	\$14,000	\$12,600	\$1,400	\$0	\$0	\$0
HSIP-R	2025	\$8,000	\$8,000	\$7,200	\$800	\$0	\$0	\$0
HSIP-R	2026	\$4,000	\$4,000	\$3,600	\$400	\$0	\$0	\$0
LOCAL	2025	\$800,000	\$800,000	\$0	\$0	\$800,000	\$0	\$0
NHPP	2023	\$6,262,500	\$6,262,500	\$5,045,000	\$1,217,500	\$0	\$0	\$0
NHPP	2024	\$5,613,000	\$5,613,000	\$4,490,400	\$1,122,600	\$0	\$0	\$0
NHPP	2025	\$4,378,000	\$4,378,000	\$3,502,400	\$875,600	\$0	\$0	\$0
NHPP	2026	\$3,442,500	\$3,442,500	\$2,754,000	\$688,500	\$0	\$0	\$0
STBG	2023	\$3,622,000	\$3,622,000	\$2,897,600	\$724,400	\$0	\$0	\$0
STBG	2024	\$16,019,250	\$16,019,250	\$14,275,400	\$1,743,850	\$0	\$0	\$0
STBG	2025	\$811,000	\$811,000	\$648,800	\$162,200	\$0	\$0	\$0
STBG	2026	\$202,750	\$202,750	\$162,200	\$40,550	\$0	\$0	\$0
STBG-L	2023	\$4,287,515	\$3,368,846	\$3,613,746	\$80,000	\$593,769	\$425,124	\$918,669
STBG-L	2024	\$1,070,669	\$760,000	\$918,669	\$0	\$152,000	\$918,669	\$310,669
STBG-L	2025	\$2,242,980	\$1,690,000	\$1,904,980	\$0	\$338,000	\$310,669	\$552,980
STBG-L	2026	\$2,647,291	\$2,500,000	\$2,147,291	\$0	\$500,000	\$552,980	\$147,291
TAP	2024	\$3,281,250	\$3,281,250	\$2,625,000	\$0	\$656,250	\$0	\$0

## Virginia Projects

MPO TIP Report

### Kingsport MPO

#### Project Groupings

GROUPING		Maintenance : Preventive Maintenance for Bridges				
PROGRAM NOTE		Funding identified to be obligated districtwide as projects are identified.				
ROUTE/STREET					TOTAL COST	\$31,048,821
	FUND SOURCE	MATCH	FY21	FY22	FY23	FY24
CN	Federal - NHS/NHPP	\$0	\$70,775	\$11,512,055	\$1,000,000	\$1,000,000
	Federal - STP/STBG	\$0	\$2,400,000	\$4,220,686	\$6,558,217	\$4,287,088
CN TOTAL		\$0	\$2,470,775	\$15,732,741	\$7,558,217	\$5,287,088
MPO Note						

DRAFT

NOTE: Virginia is on a different STIP/TIP schedule.  
Virginia projects are carried forward from the FY20-23 TIP and updated  
through a TIP Amendment as the new project data is available.

**Kingsport MPO**

## Project Groupings

GROUPING		Maintenance : Traffic and Safety Operations				
PROGRAM NOTE		Funding identified to be obligated districtwide as projects are identified.				
ROUTE/STREET					TOTAL COST	\$59,681,826
	FUND SOURCE	MATCH	FY21	FY22	FY23	FY24
CN	Federal - NHFP	\$0	\$2,500,000	\$2,500,000	\$0	\$0
	Federal - STP/STBG	\$0	\$4,125,374	\$37,906,455	\$6,292,900	\$6,357,097
CN TOTAL		\$0	\$6,625,374	\$40,406,455	\$6,292,900	\$6,357,097
MPO Note						

DRAFT

**Kingsport MPO**

## Project Groupings

GROUPING		Maintenance : Preventive Maintenance and System Preservation				
PROGRAM NOTE		Funding identified to be obligated districtwide as projects are identified.				
ROUTE/STREET					TOTAL COST	\$48,718,396
	FUND SOURCE	MATCH	FY18	FY19	FY20	FY21
CN	Federal - NHS/NHPP	\$0	\$0	\$0	\$35,980,442	\$0
	Federal - STP/STBG	\$0	\$3,460,781	\$2,835,024	\$2,837,003	\$3,605,146
CN TOTAL		\$0	\$3,460,781	\$2,835,024	\$38,817,445	\$3,605,146
MPO Note						

DRAFT

**Kingsport MPO**

## Interstate Projects

UPC NO	115852	SCOPE	Traffic Management/Engineering			
SYSTEM	Interstate	JURISDICTION	Statewide		OVERSIGHT	NFO
PROJECT	ITTF FY20 Micro Transit				ADMIN BY	DRPT
DESCRIPTION	FROM: Various TO: Various					
ROUTE/STREET	9999				TOTAL COST	\$500,000
	FUND SOURCE	MATCH	FY21	FY22	FY23	FY24
PE AC	Federal - AC OTHER	\$0	\$500,000	\$0	\$0	\$0

DRAFT

**Kingsport MPO**

## Project Groupings

GROUPING		Construction : Bridge Rehabilitation/Replacement/Reconstruction				
ROUTE/STREET					TOTAL COST	\$8,908,123
	FUND SOURCE	MATCH	FY21	FY22	FY23	FY24
		\$0	\$0	\$0	\$0	\$0

GROUPING		Construction : Rail					
ROUTE/STREET						TOTAL COST	\$1,500,000
	FUND SOURCE	MATCH	FY21	FY22	FY23	FY24	
		\$0	\$0	\$0	\$0	\$0	

GROUPING		Construction : Safety/ITS/Operational Improvements				
ROUTE/STREET					TOTAL COST	\$22,485,757
	FUND SOURCE	MATCH	FY21	FY22	FY23	FY24
PE	Federal - HSIP	\$3,889	\$0	\$35,000	\$0	\$0
CN	Federal - AC CONVERSION	\$561,022	\$658,736	\$1,585,351	\$0	\$0
	Federal - HSIP	\$9,284	\$83,556	\$0	\$0	\$0
CN TOTAL		\$570,306	\$742,292	\$1,585,351	\$0	\$0

GROUPING	Construction : Transportation Enhancement/Byway/Non-Traditional					
ROUTE/STREET					TOTAL COST	\$60,042
	FUND SOURCE	MATCH	FY21	FY22	FY23	FY24
		\$0	\$0	\$0	\$0	\$0

GROUPING		Maintenance : Preventive Maintenance and System Preservation				
PROGRAM NOTE		Funding identified to be obligated districtwide as projects are identified.				
ROUTE/STREET					TOTAL COST	\$65,941,946
	FUND SOURCE	MATCH	FY21	FY22	FY23	FY24
CN	Federal - NHS/NHPP	\$0	\$8,194,023	\$8,194,023	\$8,194,023	\$8,194,023
	Federal - STP/STBG	\$0	\$7,142,995	\$10,847,877	\$4,703,500	\$10,471,482
CN TOTAL		\$0	\$15,337,018	\$19,041,900	\$12,897,523	\$18,665,505

GROUPING		Maintenance : Preventive Maintenance for Bridges				
PROGRAM NOTE		Funding identified to be obligated districtwide as projects are identified.				
ROUTE/STREET					TOTAL COST	\$20,536,766
	FUND SOURCE	MATCH	FY21	FY22	FY23	FY24
CN	Federal - NHS/NHPP	\$0	\$70,775	\$1,000,000	\$1,000,000	\$1,000,000
	Federal - STP/STBG	\$0	\$2,400,000	\$4,220,686	\$6,558,217	\$4,287,088
CN TOTAL		\$0	\$2,470,775	\$5,220,686	\$7,558,217	\$5,287,088

GROUPING		Maintenance : Traffic and Safety Operations				
PROGRAM NOTE		Funding identified to be obligated districtwide as projects are identified.				
ROUTE/STREET					TOTAL COST	\$26,081,512
	FUND SOURCE	MATCH	FY21	FY22	FY23	FY24
CN	Federal - NHFP	\$0	\$2,500,000	\$2,500,000	\$0	\$0
	Federal - STP/STBG	\$0	\$4,125,374	\$4,306,141	\$6,292,900	\$6,357,097
CN TOTAL		\$0	\$6,625,374	\$6,806,141	\$6,292,900	\$6,357,097

DRAFT

## Appendix A

### Projects by Grouping

#### Kingsport MPO

#### Construction : Bridge Rehabilitation/Replacement/Reconstruction

	System	UPC	Jurisdiction / Name / Description	Street(Route)	Estimate
Miscellaneous	T19070	Bristol District-wide	0000		\$0
			BRIDGE REHABILITATION/REPLACEMENT		
Primary	86598	Scott County	ORBY CANTRELL HIGHWAY (0023)		\$8,908,123
			SB&NB 23 over NF Holston R Va struc 1003 & 1108 FED ID 16543		
			FROM: 0.086 Mi. S. Intersection Rte. 707 TO: 0.154 Mi. N. Intersection Rte. 614 (0.3470 MI)		
Construction : Bridge Rehabilitation/Replacement/Reconstruction Total					\$8,908,123

#### Construction : Rail

	System	UPC	Jurisdiction / Name / Description	Street(Route)	Estimate
Miscellaneous	112018	Statewide	HIGHWAY-RAIL SAFETY (0000)		\$700,000
			Highway-Rail Safety Inventory Section 130 PE Only		
			FROM: Statewide TO: Statewide		
Miscellaneous	112213	Statewide	HIGHWAY RAIL SAFETY (0000)		\$300,000
			Highway-Rail Section 130 Pre Scoping PE Only		
			FROM: Statewide TO: Statewide		
Miscellaneous	112497	Statewide	VARIOUS (0000)		\$500,000
			ENVIRONMENTAL EQ429 FORM PROCESSING CHARGES		
			FROM: FOR HIGHWAY/RAIL SAFETY PROJECTS WITHOUT PE NUMBERS TO: ASSIGNED		
Construction : Rail Total					\$1,500,000

#### Construction : Safety/ITS/Operational Improvements

	System	UPC	Jurisdiction / Name / Description	Street(Route)	Estimate
Interstate	107802	Statewide	9999		\$918,907
			Incident Management Emergency Evacuation and Detour Plans		
			FROM: Various TO: Various		
Interstate	110551	Statewide	9999		\$362,560
			Traffic Video Expansion - 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	111892	Statewide	9999		\$0
			ATMS - Phase 1, 2, 3, 4		
			FROM: Various TO: Various		
Interstate	114400	Statewide	9999		\$300,000
			Drone Technology Project		
			FROM: Various TO: Various		

**Kingsport MPO****Construction : Safety/ITS/Operational Improvements**

	System	UPC	Jurisdiction / Name / Description	Street(Route)	Estimate
Interstate	115854	Statewide	9999		\$1,250,000
			ITTF FY20 Arterial Operations Program Dashboard		
			FROM: n/a TO: n/a		
Interstate	115855	Statewide	9999		\$4,700,000
			ITTF FY20 High Speed Communications		
			FROM: Various TO: Various		
Miscellaneous	T19069	Bristol District-wide	0000		\$0
			CN: SAFETY/ITS/OPERATIONAL/IMPROVEMENTS		
Miscellaneous	105481	Statewide	0000		\$1,400,000
			Impement iPeMS (Iteris Performance Measurement System)		
			FROM: various TO: various		
Miscellaneous	114193	Statewide	VARIOUS (9999)		\$0
			PEDESTRIAN IMPROVEMENTS AT PRIORITY CORRIDOR STATEWIDE		
			FROM: VARIOUS TO: VARIOUS		
Primary	110878	Gate City	WEST JACKSON STREET (0023)		\$84,817
			West Jackson Street Sidewalk Improvements		
			FROM: Kane Street TO: Water Street		
Primary	113770	Scott County	0023		\$563,344
			RTE. 23 INSTALL RUMBLE STRIPS, GUARDRAIL, DRAINAGE IMPROV.		
			FROM: Int. of Alt. Rte. 58 and Rte. 23 TO: West Jackson Street (2.6840 MI)		
Primary	109438	Scott County	ORBY CANTRELL HIGHWAY (0058)		\$6,877,391
			#HB2.FY17 - US58/23 Access Management With Park & Ride		
			FROM: 0.182 mi. W. Int. Rte. 58/619 TO: 0.244 mi. E. Int. Rte. 58/619 (0.4260 MI)		
Primary	113892	Scott County	VETERANS MEMORIAL HWY (0072)		\$195,000
			State Route 72 Scott County Rumble Strips		
			FROM: Intersection VA-71E TO: Intersection VA-65E (10.8000 MI)		
Primary	104189	Scott County	WADLOW GAP HWY (0224)		\$3,213,719
			Safety Improvements-Rte. 224 (Phase II-remove curve)		
			FROM: 0.064 Mi. S. Int. Rte. 614 TO: 0.332 Mi. S. Int. rte. 614 (0.2570 MI)		
Construction : Safety/ITS/Operational Improvements Total					\$22,485,757

**Construction : Transportation Enhancement/Byway/Non-Traditional**

	System	UPC	Jurisdiction / Name / Description	Street(Route)	Estimate
Enhancement	108097	Scott County	EN09		\$60,042
			RESTORATION OF BUSH MILL		
Miscellaneous	T19067	Bristol District-wide	0000		\$0
			CN: TRANSPORTATION ENHANCEMENT/BYWAY/OTHER NON-TRADITIONAL		
Construction : Transportation Enhancement/Byway/Non-Traditional Total					\$60,042

**Kingsport MPO****Maintenance : Preventive Maintenance and System Preservation**

	System	UPC	Jurisdiction / Name / Description	Street(Route)	Estimate
Miscellaneous	T14707	Bristol District-wide	0000		\$65,941,946
STIP-MN Bristol: Preventive MN and System Preservation					
Maintenance : Preventive Maintenance and System Preservation Total					\$65,941,946

**Maintenance : Preventive Maintenance for Bridges**

	System	UPC	Jurisdiction / Name / Description	Street(Route)	Estimate
Miscellaneous	T14706	Bristol District-wide	0000		\$20,536,766
STIP-MN Bristol: Preventive MN for Bridges					
Maintenance : Preventive Maintenance for Bridges Total					\$20,536,766

**Maintenance : Traffic and Safety Operations**

	System	UPC	Jurisdiction / Name / Description	Street(Route)	Estimate
Miscellaneous	T14705	Bristol District-wide	0000		\$26,081,512
STIP-MN Bristol: Traffic and Safety Operations					
Maintenance : Traffic and Safety Operations Total					\$26,081,512

<b>Kingsport MPO Total</b>	<b>\$145,514,146</b>
----------------------------	----------------------

**TABLE C : Kingsport MPO  
FEDERAL FUNDING CATEGORIES  
FISCAL CONSTRAINT BY YEAR**

Highway Projects  
FFY 2021 - 2024

Fund Source	FFY 2021		FFY 2022		FFY 2023		FFY 2024		TOTAL	
	Projected Obligation Authority	Planned Obligation	Projected Obligation Authority	Planned Obligation	Projected Obligation Authority	Planned Obligation	Projected Obligation Authority	Planned Obligation	Projected Obligation Authority	Planned Obligation
<b>Federal</b>										
HSIP	\$83,556	\$83,556	\$35,000	\$35,000	\$0	\$0	\$0	\$0	\$118,556	\$118,556
<b>Subtotal -- Federal</b>	<b>\$83,556</b>	<b>\$83,556</b>	<b>\$35,000</b>	<b>\$35,000</b>	<b>\$0</b>	<b>\$0</b>	<b>\$0</b>	<b>\$0</b>	<b>\$118,556</b>	<b>\$118,556</b>
<b>Other</b>										
State Match	\$9,284	\$9,284	\$3,889	\$3,889	\$0	\$0	\$0	\$0	\$13,173	\$13,173
<b>Subtotal -- Other</b>	<b>\$9,284</b>	<b>\$9,284</b>	<b>\$3,889</b>	<b>\$3,889</b>	<b>\$0</b>	<b>\$0</b>	<b>\$0</b>	<b>\$0</b>	<b>\$13,173</b>	<b>\$13,173</b>
<b>Total</b>	<b>\$92,840</b>	<b>\$92,840</b>	<b>\$38,889</b>	<b>\$38,889</b>	<b>\$0</b>	<b>\$0</b>	<b>\$0</b>	<b>\$0</b>	<b>\$131,729</b>	<b>\$131,729</b>
<b>Federal - ACC (1)</b>										
NHS/NHPP	\$658,736	\$658,736	\$1,585,351	\$1,585,351	\$0	\$0	\$0	\$0	\$2,244,087	\$2,244,087
<b>Subtotal -- Federal - ACC (1)</b>	<b>\$658,736</b>	<b>\$658,736</b>	<b>\$1,585,351</b>	<b>\$1,585,351</b>	<b>\$0</b>	<b>\$0</b>	<b>\$0</b>	<b>\$0</b>	<b>\$2,244,087</b>	<b>\$2,244,087</b>
<b>Maintenance - Federal (4)</b>										
NHFP	\$2,500,000	\$2,500,000	\$2,500,000	\$2,500,000	\$0	\$0	\$0	\$0	\$5,000,000	\$5,000,000
NHS/NHPP	\$8,264,798	\$8,264,798	\$9,194,023	\$9,194,023	\$9,194,023	\$9,194,023	\$9,194,023	\$9,194,023	\$35,846,867	\$35,846,867
STP/STBG	\$13,668,369	\$13,668,369	\$19,374,704	\$19,374,704	\$17,554,617	\$17,554,617	\$21,115,667	\$21,115,667	\$71,713,357	\$71,713,357
<b>Subtotal -- Maintenance - Federal (4)</b>	<b>\$24,433,167</b>	<b>\$24,433,167</b>	<b>\$31,068,727</b>	<b>\$31,068,727</b>	<b>\$26,748,640</b>	<b>\$26,748,640</b>	<b>\$30,309,690</b>	<b>\$30,309,690</b>	<b>\$112,560,224</b>	<b>\$112,560,224</b>

- (1) ACC -- Advance Construction -- Funding included in Federal Category based on year of AC Conversion
- (2) 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



# Local Road Safety Plan

Kingsport Metropolitan Transportation Planning Organization  
Tennessee/Virginia

2022



# Acknowledgements

Kingsport Metropolitan Transportation Planning Organization

Tennessee Department of Transportation

Virginia Department of Transportation

City of Kingsport

Kingsport Police Department

Kingsport City Schools

NET Trans

Hawkins County Health Department

Hawkins County Schools

Sullivan County

Sullivan County Regional Health Department

Sullivan County Sheriff's Office

Scott County Public Schools

LENOWISCO Planning District Commission

Tennessee Local Technical Assistance Program

Federal Highway Administration (FHWA) Tennessee Division

Federal Highway Administration Office of Safety

# Executive Summary

The Kingsport Metropolitan Transportation Planning Organization (KMTPO) promotes a safe, efficient, and reliable multi-modal transportation system that serves the needs of the citizens and those that travel the Kingsport metropolitan region. The KMTPO planning area limits encompass Kingsport, Mt Carmel, Church Hill, Weber City, Gate City, and portions of Sullivan, Hawkins, Greene, and Washington Counties in Tennessee, and Scott County in Virginia. KMTPO is committed to improving transportation safety for all users and eliminating traffic fatalities and serious injuries. To achieve this, KMTPO initiated and, through a series of workshops, engaged a multi-disciplinary stakeholder group comprised of federal, state, and local representatives from the 4E's (engineering, enforcement, education, and emergency response) to develop a Local Road Safety Plan (LRSP).

A LRSP is a Federal Highway Administration (FHWA) Proven Safety Countermeasure<sup>1</sup> that provides a framework for identifying, analyzing, and prioritizing roadway safety improvements on local roads. The LRSP development process and content are tailored to local issues and needs. The process results in a prioritized list of issues, risks, actions, and improvements that can be used to reduce fatalities and serious injuries on all roads in the region. The KMTPO LRSP uses a strategic approach to achieve the vision of creating a transportation system that is safe for all users. It expands on past safety efforts by providing a data-driven framework to collaboratively and equitably focus multi-disciplinary safety strategies and allocate resources. This LRSP focuses on the safety issues of all public roads within the planning area limits and aligns with the goals, objectives, emphasis areas and strategies of the Tennessee Strategic Highway Safety Plan (SHSP)<sup>2</sup> and the Virginia SHSP<sup>3</sup>. It adopts a Safe System Approach<sup>4</sup> which is based on the principles that the human body is vulnerable, humans make mistakes, responsibility is shared, safety is proactive, redundancy is crucial, and it is unacceptable that these mistakes result in death and injury. This supports Tennessee Department of Transportation's (DOT) implementation of the national Toward Zero Deaths concept. The KMTPO LRSP helps the region fulfill its commitment toward eliminating traffic fatalities and serious injuries.

Developed using the collaborative six-step process documented by FHWA, the KMTPO LRSP's intent is to:

---

<sup>1</sup> FHWA, Office of Safety, Proven Safety Countermeasures, [https://safety.fhwa.dot.gov/provencountermeasures/local\\_roads.cfm](https://safety.fhwa.dot.gov/provencountermeasures/local_roads.cfm)

<sup>2</sup> Tennessee Department of Transportation, Tennessee Strategic Highway Safety Plan, <https://www.tn.gov/content/dam/tn/tdot/strategic/SHSP-2020.pdf>

<sup>3</sup> Virginia Department of Transportation, Virginia 2022-2026 Strategic Highway Safety Plan, [https://www.virginiadot.org/info/resources/SHSP/VA\\_2017\\_SHSP\\_Final\\_complete.pdf](https://www.virginiadot.org/info/resources/SHSP/VA_2017_SHSP_Final_complete.pdf)

<sup>4</sup> FHWA, Office of Safety, Safe System Approach flyer, SA-20-015, [https://safety.fhwa.dot.gov/zerodeaths/docs/FHWA\\_SafeSystem\\_Brochure\\_V9\\_508\\_200717.pdf](https://safety.fhwa.dot.gov/zerodeaths/docs/FHWA_SafeSystem_Brochure_V9_508_200717.pdf)

- Achieve a significant reduction of traffic fatalities and serious injuries on public roadways in the KMTPO planning area limits.
- Leverage partnerships and resources to maximize implementation of this plan.
- Complement efforts to develop and implement master transportation plans and other plans and studies.
- Identify strategies and action items based on data analysis and crash trends.
- Prioritize needed roadway safety improvements.
- Increase awareness of road safety and risks through education and enforcement.
- Develop support for funding applications.
- Support implementation of the Tennessee and Virginia SHSPs and help achieve their safety performance targets.

The region has a robust multi-modal transportation system that includes state and locally owned roadways, sidewalks, bicycle paths, multi-use paths, and transit facilities. The roadways in the region are a combination of local streets and multi-lane highways that seek to accommodate the various users of the system but also create conditions that may put vulnerable users at greater risk. The area is experiencing a growing aging population with reduced mobility options that contributes to the unique and diverse safety issues specific to the Kingsport metropolitan region.

This LRSP includes an analysis of safety data (crash, roadway, and traffic volume) for the over 1,000 miles of local roads and over 400 miles of higher classification such as Interstates and arterials that are owned by the State within the limits of the KMTPO planning area between 2016 to 2020. This analysis identified crash trends, over-represented crash types, and the High Injury Network (HIN). During this five-year analysis period, a total of 581 fatal and serious injury crashes occurred on the region's roadways. The data analysis results indicate that infrastructure related predominant crash types occurring on the road system include those involving roadway departure, intersections, and young drivers while predominant behavior-related crash types include distracted driving, impaired driving, speeding, and not using a restraint resulted in these fatalities and serious injuries.

The HIN are those roadways with a concentration of fatal and serious injury crashes. Data analysis facilitated the identification of 185 miles of HIN which represents nearly 14 percent of the region's road system on which nearly 71 percent of the total fatal and serious injury crashes occurred. These roadways also overlap with transportation equity areas. The largest portion of fatal and serious injury crashes occur on US-11W/TN-1, I-81, Fort Henry Drive/TN-36, US-23, TN-93, and I-26. Data analysis and field reviews of these locations and other portions of the HIN indicate a need for a variety of safety countermeasures such as enhanced visibility of the existing traffic control devices, crosswalks at intersections across the network, and consistent and enhanced delineation of curves. Safety improvements on the HIN will have the greatest impact on reducing fatal and serious injury crashes.

The stakeholder group used the data analysis results and collaborated through a series of workshops to establish vision, mission, and goal statements, select seven LRSP emphasis areas,

and identify safety strategies. The LRSP uses the five elements (Safe Roads, Safe Road Users, Safe Speeds, Safe Vehicles, and Post-Crash Care) of the Safe System Approach as the framework for integrating the emphasis areas, strategies, and action items. It uses a proactive approach and considers redundancy in the implementation of strategies and action items. Redundancy means that reducing risks requires that all parts of the transportation system play a role in safe roads, so that if one part fails, the other parts still protect people.

To facilitate implementation of the LRSP, each strategy and action item includes lead and partner agencies, an implementation time frame (low, medium, and long-term), and level of funding (low, medium, and high). The KMTPO and its stakeholders recognize the limitation of resources including funding, staffing, and existing protocols; therefore, have prioritized actionable strategies. These include items such as establishing a KMTPO Safety Committee, improving data collection especially related to non-motorized users and intersections, conducting road safety audits (RSAs) on HIN corridors, and implementing RSA recommendations, providing enhanced crosswalk and intersection visibility, and implementing road infrastructure that accommodates all users of the transportation system.

The LRSP identifies and prioritizes potential projects to help advance implementation. The LRSP is viewed as a living document that will be updated every three to five years as the Tennessee SHSP, Virginia SHSP, and the KMTPO Long Range Transportation Plan (LRTP) are updated to reflect changing needs and priorities of the Kingsport metropolitan region. It is the combined, collaborative efforts of the stakeholders that will advance the implementation of the LRSP and achieves the vision of creating a transportation system that is safe for all users.

# Acronym List

4Es	Engineering, Education, Enforcement, and Emergency Medical Services
A	Suspected Serious Injury/A-Injury (From the KABCO Injury Scale)
B	Non-Incapacitating Injury (From the KABCO Injury Scale)
C	Possible Injury (From the KABCO Injury Scale)
DMV	Department of Motor Vehicles
EMS	Emergency Medical Services
FHWA	Federal Highway Administration
HIN	High Injury Network
HSM	Highway Safety Manual
HSP	Highway Safety Plan
HSIP	Highway Safety Improvement Program
K	Fatality (from the KABCO injury scale)
KA	Fatal and Serious Injury
KMTPO	Kingsport Metropolitan Transportation Planning Organization
LEL	Law Enforcement Liaison
LRSP	Local Road Safety Plan
LRTP	Long Range Transportation Plan
NHTSA	National Highway Traffic Safety Administration
O	Property Damage Only (From the KABCO Injury Scale)
PSC	Proven Safety Countermeasure (As identified by FHWA)
RSA	Road Safety Audit
SS4A	Safe Streets and Roads for All
SHSP	Strategic Highway Safety Plan
TDOSHS	Tennessee Department of Safety and Homeland Security
TDOT	Tennessee Department of Transportation
THP	Tennessee Highway Patrol
THSO	Tennessee Highway Safety Office
VDH	Virginia Department of Health
VDMV	Virginia Department of Motor Vehicles
VDOT	Virginia Department of Transportation
VSP	Virginia State Police

# Contents

Acknowledgements.....	ii
Executive Summary .....	ii
Acronym List .....	ii
Background .....	1
Safe System Approach .....	4
Equity .....	6
Vision, Mission, Goal.....	8
LRSP Process Methodology .....	9
Existing Efforts.....	13
Data Analysis.....	15
Emphasis Areas .....	22
Action Tables .....	31
Implementation and Evaluation .....	46
Regional Safety Priorities .....	49
Appendix: Crash Trees.....	51

# Background

The Kingsport Metropolitan Transportation Planning Organization (KMTPO) consists of the City of Kingsport, City of Church Hill, and Town of Mount Carmel, Tennessee; Town of Weber City and Town of Gate City, Virginia; and portions of Hawkins County, Sullivan County, Greene County, and Washington County, Tennessee as well as portions of Scott County, Virginia. Figure 1 illustrates the geographic coverage of the KMTPO area.

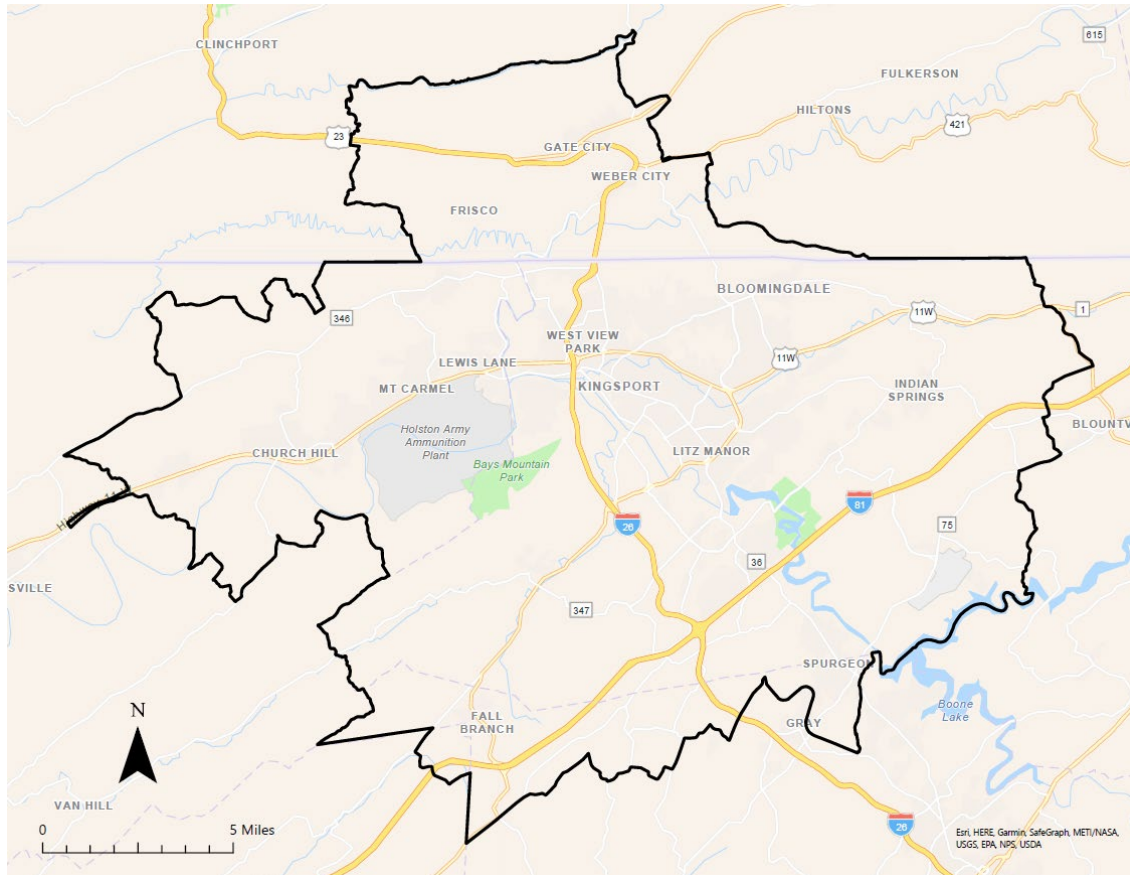



Figure 1. Graphic. Kingsport Metropolitan Planning Area (Source: FHWA, 2022).

According to data from the 2019 US Census American Community Survey (ACS), the KMTPO area has a population of 141,745 residents, roughly stable from 2010 (141,797). However, the City of Kingsport saw a substantial increase of 11 percent, or over five thousand people. Overall, population in the metropolitan planning area (i.e., Kingsport, Church Hill, Mount Carmel, Gate City, Weber City) increased by eight percent since 2010, due in large part to the growth in Kingsport. The four-county area population (including Sullivan, Hawkins, and Washington County in Tennessee and Scott County in Virginia) grew by one percent, primarily due to growth in Washington County. For comparison, the statewide average growth since 2010 is six percent for both Tennessee and Virginia.



The KMTPO provides a forum for decision-making in the metropolitan planning area to create a multi-modal transportation system that is safe and addresses the needs of the various system users. The region has a robust multi-modal transportation system that includes state and locally owned roadways, sidewalks, bicycle lanes, multi-use paths, and transit facilities. There are over 1,000 miles of local roadways within the metropolitan planning area. These roadways are a combination of older, historic routes in areas such as downtown Kingsport and multi-lane highways outside of the downtown core. The 2045 LRTP indicates there are 46 miles of roadway in the region with sidewalk and 30 miles of official bicycle accommodations (on-street bike lanes, paved shoulders, shared lanes) in the region. Three public transit operators exist in the region. Consideration of the diverse users of the system within the Kingsport region requires retrofitting infrastructure that has historically prioritized the motor vehicle.

The KMTPO is committed to improving transportation safety for all users and eliminating traffic fatalities and serious injuries. The established safety goal from the [Kingsport Long Range Transportation Plan](#)<sup>5</sup> (LRTP) is “*increase the safety of the transportation system for motorized and non-motorized users*”. To achieve this, the KMTPO initiated and engaged a multi-disciplinary stakeholder group comprised of federal, state, and local representatives from the 4E’s (engineering, enforcement, education, and emergency response) to develop a Local Road Safety Plan (LRSP).

A LRSP is a [Federal Highway Administration \(FHWA\) Proven Safety Countermeasure](#)<sup>6</sup> that provides a framework for identifying, analyzing, and prioritizing roadway safety improvements on local roads. The LRSP development process and content are tailored to local issues and needs. The process results in a prioritized list of issues, risks, actions, and improvements that can be used to reduce fatalities and serious injuries on local roads

The data-driven KMTPO LRSP aligns with the [Tennessee Strategic Highway Safety Plan \(SHSP\)](#)<sup>7</sup> and the [Virginia Strategic Highway Safety Plan](#)<sup>8</sup>. With the focus on improving safety for all users on the road system in the region, the LRSP adopts and uses the Safe System Approach as the framework for integrating the emphasis areas, strategies, and action items.


---

<sup>5</sup> KMTPO 2045 Long Range Transportation Plan, <https://www.kingsporttn.gov/city-services/kmtpo/plans-and-documents/long-range-plan/>

<sup>6</sup> FHWA, Office of Safety, Proven Safety Countermeasures, [https://safety.fhwa.dot.gov/provencountermeasures/local\\_roads.cfm](https://safety.fhwa.dot.gov/provencountermeasures/local_roads.cfm)

<sup>7</sup> Tennessee Department of Transportation, Tennessee Strategic Highway Safety Plan, <https://www.tn.gov/content/dam/tn/tdot/strategic/SHSP-2020.pdf>

<sup>8</sup> Virginia Department of Transportation, Virginia 2022-2026 Strategic Highway Safety Plan [https://www.virginiadot.org/info/resources/SHSP/VA\\_2017\\_SHSP\\_Final\\_complete.pdf](https://www.virginiadot.org/info/resources/SHSP/VA_2017_SHSP_Final_complete.pdf)



Developed using the collaborative six-step LRSP process documented by the Federal Highway Administration (FHWA), the KMTPO LRSP's intent is to:

- Achieve a significant reduction of traffic fatalities and serious injuries on all roads in the KMTPO planning area limits.
- Leverage partnerships and resources to maximize implementation of this plan.
- Complement efforts to develop and implement master transportation plans and other plans and studies.
- Identify strategies and action items based on data analysis and crash trends.
- Prioritize needed roadway safety improvements.
- Increase awareness of road safety and risks through education and enforcement.
- Pursue funding opportunities for identified safety priorities.
- Support implementation of the Tennessee and Virginia SHSPs and help achieve their safety performance targets.

# Safe System Approach

The KMTPO LRSP adopts the [Safe System Approach](#)<sup>9</sup> (figure 2) which is based on the principles that the human body is vulnerable, humans make mistakes, and it is unacceptable that these mistakes result in death and injury. It is critical to design and operate the roadway system to keep impact energy on the human body at tolerable levels. Shared responsibility by all stakeholders is key, making it important that the stakeholders are collaborative and engaged when developing and implementing the KMTPO LRSP.

The FHWA has recognized the Safe System Approach as a method for eliminating traffic fatalities and serious injuries for all roadway users. The Safe System Approach moves beyond the traditional approach of reacting strictly based on crash history to

proactively identifying risk factors associated with severe crash types and implementing safety countermeasures systemically based on those factors. This LRSP includes the systemic implementation of strategies. All parts of the transportation system need to be strengthened to build in redundancy to accommodate failures of the system that may arise. Examples of redundancy include the installation of curve warning signs to alert motorists of conditions in which a slower speed is necessary combined with speed feedback signs and education and enforcement campaigns that help avoid behaviors that may result in crashes.

The KMTPO LRSP uses the five elements of the Safe System Approach as the framework for integrating emphasis areas and strategies. These elements encompass the 4Es of safety and accommodate human error:

**Safe Roads:** The roadway is the platform in which users move across the system. Safe roads incorporate engineering-related strategies during planning, design, construction, maintenance, and operations to prevent crashes and manage impacts to keep kinetic energy at tolerable levels should a crash occur.



Figure 2. Graphic. Safe System approach (Source: FHWA).

<sup>9</sup> FHWA, Office of Safety, Safe System Approach flyer, SA-20-015, [https://safety.fhwa.dot.gov/zerodeaths/docs/FHWA\\_SafeSystem\\_Brochure\\_V9\\_508\\_200717.pdf](https://safety.fhwa.dot.gov/zerodeaths/docs/FHWA_SafeSystem_Brochure_V9_508_200717.pdf)

**Safe Road Users:** This represents all users of all modes of travel. Their capabilities are influenced by factors such as age, level of impairment, and other behaviors. System owners and other stakeholders can use strategies such as signing, enforcement, and education campaigns to address these limitations and encourage behavior change.

**Safe Speeds:** As speeds increase, the risk of death and serious injury dramatically increase. This is especially true for pedestrians (figure 3) where the risk of death doubles for a pedestrian when speeds increase from 32 mph to 42 mph, and triples at 50 mph. Safe speeds increase the likelihood of an individual surviving a crash. Appropriate speed limits and signing, as well as radar speed feedback signs, help reduce the speed of users. These can be reinforced with enforcement and education campaigns.

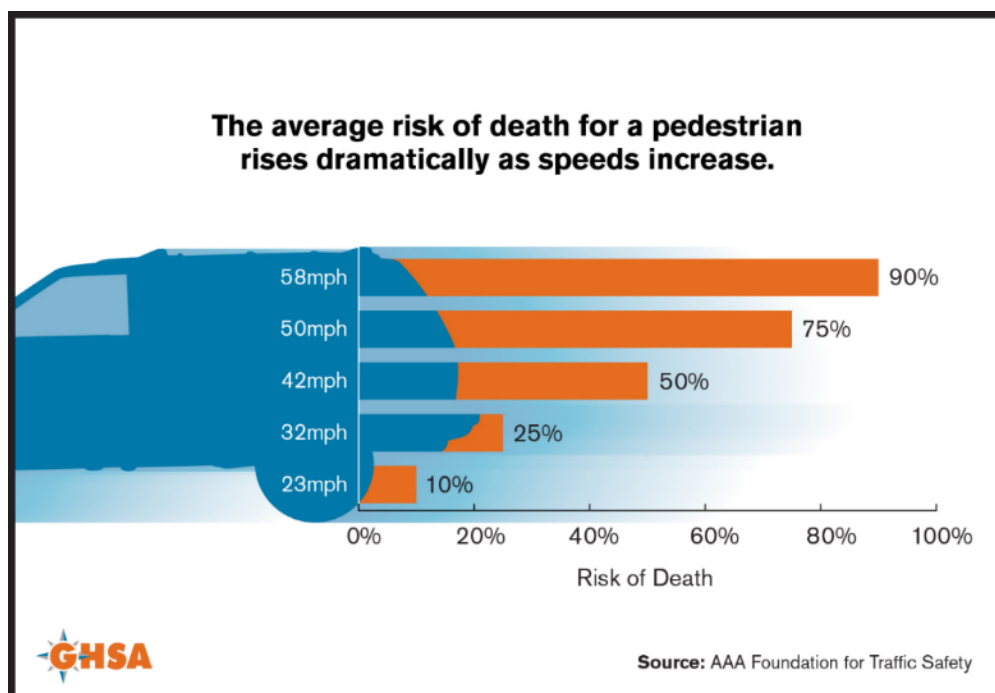


Figure 3. Graphic. Relationship between pedestrian crash risk and speed (Source: GHSA).

**Safe Vehicles:** Safe vehicles incorporate new technology and other features to prevent crashes from occurring, and if they do, reduce the severity of a crash.

**Post-Crash Care:** Post-crash care is critical when a crash occurs, and a person is injured. This includes first responders being able to quickly locate and respond to the crash and stabilize and transport the individual. This also includes accurate and complete data collection and sharing of the data to facilitate improved decision-making and investments specific to safety.

Ultimately, the Safe System Approach puts safety at the forefront and shifts how agencies prioritize transportation investments. The KMTPO and its stakeholders, through their combined efforts and application of the Safe System Approach in the KMTPO LRSP, can have success in reducing traffic fatalities and serious injuries on its roadways.

# Equity

The transportation system is a vital component of the quality of life of the people in a community. As a minimum, it effects where people live, where and how they travel to work and school, and what services and recreational activities are available. Transportation equity seeks fairness in mobility and accessibility to meet the needs of all community members, especially those individuals traditionally underserved. These include populations with limited English proficiency, elderly, persons of disability, minorities, and low-income areas. The Federal Highway Administration (FHWA) provides information on its webpage [Transportation Equity - Transportation Planning Capacity Building Program](#)<sup>10</sup>.

As noted in the Kingsport LRTP, the population of the Kingsport MPA is 94 percent non-Hispanic (White alone) and six percent minority. This is a much lower range of racial and ethnic diversity than the statewide averages of 26 percent for Tennessee and 38 percent for Virginia. The municipal areas are somewhat more diverse, with a nine percent rate overall, and ten percent within the City of Kingsport. Also noted in the LRTP is there are fewer millennials, more imminent retirees, and a much smaller minority population than would normally be expected for an area of this size compared to other regions in the country.


The Kingsport LRTP also indicates that the region has about 26 percent of households earning less than \$25,000 (for reference, the federal poverty level for a four-person household in 2022 is \$27,750, according to the Department of Health and Human Services, versus about \$18,310 for two persons or \$13,590 for one person)<sup>11</sup>. This 26 percent is above the Tennessee average of 23 percent. Generally, there are more low-income households in the municipalities (30%) than unincorporated areas, likely due to the importance of proximity to employment opportunities and public services when one is unable to afford the higher transportation costs associated with traveling longer distances. It is essential to consider these various populations and communities in the Kingsport metropolitan region early during the planning process to address potential impacts and transportation equity.

The KMTPO understands that the demographic composition (age, gender, race/ethnicity, ability/disability, income) of the region is critical to making informed transportation investment decisions and achieving the region's social equity goal of providing equitable investments in transportation to enable quality of life for all residents. The consideration of demographics and equity also influence safety of all road users. For example, houses with zero-vehicles likely means that there will be more people walking, bicycling, or using transit as a means of transportation. This increased exposure would lead to a higher percentage of pedestrian crashes in these communities. Implementation of safety countermeasures such as installing and properly maintaining sidewalks, adding high visibility crosswalks, evaluating intersections for safe

---

<sup>10</sup> FHWA/Federal Transit Administration, Transportation Capacity Building, [Transportation Equity](#)

<sup>11</sup> US Department of Health and Human Services. <https://aspe.hhs.gov/topics/poverty-economic-mobility/poverty-guidelines>



pedestrian accommodations, and placing transit stops to provide for safe travels of users in these zero-vehicle household blocks would improve traffic safety and address equity at the same time.

The KMTPO and its stakeholders considered transportation equity during each step of the LRSP development process. This included using indices to evaluate and compare locations of minority populations, low-income areas, and households with zero-vehicle with those roadways with higher concentration of fatal and serious injury crashes. The LRSP identifies strategies that address the safety needs of all road users. Projects identified support the recognition that the needs of all road users should align with future transportation investments.



# Vision, Mission, Goal

The stakeholders established the KMTPO LRSP Vision, Mission, and Goal statements. These statements reflect the Safe System Approach principles that death and serious injuries are unacceptable and shared responsibility by all stakeholders is necessary. The Vision for the LRSP demonstrates the intent that all users of the roadway system within the Kingsport metropolitan region reach their destination safely. The Mission statement recognizes that a collaborative effort by all the safety partners is necessary to achieve the reductions in traffic-related fatalities and serious injuries set forth by the Goal. Strategies and action items identified in later sections of this LRSP reflect elements of the Safe System Approach and support achieving the Vision, Mission, and Goal statements.

## **Vision:**

*Eliminate ALL deaths and life-changing injuries on Kingsport metropolitan area roadways.*

---

## **Mission:**

*Implement a collaborative data-driven 4E approach (Engineering, Enforcement, Education and Emergency Response) to reduce and prevent fatalities and serious injuries on all roads.*

---

## **Goal:**

*Reduce all crashes annually on our roadways.*

# LRSP Process Methodology

LRSPs are an [FHWA Proven Safety Countermeasures](#) and are developed using a collaborative six-step process (figure 4). The following sections describe each step. More detail can be found in later sections of the plan. The KMTPO LRSP builds upon past and ongoing safety activities and considers the unique needs and issues specific to the road system within the planning area limits and the users of these roadways. The LRSP aligns with the Tennessee and Virginia SHSPs and its goals and strategies to eliminate traffic fatalities and serious injuries. This is supported by adopting the principles and elements of the Safe System Approach. Implementation is key and has been kept in the forefront during the LRSP development process.




Figure 4. Graphic. LRSP development process (Source: FHWA).

## Establish Leadership

The KMTPO LRSP leadership team, comprised of representatives from regional and local agencies in the region, has a key role in the development and implementation of safety projects, programs, and policies. The leadership team is ultimately responsible for developing, adopting, and implementing the LRSP. The KMTPO engaged multi-disciplinary safety stakeholders representing 4Es: engineering, enforcement, education, and emergency response through a series of workshops to provide input into the development of the LRSP. These partnerships and collaborative efforts recognize a shared responsibility to eliminate fatal and serious injury crashes and provide the opportunity to share knowledge, leverage resources, and maximize implementation of the LRSP. An initial kickoff meeting was held to identify additional stakeholders and sources of data.

## Analyze Safety Data

Analyzing safety data (e.g., crash, traffic, roadway data) identifies crash trends, high-risk factors, and those locations and infrastructure characteristics with a higher concentration of fatal and serious injury crashes. Tennessee Department of Transportation (TDOT), Virginia Department of Transportation (VDOT), and KMTPO provided safety data for the local roadways within the limits of the metropolitan planning area for the five-year period of 2016 to 2020. The safety analysis for the LRSP considered the over-representation of major crash types and their relationship between each other. This guided the selection of LRSP emphasis areas. Crash tree analysis helped to identify key combinations of factors that contribute to predominant crash types. This is especially



beneficial to systemically address locations where crashes have not yet occurred. An assessment of crashes and key corridors identified a High Injury Network (HIN) where most fatal and serious injury crashes occur. An overlay of the HIN with equity area maps for equity demographic indices showed a strong correlation between the HIN and equity areas of concentration. Performing safety field reviews helped to identify additional features that may contribute to crashes and safety countermeasures that are typically present to mitigate crashes. Ultimately, the analysis results and safety field review guided the selection of the emphasis areas and strategies and identification of potential projects.

## Determine Emphasis Areas


Emphasis areas in a LRSP enable the safety stakeholders to better focus available resources. The Tennessee SHSP contains six emphasis areas and the Virginia SHSP 13 emphasis areas selected based on analysis results for the period of 2013-2017 and 2016-2020, respectively. The safety stakeholders considered these SHSP emphasis areas and the corresponding data analysis results for the roads within the limits of the Kingsport metropolitan planning area for 2016 to 2020. They selected the following seven emphasis areas for the KMTPO LRSP.

- Lane Departure.
- Distracted Driving.
- Impaired Drivers.
- Speed.
- Intersections.
- Young Drivers.
- Unrestrained Occupants.

Although crashes involving non-motorized users and older drivers are not included as emphasis areas in the LRSP, strategies related to these users are integrated into the other emphasis areas. The five Safe System elements serve as “pillars,” and each emphasis area aligns with the appropriate Safe System element.

## Identify Strategies

The LRSP identifies strategies and action items that support the appropriate Safe System element and align with each of the seven emphasis areas. This allows for the strategies to take all road users and modes of transportation into account, while also ensuring that multiple emphasis areas can be addressed simultaneously. It also makes it easier for the various stakeholders to strategize and implement the KMTPO LRSP. Based on local knowledge and potential policy changes, the stakeholders considered the data analysis results, potential to address identified safety issues, different types of road users, equity, and how to ensure the strategies are actionable when identifying multi-disciplinary countermeasures for inclusion in the LRSP. Many of the action items are identified in the Tennessee and Virginia SHSPs as well as the behavioral-related Highway



Safety Plans for each State and are considered as effective countermeasures by FHWA and National Highway Transportation Safety Administration (NHTSA).

## Prioritize and Incorporate Strategies


The stakeholders considered each strategy and action item as well as the feasibility of implementation during the process to prioritize them. The cost and availability of resources as well as the ease of implementation or how a strategy could influence implementation of other strategies were factors that influenced the prioritization. Each action item is listed in priority order and includes the lead agency and partners, application method (e.g., regionwide), priority ranking, effectiveness, level of resources required (e.g., low, medium, or high), and an implementation time frame. Short-term actions are anticipated to be implemented within 3 years; medium-term actions can be implemented within 3 to 10 years; and long-term actions can be implemented within 15 years. Some actions are considered ongoing.

## Evaluate and Update

System managers (engineers, planners, designers, builders, operators, and maintenance workers), law enforcement, post-crash personnel, system users and other stakeholders all have a shared responsibility to reduce traffic fatalities and serious injuries on the roadway system within the Kingsport metropolitan planning area. It is essential that this LRSP moves beyond a planning document. Implementation of the identified strategies and action items by the various stakeholders is key to achieving the goal set forth in this LRSP. The benefit of the alignment of the LRSP with the SHSPs in both States is that it leverages existing funding sources to support LRSP implementation. These include State funds from TDOT and VDOT as well as federal funding from sources such as the Highway Safety Improvement Program (HSIP) and Highway Safety Plan (HSP) administered by FHWA and NHTSA, respectively. In addition, the Bipartisan Infrastructure Law (BIL) establishes the new [Safe Streets and Roads for All \(SS4A\) Grant Program](#) which may support implementation of the LRSP. This new discretionary program provides \$5-6 billion over the next five years of funding to support regional, local, and Tribal initiatives through grants to prevent roadway deaths and serious injuries.

The LRSP is a living document that should be evaluated and updated periodically. Tracking the allocation of resources, positive changes in user behavior, and the reduction in crashes as the various strategies and action items are implemented can be the mechanism with which the KMTPO and its safety stakeholders evaluate the effectiveness of the LRSP implementation. This also will assist the KMTPO and its stakeholders to identify new action items or those that should be expanded, determine necessary resources for implementation, and pursue grant opportunities.

Based on the five-year update cycle required for state SHSPs, it is anticipated that the Tennessee SHSP would be updated for 2025 and the Virginia SHSP for 2027. It is important that the KMTPO LRSP continue to align with the SHSPs to leverage safety resources. The KMTPO will update the LRSP in conjunction with priorities identified with each update of the State SHSPs. KMTPO will



also align the timing of the update of the LRSP with that of the KMTPO Long-Range Transportation Plan (LRTP). Aligning the timing provides an opportunity to integrate LRSP strategies and action items into LRTP projects, ultimately advancing the implementation of the LRSP. The Local Technical Assistance Programs (LTAP) programs in each State is a potential resource for assisting with the implementation, evaluation, and update of the LRSP.



# Existing Efforts

The project team reviewed several resources developed by regional and State agencies as background research for this LRSP. These resources included the 2020-2024 Tennessee SHSP, the 2022-2026 Virginia SHSP, the 2020 Tennessee and Virginia HSIP annual reports, the State of Tennessee, and Virginia Highway Safety Plans for fiscal year 2021, the KMTPO Transportation Improvement Plan for 2020-2023, and the draft 2045 KMTPO LRTP.

The five-year Tennessee SHSP was released in 2020 and was developed based on input from numerous agencies and multi-disciplinary stakeholders. This document is an important resource for the development and implementation of the LRSP as it can inform potential strategies and actions for local adoption.

The Tennessee SHSP outlines six emphasis areas (EAs):

- Data Collection and Analysis
- Driver Behavior
- Infrastructure Improvements
- Vulnerable Road users
- Operational Improvements
- Motor Carrier Safety

The Virginia SHSP was released in 2022 and identified the following emphasis areas for implementation between 2022 and 2026 and grouped by Safe System elements

- Safe Road Users – Pedestrians & Bicyclists, Young Drivers, Aging Road Users, Occupant Protection, Impaired Driving, Motorcyclists
- Safe Vehicles – Heavy Vehicles, Connected & Automated Vehicles
- Safe Speeds – Speeding
- Safe Roads – Roadway Departure, Intersections
- Post-Crash Care – Emergency Response & Medical Services
- Supporting – Data & Analytics

The Tennessee HSIP Annual Report in 2020 identified the types of projects the State would like to allocate funds toward, including:

- Roadway Safety Audits (RSA)
- Local Road Safety Initiative
- Wrong Way Safety Initiative
- Ramp Queue Program
- Pedestrian Road Safety Initiative
- Spot Safety Program
- Cable Median Barrier
- Curb Ramps

- Roadway Resurfacing

Understanding that these programs are a State priority helps KMTPO stakeholders prioritize their projects toward these types of programs.

The Highway Safety Plans (HSP)<sup>1213</sup> developed by each State to identify behavioral safety grants suggests a strong opportunity for the KMTPO LRSP that can effectively contribute to the reduction of fatalities within the region. The HSP indicates safety initiatives that target impaired driving, occupant protection, and speed.

KMTPO adopted the 2045 Long Range Transportation Plan in May 2022. In its development process, KMTPO continued the goals described in the 2040 edition of the plan which revolve around Livability, Sustainability, and Prosperity. In the 2045 update, there are new statements to advance viable and affordable public transportation and mobility options, support equitable transportation investments and policies, and support multimodal investments, especially bicycle and pedestrian enhancements.

---

<sup>12</sup> Tennessee HSP: [https://tntrafficsafety.org/sites/default/files/tn\\_hsp\\_ffy\\_2021\\_-\\_amended.pdf](https://tntrafficsafety.org/sites/default/files/tn_hsp_ffy_2021_-_amended.pdf)

<sup>13</sup> Virginia HSP: [https://www.dmv.virginia.gov/safety/highway\\_safety\\_plan.pdf](https://www.dmv.virginia.gov/safety/highway_safety_plan.pdf)



# Data Analysis

The data analysis used statewide crash data from the Tennessee Department of Transportation (TDOT), as well as crash data in Scott County, Virginia from the Virginia Department of Transportation (VDOT). The severity of crashes is based on the KABCO scale which corresponds to the severity of the injuries as assessed by law enforcement officer responding to the crash scene. A crash with a fatality is coded as "K"; suspected serious injury as "A"; suspected minor injury as "B"; possible injury as "C", and property damage only as "O". Analysis results for the five-year period of 2016 to 2020 indicate that a total of 19,048 reported crashes occurred on roads within the limits of the Kingsport metropolitan region planning area. Of these crashes, 581 involved a fatality or serious injury.

Safety data analysis identifies trends and proportions in the types of crashes, risk factors, and locations with higher proportion of fatal and serious injury crashes. The objective of the analysis is to identify road safety priorities, emphasis areas, strategies, and action items that can be implemented by the various stakeholders. The analyses used crash trees to identify factors for the systemic application of safety countermeasures. Crash maps assisted with identifying corridors with higher concentration of fatal and serious injury crashes. Mapping of the equity areas allowed for a comparison with these corridors. A safety field review supplemented the results of the analysis and supported systemic application of specific strategies and action items.

## Emphasis Area Analysis

The data analysis considered the over-representation of major crash types and their relationship between each other to guide the selection of the LRSP emphasis areas. The emphasis areas identified in the Tennessee and Virginia SHSPs serve as a starting point for the analysis. This ensures that the LRSP aligns with the SHSPs while also addressing the safety needs on the local roads within the Kingsport metropolitan region. The analysis period for the KMTPO LRSP is 2016 to 2020. This emphasis area share of all fatalities and serious injuries in the Kingsport region are compared against the share at the State level as published in the State SHSPs. While the Virginia 2022-2026 SHSP uses the same analysis period of 2016-2020, the Tennessee 2020-2024 SHSP uses the period of 2013 to 2017. The offset of the data analysis period does not significantly hinder the comparison of the statewide fatality and serious injury numbers with the values for the Kingsport metropolitan region as the comparison is with the percentages of overall KA fatalities and serious injuries.

Table 1 shows distribution of crashes and injuries that have occurred on the roads within the limits of the Kingsport metropolitan region planning area considering the emphasis areas in the SHSPs of both States. This table shows that roadway departure and intersection are significant factors for fatalities and serious injuries in the Kingsport region, both involved in at least 40 percent of those killed or seriously injured.

Table 1. KMTPO emphasis area share of fatalities and serious injuries compared to State share (Source: TDOT and VDOT, 2022).

Emphasis Area / Crash Attribute	Percent of KMTPO KA Persons (581)	Percent of Tennessee Statewide KA Persons (2013-2017)	Percent of Virginia Statewide KA Persons (2016-2020)
Roadway Departure	41.3	48.7	40.0
Intersection	40.0	30.9	35.1
Speeding	8.4	10.3	32.7
Occupant Protection	19.8	17.9	19.8
Impaired Driving	10.9	13.5	36.6 (includes distraction)
Distracted Driving	7.0	12.5	See above
Young (<20) Drivers	13.4	14.9	15.9
Older Drivers	27.3	17.6	18.5
Pedestrians	3.8	4.7	6.6
Bicyclists	0.5	0.9	0.2
Motorcycles	13.3	10.0	8.3

Intersection fatalities and serious injuries are notably higher than the average for both States, likewise, occupant protection, older drivers, and motorcycles are also above State averages. Pedestrians and bicyclists make up a small share of fatalities and serious injuries in the region and is generally below the State average.

The emphasis area matrix shown in table 2 illustrates the relationship between the stakeholder selected LRSP emphasis areas. This relationship allows stakeholders to leverage resources and address multiple emphasis areas simultaneously. The matrix is read by selecting the primary emphasis area on the left column and then reading across the row to determine that portion of fatal and serious injuries associated with the other emphasis areas.

Table 2. KMTPO LRSP emphasis area matrix, number of KA crashes 2016 to 2020 (Source: TDOT and VDOT, 2022).

	Roadway Departure	Intersection	Speeding	Unbelted	Impaired Driving	Distracted Driving	Young (<20) Drivers
Roadway Departure		18%	10%*	29%	15%	5%*	13%
Intersection	18%		4%	15%	8%	7%	15%
Speeding	53%	22%		24%	9%	16%	27%
Unbelted	62%	32%	10%		17%	5%	14%
Impaired Driving	57%	31%	7%	30%		15%	7%
Distracted Driving	30%	38%	18%	13%	23%		10%
Young (<20) Drivers	40%	45%	16%	20%	5%	5%	

\*underreported due to both crash factors being reported within the same field

The LRSP emphasis areas for distracted driving, roadway departure, impaired driving, and speeding are closely related. Strategies and action items consider this relationship. When looking at each of the emphasis areas individually, the distracted driving emphasis has a close

relationship with impaired drivers which represents 23 percent of the fatalities and serious injuries, while only 10 percent involve younger drivers. For the roadway departure emphasis area, crashes involving unbelted occupants represent 29 percent of the fatalities and serious injuries. Similarly, the impaired driving emphasis area more correlates to unbelted occupants (30 percent) and roadway departure (57 percent).

## High Injury Network (HIN)


The High Injury Network (HIN) are those roadways that have a higher concentration of fatal and serious injury crashes. The HIN for the Kingsport metropolitan region represents 185 miles of roads as shown in figure 5, or almost 14 percent of the mileage of roads in the region. This represents 71 percent (334) of the fatal and serious injury (KA). Table 3 lists a subset of the HIN corridors (those with at least 3 percent of the region's KA crashes) and the percentage of KA crashes on the corridor segment.

*Table 3. Priority High Injury Network (HIN) corridors (Source: TDOT and VDOT, 2022).*

HIN Corridor	Length in Miles	K Crashes	A Crashes	Percent of Region's KA Crashes
<b>Interstate 81</b>	18.4	11	20	9.3
<b>TN-1/East Stone Drive</b>	8.8	6	34	12.0
<b>TN-36/Fort Henry Drive</b>	8.9	4	23	8.1
<b>Interstate 26 / James H. Quillen Parkway</b>	8.3	6	16	6.6
<b>TN-93/John B. Dennis Highway</b>	7.6	1	13	4.2
<b>TN-126/Memorial Boulevard</b>	7.0	2	9	3.3
<b>US-11W/TN-1</b>	14.2	10	13	6.9
<b>US-23 (Virginia)</b>	10.9	2	24	7.8

The top HIN are primarily Interstate and Principal Arterials. East Stone Drive/US-11W/TN-1 has the highest concentration of fatal and serious injury (KA) crashes (12 percent), and Interstate 81 has the second highest at 9.3 percent of KA crashes.

Whereas the State and Interstate routes show high numbers of fatal and serious injuries, the LRSP will also focus on addressing crashes on the local roads. The LRSP study team originally focused the plan on the non-State maintained roadway network and developed a HIN that excluded the State-maintained roads. However, the larger share of crashes on the State-maintained road network in the region and how these had the greatest influence on the region's road safety targets, led stakeholders to focus this LRSP on all roads in the region. In the local road analysis for the same study period between 2016-2020, Mill Creek Road, Carters Valley Road, East Carters Valley Road, North Eastman Road, and Bloomingdale Pike had the highest share of fatal and serious injury crashes. However, the number of crashes on these routes is smaller than the State routes shown in table 3.

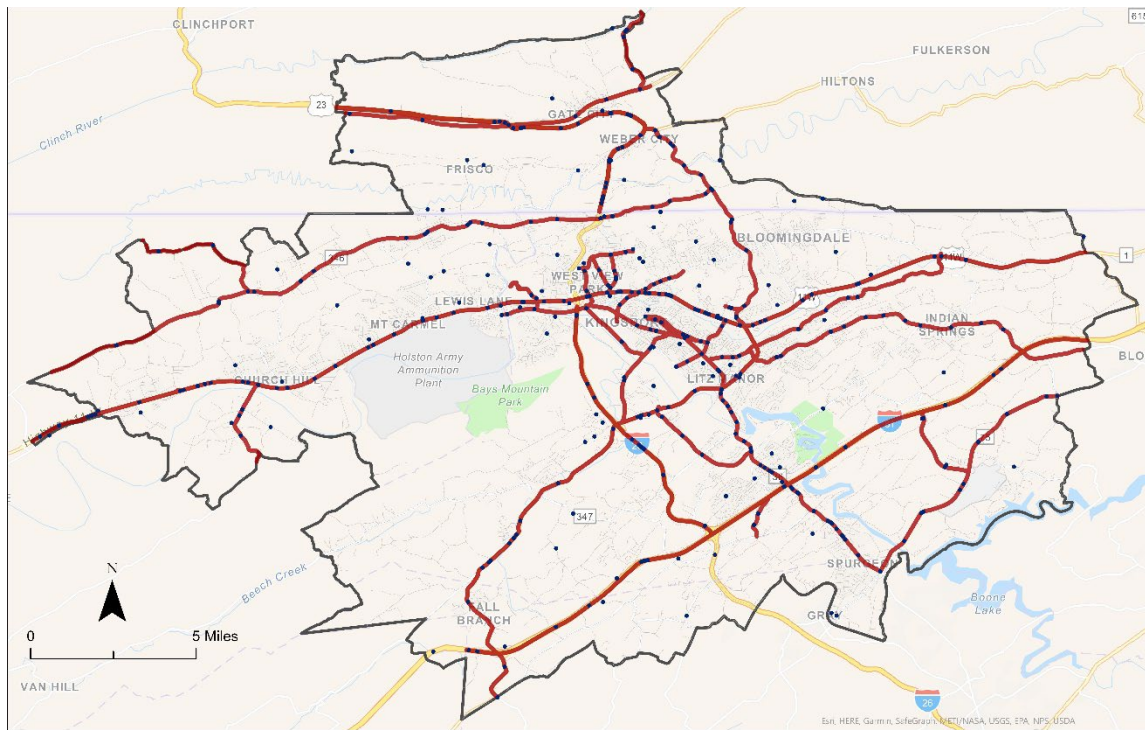


A safety field review of the top HIN provided insight into risk factors and potential safety strategies that can be implemented systemically to address safety of all users and the various facilities. Consistently, the operating speed was higher than the posted speed limit. This higher operating speed combined with factors such as distracted driving or impaired driving results in a higher potential for fatal and serious injury crashes. Use of radar speed indicator signs will increase motorist awareness and possible compliance of posted speed limits, especially when combined with enforcement. East Stone Drive/US-11W/TN-1, with its high density of driveways presents an access management challenge.

Intersections across the system do not consistently have high retro-reflectivity backplates on signals, enhanced high visibility crosswalks, stop bars, and intersection and pedestrian ahead signage. These are essential to increasing the visibility of the intersection as well as the driver expectation for pedestrians, and ultimately will result in reduced fatalities and serious injuries involving intersections and pedestrians. In addition, safe accommodations for disabled users are necessary.

Improved delineation of bicycle lanes, new and old, as well as separation of bicycle lanes from the vehicle travel lane, especially on higher speed principal arterials would enhance the safety of these system users. In addition, improved connectivity of bicycle accommodations across the network provides a proactive approach to improving safety, especially as growth occurs in the region.

Consistent application of chevrons and advance warning signs on the Interstate and rural two-lane roads can proactively address roadway departure, especially with the winding roads and undulating topography of the region.



- KA crashes
- High Injury Network
- Roads

Figure 5. Graphic. Kingsport metropolitan region High Injury Network (Source: TDOT and VDOT, 2022).

## Equity Analysis

As part of KMTPO's efforts to provide equitable investments in transportation, the LRSP included analyses of the overlap between transportation safety and equity. This includes the use of EJScreen, developed by the Environmental Protection Agency, which is an environmental justice mapping and screening tool that provides a nationally consistent dataset and approach for combining environmental and demographic indicators. EJScreen uses census block group data for its screen and reports indicator data by percentile, or the percent of population that exhibit a specified indicator. Of note, a Demographic Index that is based on the average of two demographic indicators; low-income and people of color, is used for this LRSP. Figure 6 shows that superimposing the HIN on the Demographic Index allows for comparison of block groups that have a high index value, particularly a high percentage of low-income residents and/or people of color, with the HIN. Several of the roadways identified as HIN are located within the higher concentrated areas of these key census block groups, particularly in the center portions of the City of Kingsport. Addressing safety on these corridors can simultaneously address these typical underserved populations and communities.

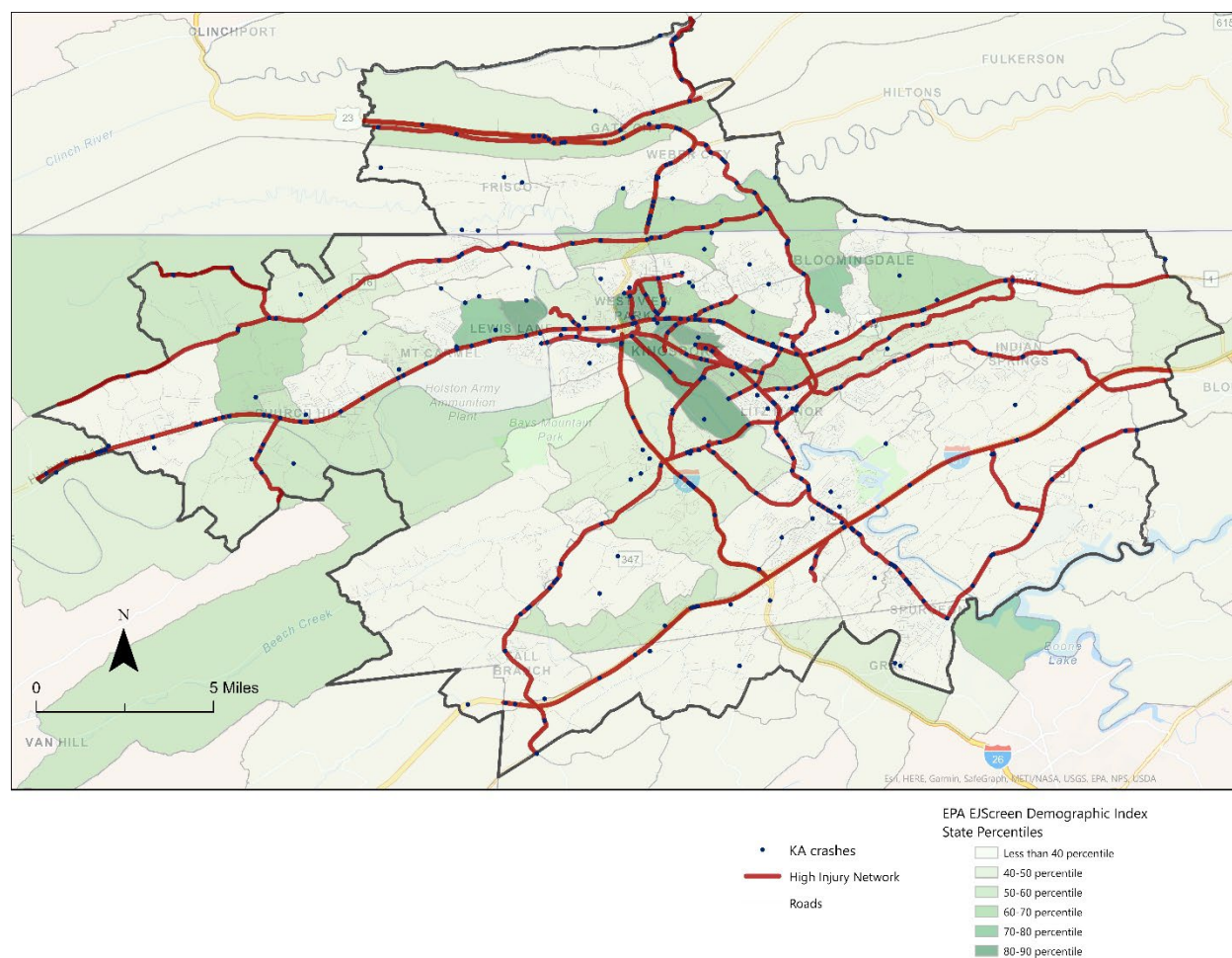


Figure 6. Graphic. Demographic index analysis and KMTPO High Injury Network (Source: TDOT, VDOT, EPA, 2022).



## Systemic Analysis

Crashes are random in nature. A system-based approach looks beyond crashes at a specific location and evaluates risk across an entire roadway system, and proactively treats locations where crashes have not yet occurred. Systemic safety analysis evaluates crash data to identify key combinations of factors that contribute to predominant crash types and guides the selection and systemic implementation of low-cost proven safety countermeasures. This proactive technique complements traditional site-specific analysis and supports the Safe System principle that safety is proactive.

The systemic safety analysis developed crash trees (See Appendix) for each of the LRSP emphasis areas to evaluate the roadways within the limits of the Kingsport metropolitan region. Crash tree diagrams can be used as part of the systemic safety analysis process to help identify and select the facility types or combination of crash factors that are present in most crashes. A safety field review supplemented the systemic and HIN analysis to identify risk factors that may contribute to the potential for fatal and serious injury crashes. The discussion below presents the key findings from the crash tree diagrams.

Roadway departure crashes occur after a vehicle crosses an edge line or a center line, or otherwise leaves the traveled way. The roadway departure crash tree indicates that the largest number of roadway departure injury crashes are on two lane roads in the region, with trees and embankments a common factor in these crashes. Chevrons, advanced signing, and higher visibility pavement markings are countermeasures that help keep motorists in their lane of travel, especially at night.

Distracted driving is any activity that diverts attention from driving, including talking or texting on your phone, eating and drinking, talking to people in your vehicle, fiddling with the stereo, entertainment, or navigation system — anything that takes the driver's attention away from the task of safe driving. The distracted driving crash tree indicates most of these crashes involve more than one vehicle. The safety field review, which includes routes such as East Stone Drive, observed some motorists driving faster than the posted speed limit. Speeding reduces the ability for motorists to react quickly to avoid a crash, especially when distracted.

Most fatal and injury crashes involving young drivers occur during daylight conditions and many result in rear-end impact. Three primary factors for these crashes are following too closely, failure to yield the right of way, and driver inattention. Mapping of the younger driver fatal and serious injury crashes indicate a balance of both intersection-related and non-intersection related crashes. Improperly judging gaps in traffic for turning movements is a common contributing factor.

During the five-year analysis period, the highest number of fatal and serious injury crashes occurred between June and September. Most of the crashes occurred during the typical working hours of 7 am to 7 pm with most of these crashes occurring between 3 pm and 7 pm. This can guide targeted enforcement efforts.

# Emphasis Areas

The KMTPO LRSP stakeholders identified seven emphasis areas to achieve significant reductions in traffic-related fatal and serious injury crashes and meet the safety goal of the LRSP. However, other emphasis areas will also be addressed based on the interrelationship of crash factors, contributing factors and recommended solutions that may benefit multiple emphasis areas.

The Emphasis Areas identified through the data analysis and confirmed by the stakeholders included:

***Roadway Departure***

***Intersections***

***Distracted Driving***

***Unrestrained Occupants***

***Impaired Drivers***

***Speed***

***Young Drivers***

Table 4 shows how each emphasis area can be grouped with the five Safe System elements. These groupings show which Safe System element has the greatest association with an emphasis area. However, this does not mean an emphasis area has no association with the other elements. The Action Tables section of this LRSP provides additional discussion about the relationship between emphasis areas and the Safe System elements.

*Table 4. KMTPO LRSP emphasis areas by Safe System element.*

Safe Roads	Safe Road Users	Safe Speeds	Post Crash Care	Safe Vehicles
Roadway Departure	Distracted Driving	Speed	All	All
Intersections	Unrestrained Occupants			
	Impaired Drivers			
	Young Drivers			

The following pages describe each emphasis area in greater detail.

# Roadway Departure Crashes

Roadway departure crashes account for 41 percent of roadway fatalities and serious injuries in the region, which is the largest share of any emphasis area in this LRSP. Figure 7 shows there is a greater density of these crashes on the Interstate and on four-lane routes such as Fort Henry Drive/TN-36, US-11-W/TN-1, and US-23. However, it is notable that despite the clustering of these crashes on the four-lane routes, crashes on two-lane routes make up over half of the fatal and serious injury roadway departure crashes – these do not show up on the map as they are distributed throughout the region. This distribution suggests that roadway departure crashes would benefit from systemic improvements.

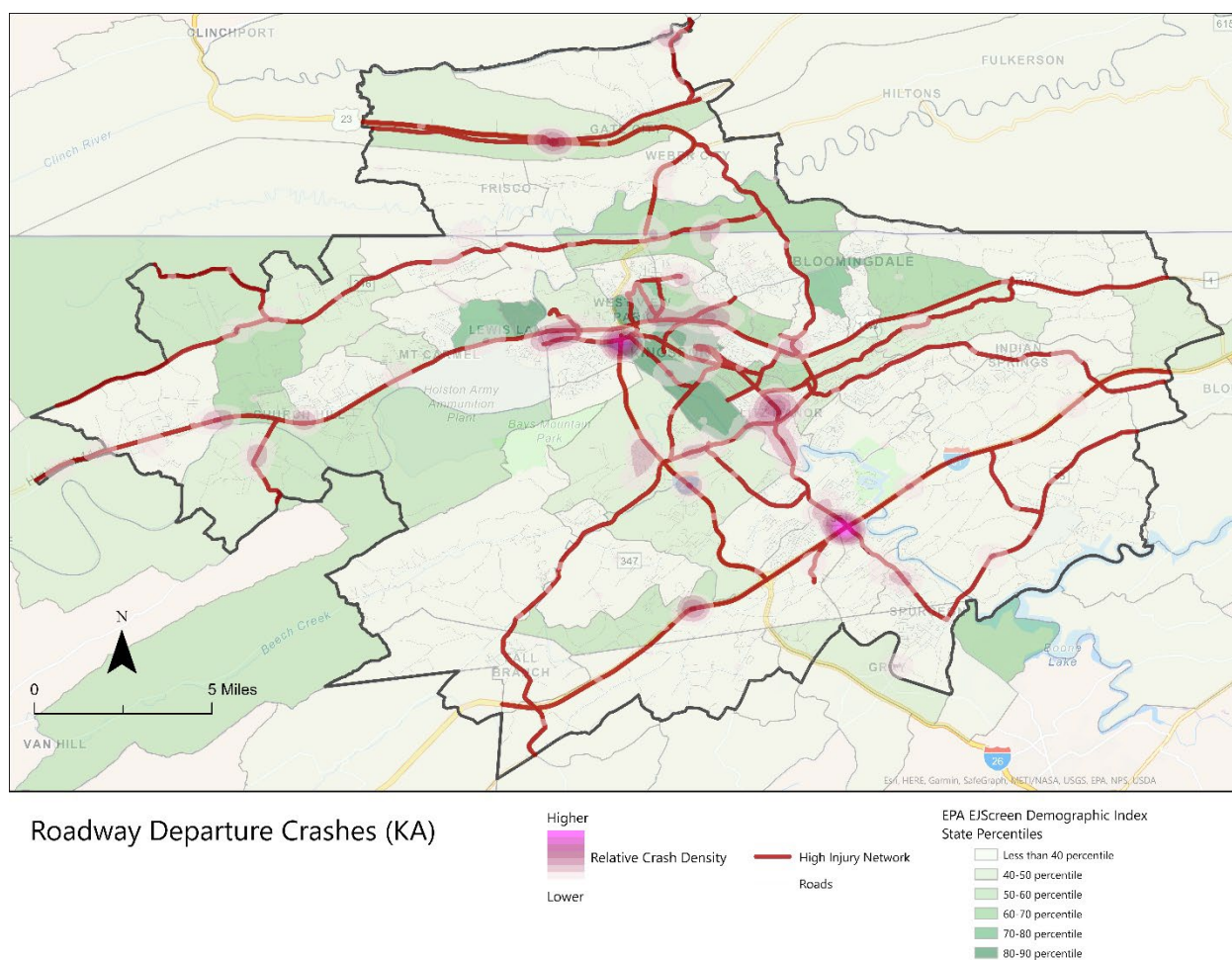


Figure 7. Graphic. High Injury Network with density of fatal and serious injury roadway departure crashes and demographic index screening (Source: TDOT, VDOT, and EPA, 2021).

# Intersection Crashes

Intersection crashes make up 40 percent of roadway fatalities and serious injuries in the region. As figure 8 shows, the greatest density of these crashes is located within or adjacent to the central urban core of the City of Kingsport, with notable clustering on East Stone Drive/US-11W/TN-1. The density of intersections is greater in the densely populated and built-up areas, leading to greater conflict between users of the road system. Over half of these intersection crashes are of the angle-type and occur mainly during daylight hours.

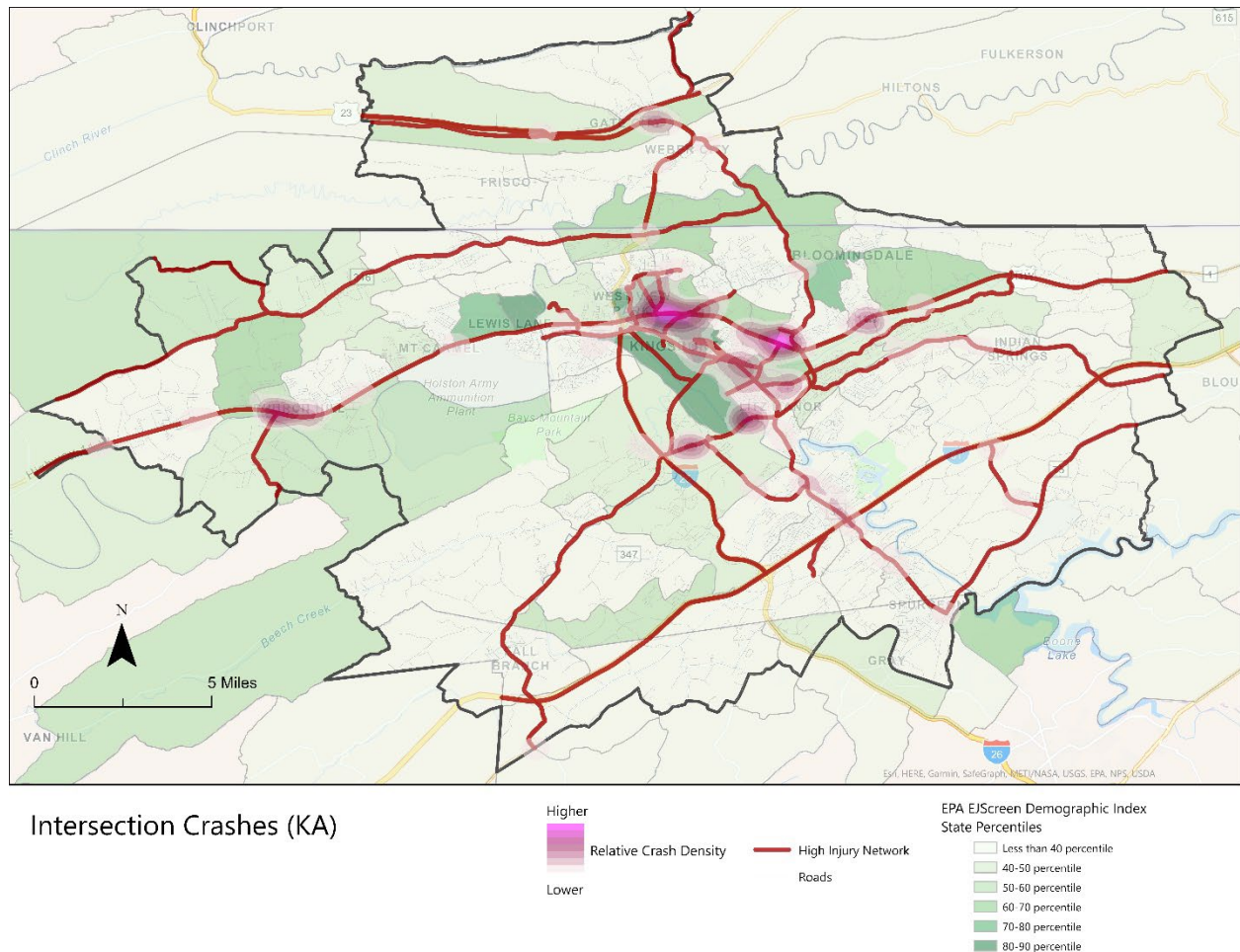


Figure 8. Graphic. High Injury Network with density of fatal and serious injury intersection crashes and demographic index screening (Source: TDOT, VDOT, and EPA, 2021).

## Distracted Driving Crashes

Distracted driving crashes account for 7 percent of all roadway fatalities and serious injuries in the region, however, this percentage may be undercounted due to the difficulty in determining distraction in a crash. Figure 9 shows that distracted crashes are distributed throughout the region.

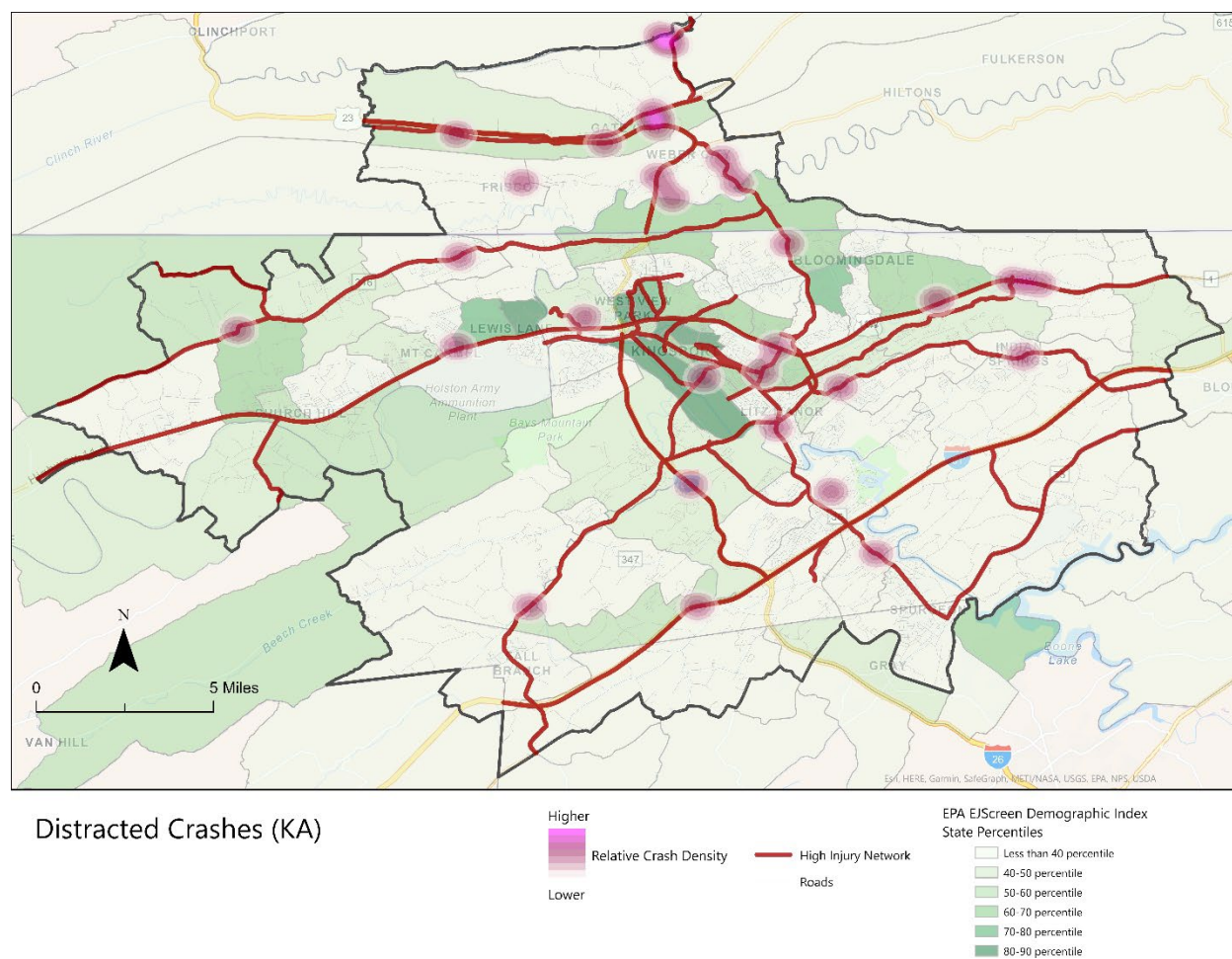


Figure 9. Graphic. High Injury Network with density of fatal and serious injury distracted driving crashes and demographic index screening (Source: TDOT, VDOT, and EPA, 2021).

# Unrestrained Occupant Crashes

Crashes involving unrestrained occupants account for almost 20 percent of all roadway fatalities and serious injuries in the region. Figure 10 shows that the largest share of these crashes occurs on principal arterials in the region, which includes routes such as East Stone Drive/US-11W/TN-1, US-11-W/TN-1, and John B. Dennis Highway/TN-93. These crashes are often associated with lane departure crashes, with almost two-thirds of unbelted occupant crashes also involving the vehicle leaving the travel lane.

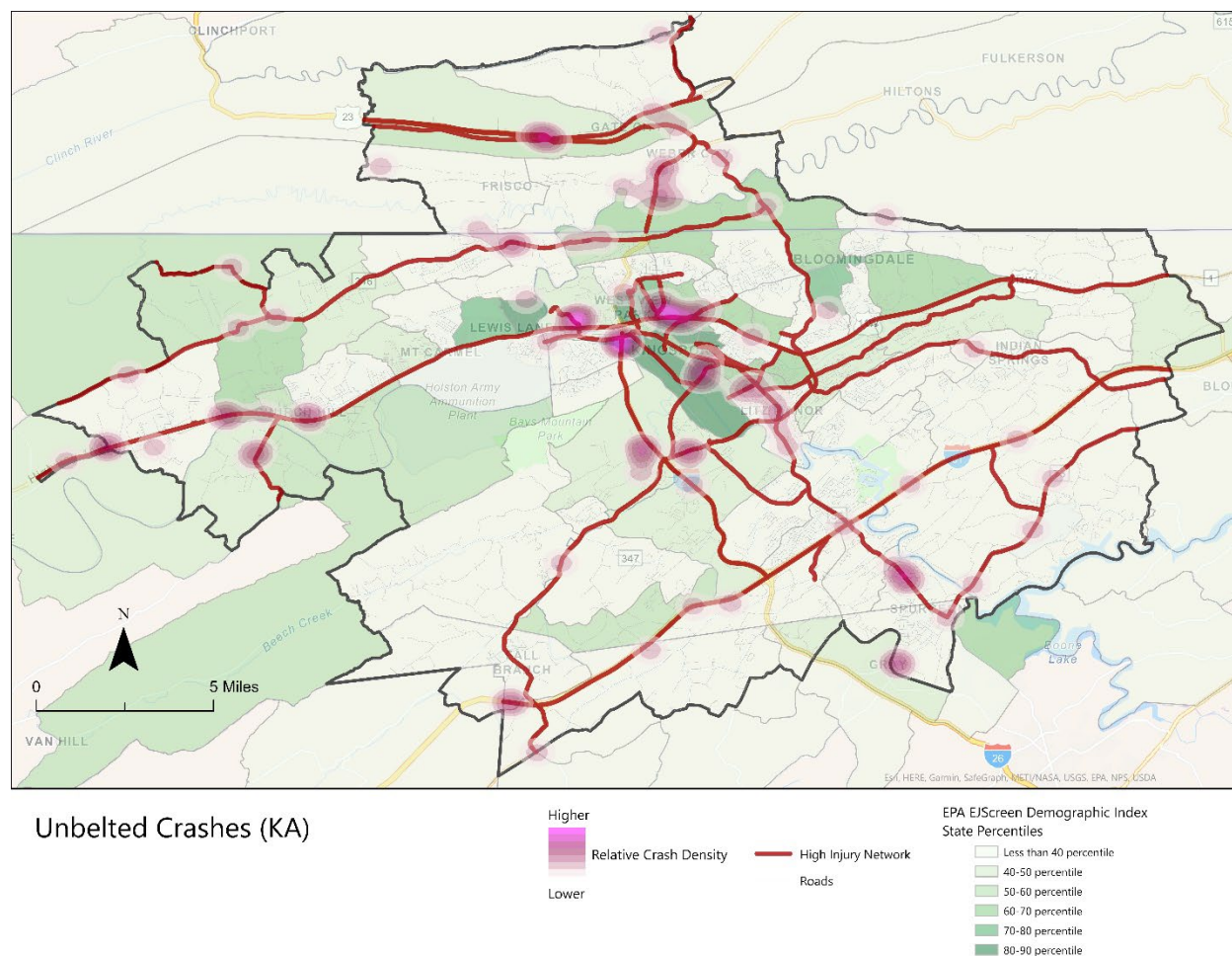


Figure 10. Graphic. High Injury Network with density of fatal and serious injury unrestrained occupant crashes and demographic index screening (Source: TDOT, VDOT, and EPA, 2021).

# Impaired Driver Crashes

Impaired driving is reported in just over 10 percent of roadway fatalities and serious injuries in the region. Figure 11 shows that these crashes are distributed across the region but there is some notable density on or near Fort Henry Drive/TN-36. Over half of these crashes involve roadway departure. Also, over half of reported impaired driving crashes, regardless of severity, occur on Friday, Saturday, or Sunday. These crashes also occur generally in the evening hours.

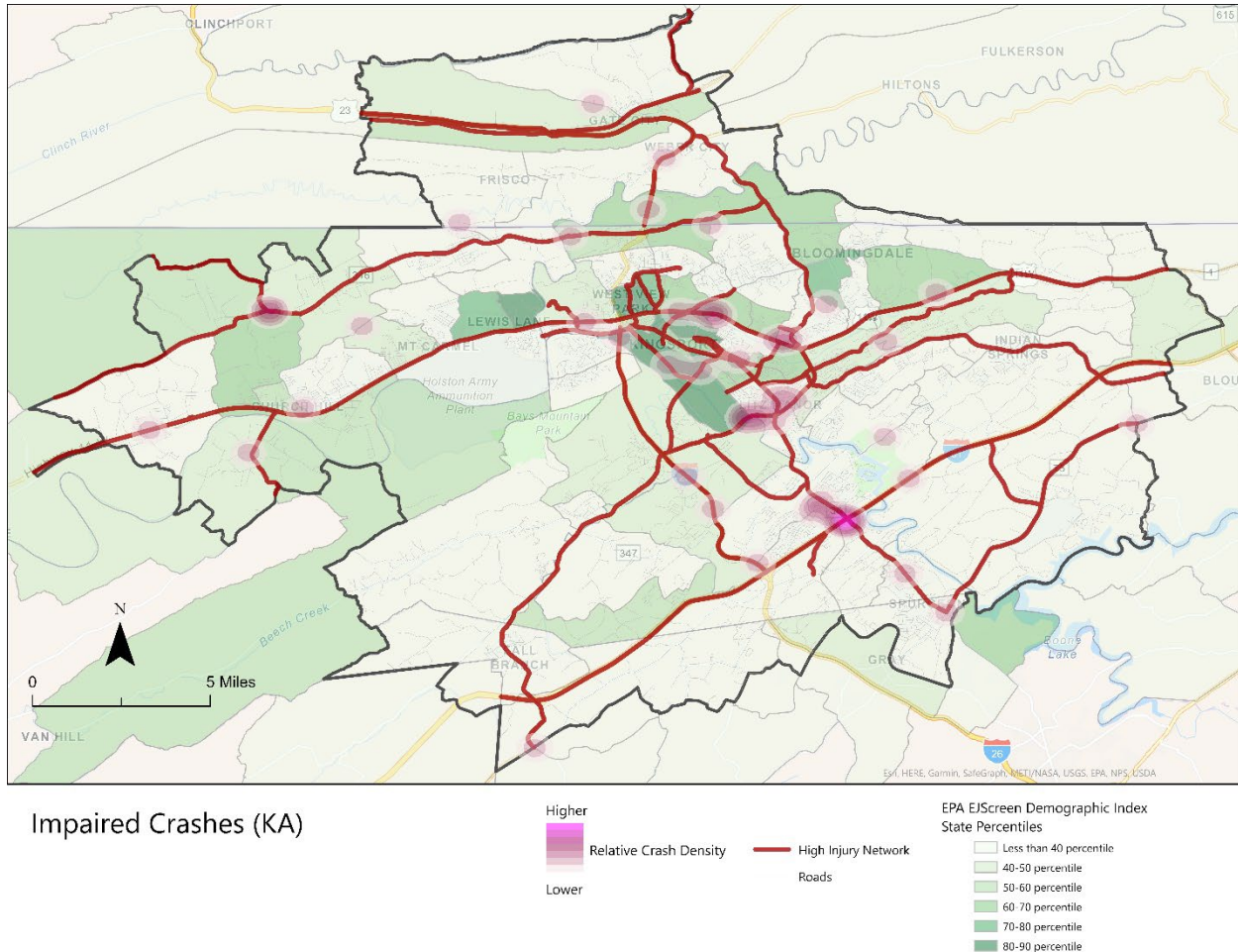


Figure 11. Graphic. High Injury Network with density of fatal and serious injury impaired driving crashes and demographic index screening (Source: TDOT, VDOT, and EPA, 2021).

## Speed-Related Crashes

Figure 12 shows the density of speed-related crashes overlaid on the high injury network. Speed-related crashes account for 8 percent of fatalities and serious injuries in the region, with over half of these involving roadway departure. In addition, over one-quarter of these crashes involve young drivers, aged less than 20 years old. When looking at speed-related crashes for all crash severities across the region, most of them occur on two-lane roads and on roads with a posted speed limit of 35, 40, or 45 miles per hour.

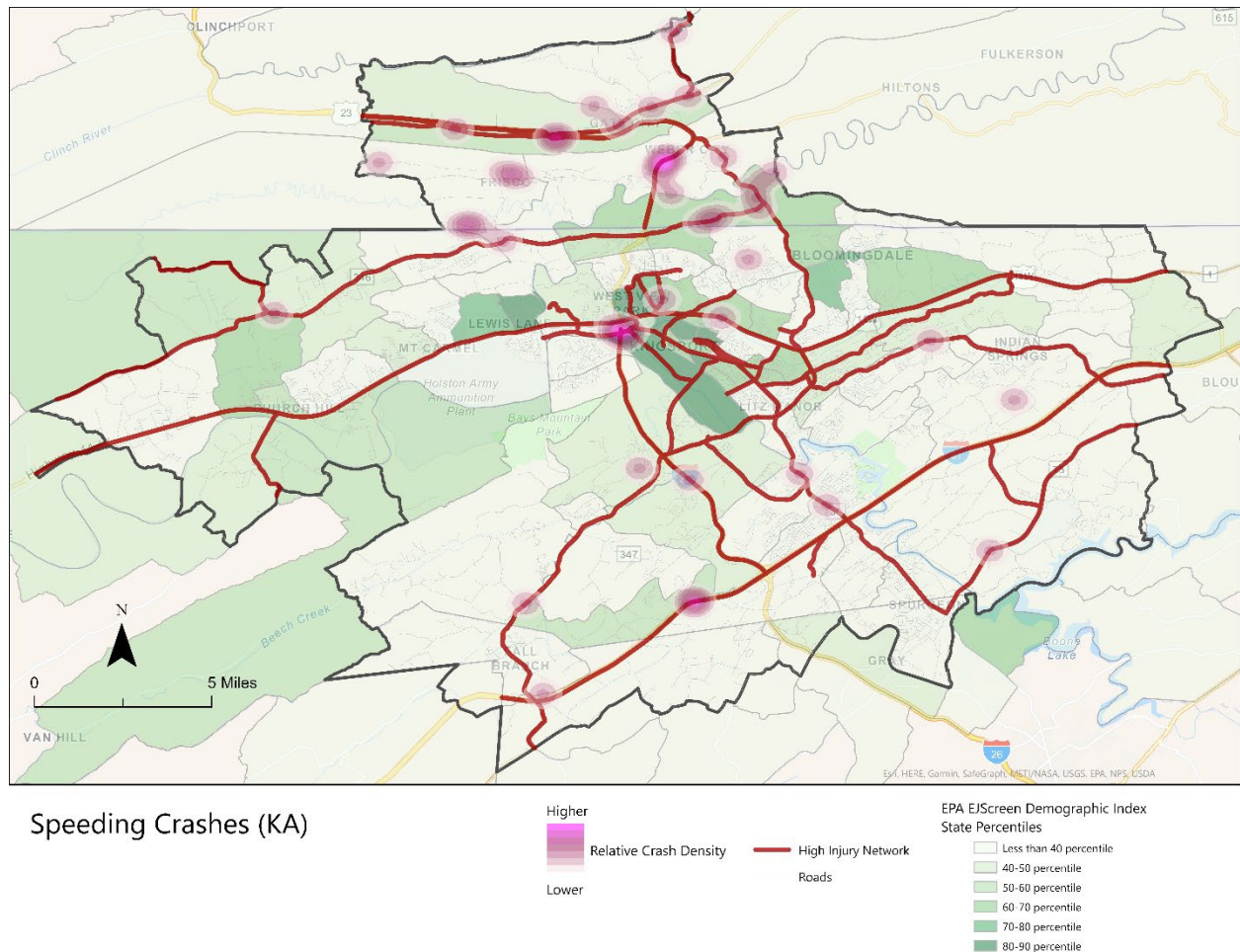


Figure 12. Graphic. High Injury Network with density of fatal and serious injury speed-related crashes and demographic index screening (Source: TDOT, VDOT, and EPA, 2021).

## Young Driver Crashes

Young Driver-involved crashes in the region account for 13 percent of all roadway fatalities and serious injuries. Figure 13 shows there is notable density of such crashes closer to the urban core of Kingsport, particularly on East Stone Drive/US-11W/TN-1. The data also shows that 40 percent of these crashes involve roadway departure and 45 percent are at intersections. When looking at young driver crashes for all crash severities, the intersection crashes are mostly angle and during daylight hours.

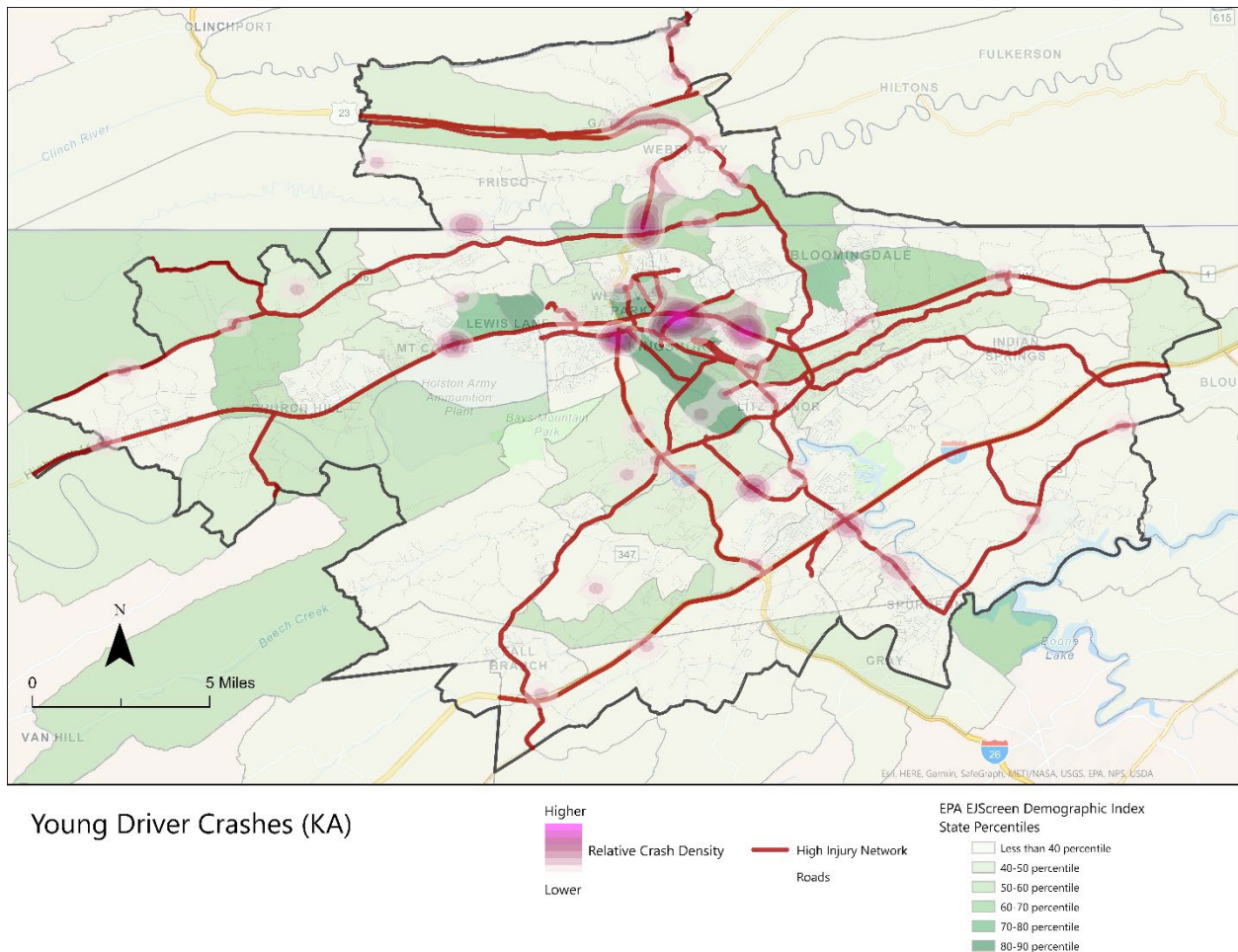


Figure 13. Graphic. High Injury Network with density of fatal and serious injury young driver crashes and demographic index screening (Source: TDOT, VDOT, and EPA, 2021).

The five elements of the Safe System Approach provide the framework into which each of these emphasis areas are integrated. The LRSP identifies strategies and action items for each Safe System element and emphasis area. Each action item includes the effectiveness (if available). The effectiveness of an engineering-related action item is measured by a crash modification factor (CMF) from the FHWA [Crash Modification Factors Clearinghouse](#).<sup>14</sup> Each CMF in the Clearinghouse is given a star rating to indicate the quality or confidence in the results of the study producing the CMF. NHTSA's publication [Countermeasures That Work: A Highway Safety Countermeasure Guide for State Highway Safety Offices](#)<sup>15</sup> contains star ratings to measure the effectiveness of behavior-related (education and enforcement) countermeasures that are used most regularly by State Highway Safety Offices.

*What is a crash modification factor (CMF)?*

*A CMF is an estimate of the change in crashes expected after implementation of a countermeasure. For example, an intersection is experiencing 100 angle crashes and 500 rear-end crashes per year. If you apply a countermeasure that has a CMF of 0.80 for angle crashes, then you can expect 80 angle crashes per year following the implementation of the countermeasure ( $100 \times 0.80 = 80$ ). If the same countermeasure also has a CMF of 1.10 for rear-end crashes, you will also expect 550 rear-end crashes per year following implementation ( $500 \times 1.10 = 550$ ).*

*(Source: FHWA CMF Clearinghouse)<sup>14</sup>*

**Behavior Countermeasure Star Ratings**

- ★★★★ or ★★★★★ Effective
  - ★★★ Promising, and Likely To Be Effective
  - ☆☆ Effectiveness Still Undetermined
  - ☆ Limited or No High-Quality Evaluation Evidence
- (Source: NHTSA Countermeasures That Work)<sup>15</sup>

<sup>14</sup> FHWA, Crash Modification Factor Clearinghouse, <http://www.cmfclearinghouse.org/>

<sup>15</sup> NHTSA, <https://www.ghsa.org/sites/default/files/2021-09/Countermeasures%20That%20Work%2C%2010th%20Edition.pdf>



# Action Tables

The KMTPO and its stakeholders evaluated the results of the data analysis and the safety concerns and priorities of the region, and using the Safe System Approach as the framework, established the strategies and action items represented in the LRSP. The strategies are organized by each Safe System element: Safe Roads, Safe Speeds, Safe Road Users, Safe Vehicles, and Post-crash Care. Each of these elements identifies LRSP emphasis areas, strategies, and action items which when implemented with leadership and partnership support and input will achieve the KMTPO LRSP safety goals. However, in a cost-constrained environment, not all actions are proposed to take place simultaneously. Therefore, these tables identify actions by short-term, medium-term, and long-term implementation time frames.

## Safe Speeds

The KMTPO LRSP data analysis and stakeholder input led to including speed as an emphasis area and this directly aligns with the Safe System element, Safe Speeds. Such crashes include those where the vehicle operator is driving too fast for conditions or exceeding the posted speed limit. As speeds increase, the risk of death and serious injury dramatically increase, especially when pedestrians and bicyclists are involved. Higher speeds require longer stopping distances and influence the ability of drivers to control their vehicle, quickly react and avoid a crash. Safe speeds increase the likelihood of an individual surviving a crash and can be accomplished through implementation of strategies such as speed management, enforcement, and outreach efforts. Designing roadways with all users in mind and establishing appropriate speed limits help reduce the speed of users. This is further enhanced using proper signing including radar speed feedback signs. These can be reinforced with enforcement and education campaigns.

## 1. Safe System Element: Safe Speeds

Strategy/Action	Lead Agency	Partners	Priority Location	Timeline	Crash Modification Factor/Star Rating	Emphasis Area	Source of Strategy or Comment from Workshops
<b>1. Conduct Speed Management</b>							
1.1 Set speed limits on new roadways based on roadway context and target speed.	Multi-Jurisdictional	KMTPO, TDOT, VDOT Bristol District	N/A	Short, Ongoing	N/A	Speed	<i>TN SHSP Operational Improvements 4.6, Driver Behavior 2.4; First Workshop (Variable Speed Limits)</i>
1.2 Re-evaluate speed limits on existing roadways and implement projects (e.g., gateway treatments, chicanes) to calm traffic.	Multi-Jurisdictional	KMTPO, TDOT, VDOT Bristol District	High Injury Network	Medium	N/A	Speed	<i>Second Workshop</i>
1.3 Implement Complete Streets and Road Diets to provide context-sensitive street design.	Multi-Jurisdictional	KMTPO, TDOT, VDOT Bristol District	High Injury Network; Equity Areas	Medium	0.53-0.81	Speed	<i>Kingsport LRTP; FHWA PSC (Road Diets); First Workshop (Kingsport has Complete Streets policy)</i>
1.4 Use radar speed feedback signs to notify drivers they are speeding based on the posted speed limits.	County Sheriffs, City Police	TDOT, VDOT Bristol District	High Injury Network	Short-Term	0.95	Speed	<i>First Workshop (Kingsport has speed feedback signs)</i>

Strategy/Action	Lead Agency	Partners	Priority Location	Timeline	Crash Modification Factor/Star Rating	Emphasis Area	Source of Strategy or Comment from Workshops
1.5 Implement traffic calming measures <sup>16</sup>	Multi-Jurisdictional	TDOT, VDOT Bristol District		Short-Term	Varies	Speed	<i>Second Workshop; FHWA PSC (Road Diets)</i>
1.6 Improve quality and availability of speed data collection	KMTPO	TDOT, VDOT Bristol District, TN LTAP		Medium	N/A	Speed	<i>Second Workshop (discussion)</i>
<b>2. Conduct Speed Enforcement</b>							
2.1 Conduct high visibility speed enforcement.	County Sheriffs, City Police	THP, VSP, LEL, THSO, VDMV	High Injury Network	Short-Term, Ongoing	★★	Speed	<i>TN SHSP Driver Behavior 2.1, Vulnerable Users 4.3, 6.1; NHTSA Countermeasures That Work</i>
<b>3. Conduct Outreach Efforts</b>							
3.1 Conduct educational campaigns in conjunction with enforcement efforts to reinforce safe speeds.	KMTPO	THSO, VDMV; School district competitions	Regionwide	Short	★★★	Speed	<i>NHTSA Countermeasures That Work</i>
3.2 Coordinate with high schools to deploy national speed awareness education campaigns	KMTPO	THSO, VDMV, School Boards	Regionwide	Short	★★★	Speed	<i>Second Workshop (discussion)</i>

<sup>16</sup> [https://safety.fhwa.dot.gov/ped\\_bike/univcourse/pdf/swless11.pdf](https://safety.fhwa.dot.gov/ped_bike/univcourse/pdf/swless11.pdf) and <https://www.ite.org/technical-resources/traffic-calming/traffic-calming-measures/>



## Safe Roads

The roadway is the platform in which users move across the system. The Safe System element, Safe Roads, considers the interaction of all users and incorporates engineering-related strategies during planning, design, construction, maintenance, and operations of the system to prevent crashes and manage impacts to keep kinetic energy at tolerable levels should a crash occur. The Kingsport metropolitan region has a limited infrastructure network to accommodate pedestrians and bicyclists. A field review of the HIN noted the need for pedestrian and bicycle facilities, improved connectivity of these facilities, and enhanced visibility of the existing traffic control devices and crosswalks at intersections across the network. Implementing strategies associated with these three key findings addresses crashes related to intersections, pedestrians, bicyclists, older drivers, and younger drivers. Enhanced delineation of curves on the road network can reduce roadway departure crashes.

## 2. Safe System Element: Safe Roads

Strategy/Action	Lead Agency	Partners	Priority Location	Timeline	Crash Modification Factor/Star Rating	Emphasis Area	Source of Strategy or Comment from Workshops
<b>1. Conduct Road Safety Audits</b>							
1.1. Conduct RSA on priority corridors.	Multi-Jurisdictional	TDOT, VDOT Bristol District, KMTPO, County Sheriffs, City Police LEL,	High Injury Network, Equity Areas	Medium	0.40-0.90	All	<i>TN SHSP Infrastructure 1.1, 2.1, 6.1; FHWA PSC (Road Safety Audits); First Workshop Discussion (TDOT has conducted them in the past)</i>
<b>2. Reduce Lane Departure Crashes</b>							
2.1. Install, enhance, or maintain center line and edge line markings on paved roadways.	Multi-Jurisdictional	TDOT, VDOT Bristol District, KMTPO	High Injury Network	Short	Edge lines: 0.63-0.78	Lane Departure	<i>FHWA PSC (Wider Edge Lines, Enhanced Delineation for Horizontal Curves, Longitudinal Rumble Strips and Stripes); First Workshop (not much shoulder or clear zone)</i>
2.2. Curve delineation using advance curve warning signs, chevrons, reflective strips on signposts, and pavement markings	Multi-Jurisdictional	TDOT, VDOT Bristol District, KMTPO	High Injury Network	Short	0.75-0.85	Lane Departure	<i>FHWA PSC (Enhanced Delineation for Horizontal Curves)</i>

Strategy/Action	Lead Agency	Partners	Priority Location	Timeline	Crash Modification Factor/Star Rating	Emphasis Area	Source of Strategy or Comment from Workshops
2.3. Install SafetyEdge <sup>SM</sup> to give drivers the opportunity to return to their travel lane while maintaining control of their vehicle.	Multi-Jurisdictional	TDOT, VDOT Bristol District, KMTPO	High Injury Network	Short	0.79-0.89	Lane Departure	FHWA PSC (SafetyEdge <sup>SM</sup> ); First Workshop (SafetyEdge <sup>SM</sup> discussion)
2.4. Widen shoulders	Multi-Jurisdictional	TDOT, VDOT Bristol District, KMTPO	High Injury Network	Medium	Varies	Lane Departure	First Workshop (recommended for some roads)
2.5. Install centerline and shoulder rumble strips	Multi-Jurisdictional	TDOT, VDOT Bristol District, KMTPO	High Injury Network	Short	Centerline: 0.46-0.56 Shoulder: 0.49-0.87	Lane Departure	FHWA PSC (Rumble Strips); First Workshop (recommended for some roads)
2.6. Improve clear zones	Multi-Jurisdictional	TDOT, VDOT Bristol District, KMTPO	High Injury Network	Medium	0.56-0.78	Lane Departure	First Workshop (recommended for some roads)
2.7. Implement high friction surface treatment	Multi-Jurisdictional	TDOT, VDOT Bristol District, KMTPO	High Injury Network	Medium	0.52	Lane Departure	Second Workshop (discussion); FHWA PSC (Pavement Friction Management)

### 3. Improve Intersection Safety

3.1. Systemic application of low-cost countermeasures (signing, delineation, and pavement markings) at stop-controlled intersections.	Multi-Jurisdictional	TDOT, VDOT Bristol District, KMTPO	High Injury Network	Short	0.73-0.95	Intersections	<i>FHWA PSC (Systemic Application of Multiple Low-Cost Countermeasures at Stop-Controlled Intersections); First Workshop (restriping of turn lanes)</i>
3.2. Verify Sight Triangles and eliminate obstructions	Multi-Jurisdictional	TDOT, VDOT Bristol District, KMTPO	High Injury Network	Short	N/A	Intersections	<i>TN SHSP Infrastructure 2.2; First Workshop (sight distance concerns)</i>
3.3. Implement Innovative Intersections (e.g., roundabouts, RCUT, Restricted Crossing U-Turn)	Multi-Jurisdictional	TDOT, VDOT Bristol District, KMTPO	Divided Highways (East Stone Drive, West Stone Drive)	Medium	Roundabout: 0.18-0.22 RCUT: 0.36-0.78	Intersections	<i>FHWA PSC (Reduce Left-Turn Conflict Intersections, Roundabouts)</i>
3.4. Manage Corridor Access	Local planners	TDOT, VDOT Bristol District, KMTPO	High Injury Network	Medium	0.69-0.75	Intersections	<i>FHWA PSC (Corridor Access Management); First Workshop (TDOT Access Management program)</i>



## Safe Road Users

This element addresses all users of all modes of travel. Their capabilities are influenced by factors such as age, level of impairment, and other behaviors. System owners and other stakeholders can use strategies such as signing, enforcement, and education campaigns to address these limitations and encourage behavior change.

### 3. Safe System Element: Safe Road Users

Strategy/Action	Lead Agency	Partners	Priority Location	Timeline	Crash Modification Factor/Star Rating	Emphasis Area	Source of Strategy or Comment from Workshops
<b>1. Coordinate efforts to address impairment, restraint use, distraction, and young drivers</b>							
1.1 Establish a safety working group which will focus on strategies to improve driving behavior.	KMTPO	TDOT, VDOT Bristol District, County Sheriffs, City Police	Regionwide	Short	N/A	All	<i>TN SHSP Implementation and Evaluation</i>
<b>2. Conduct community outreach to address impairment, restraint use, distraction, and young drivers</b>							
2.1 Host informational meetings and press events and provide editorials to local news to inform the public of the region's safety activities.	KMTPO	THSO, VDMV, School Districts	Regionwide	Short	★ ★ ★	All	<i>NHTSA Countermeasures That Work</i>
2.2 Highlight <i>Drive Safe Tennessee</i> and other similar campaigns on regional, county, city, and other stakeholders' websites.	KMTPO	County stakeholders, THSO, Law Enforcement Agencies	Regionwide	Short	★ ★ ★	Impaired Driving, Young Drivers, Occupant Protection, Distracted Driving, Speed	<i>NHTSA Countermeasures That Work</i>

Strategy/Action	Lead Agency	Partners	Priority Location	Timeline	Crash Modification Factor/Star Rating	Emphasis Area	Source of Strategy or Comment from Workshops
2.3 Use the distracted driving simulator, rollover convincer, and other exhibits at community events and high schools to demonstrate the impact of risky driver behavior.	TDOSHS	School districts, THSO, VDMV	Regionwide	Short	★ ★ ★	Young Drivers, Occupant Protection, Distracted Driving, Lane Departure	<i>TN SHSP Driver Behavior 1.6, 3.4, 4.1, 5.2; Infrastructure 4.2; First Workshop (public health and school districts have conducted campaigns, impairment goggles)</i>
2.4 Implement driver education programs to reduce aggressive and risky behavior by drivers.	TDOSHS, VDH	County Health Departments	Regionwide	Short	★	Impaired Driving, Speed, Occupant Protection, Distracted Driving	<i>TN SHSP Driver Behavior 1.6; First Workshop (Alive at 25 campaigns)</i>
2.5 Address youth alcohol and drug use and driving and restrict minor access to alcohol.	TDOSHS, VDH	County health departments	Regionwide	Short	★ ★ ★	Impaired Driving, Young Drivers	<i>TN SHSP Driver Behavior 1.7, 5.1</i>
2.6 Implement outreach campaigns that address non-motorized users of the transportation system about their conspicuity	KMTPO	THSO, VDMV	Regionwide	Short	★ ★ ★	All	<i>Second Workshop (discussion)</i>
<b>3 Enforce the Rules of the Road</b>							
3.1 Conduct High Visibility saturation patrols for impaired driving.	County Sheriffs, City Police	THP, VSP, LEL, THSO, VDMV	High Injury Network	Short	★ ★ ★ ★	Impaired Driving	<i>TN SHSP Driver Behavior 1.2; First Workshop (active with Click it or Ticket)</i>

Strategy/Action	Lead Agency	Partners	Priority Location	Timeline	Crash Modification Factor/Star Rating	Emphasis Area	Source of Strategy or Comment from Workshops
3.2 Perform integrated enforcement of impaired driving, speed, occupant protection, and distracted driving.	County Sheriffs, City Police	THP, VSP, LEL, THSO, VDMV	High Injury Network	Short	★ ★ ★	Impaired Driving, Speed, Occupant Protection, Distracted Driving	<i>TN SHSP Driver Behavior 1.2, 2.1, 3.3, 4.2; NHTSA Countermeasures That Work</i>
3.3 Engage LEL for training, grant assistance, and coordination of enforcement activities and initiatives.	County Sheriffs, City Police	THP, VSP, LEL, THSO, VDMV	Regionwide	Short	N/A	Impaired Driving, Young Drivers, Occupant Protection, Distracted Driving, Speed	<i>TN SHSP Driver Behavior 1.1, 3.6</i>
3.4 Participate in Comprehensive Alcohol Risk reDuction (CARD) enforcement projects. These are a combination of the Cops in Shops and the Party Patrol programs that allows for a greater number of patrols in a community and will increase the perception of risk. <sup>17</sup>	TDOSHS	Local law enforcement	Tennessee counties	Short	★ ★ ★	Impaired Driving	<i>TN SHSP Driver Behavior 5.3</i>

<sup>17</sup> <https://tntrafficsafety.org/applying-for-grants>



## Post-Crash Care

Post-crash care is one of the five Safe System elements and is critical to the survivability of a crash victim. The ability of emergency responders to quickly locate and respond to a crash and stabilize and transport an individual injured in a crash influences the chances of survivability. The crash location is a major factor related to the response time. The distance away from the necessary emergency care plays a significant role in whether an injured person survives a crash. For these reasons, accurate and complete data collection and sharing of the data is important to facilitate improved decision-making and investments specific to safety. Communication and collaboration between all stakeholders are necessary to improve post-crash care and reduce the potential of crashes resulting in fatalities and serious injuries.

## 4. Safe System Element: Post-Crash Care

Strategy/Action	Lead Agency	Partners	Priority Location	Timeline	Crash Modification Factor/Star Rating	Emphasis Area	Source of Strategy or Comment from Workshops
<b>1. Coordinate Post Crash Efforts</b>							
1.1. Establish an Incident Management Taskforce to coordinate with emergency response officials to determine and address roadway issues related to getting crash victims medical care as well as desired training	County EMS Departments	TDOT, VDOT Bristol District	Regionwide	Short	N/A	All	TDOT SHSP Operational Improvements 3.1, 3.2, 3.3; First Workshop (example Sullivan County FIRST team); Second Workshop (Incident management discussion)
1.2. Partner on providing quick clearance of incidents	County Sheriffs, City Police	TDOT, VDOT Bristol District	Regionwide	Short	N/A	All	TDOT SHSP Operational Improvements 2.1; First Workshop (example Sullivan County FIRST team)
1.3. Reinforce the Move Over Law through outreach campaigns	KMTPO	THP, VSP	Regionwide	Short	N/A	All	Second Workshop discussion



## Safe Vehicles

Safe vehicles incorporate new technology and other features to prevent crashes from occurring, and if they do, reduce the severity of a crash.

## 5. Safe System Element: Safe Vehicles

Strategy/Action	Lead Agency	Partners	Priority Location	Timeline	Crash Modification Factor/Star Rating	Emphasis Area	Source of Strategy or Comment from Workshops
<b>1. Coordinate efforts to address Safe Vehicles</b>							
1.1. Maintain and increase alternative transportation options in the region, especially in underserved communities	KMTPO	TDOT, VDOT Bristol District	Regionwide	Medium	★★★	All	KMTPO LRTP; First Workshop (Equity discussion); NHTSA Countermeasures That Work
1.2. Provide training on the safe operation of work vehicles to city and county employees.	Cities, Counties	All local jurisdictions	Regionwide	Medium	N/A	All	First Workshop (Public Works can set an example by not using phones or laptops while driving)
1.3. Implement Intelligent Transportation System infrastructure-related technologies to enhance vehicular safety and communication.	TDOT	KMTPO	Regionwide	Long	N/A	All	TDOT Kingsport Regional ITS Architecture and Deployment Plan 2017



# Implementation and Evaluation


The KMTPO LRSP builds on past and ongoing efforts, strengthens partnerships, and enhances the ability to leverage limited funds and resources. Moving the LRSP from planning to implementation is essential to reduce fatalities and serious injuries occurring in the region. This section provides a road map to guide implementation of the LRSP and evaluate success. It identifies potential funding sources and a detailed list of strategies and action items using the Safe System Approach as the framework.

A key benefit of the KMTPO LRSP is its alignment with the SHSPs for both Tennessee and Virginia. As TDOT and VDOT use the SHSP and its emphasis areas to guide its safety funding, the alignment of the KMTPO LRSP strategies and actions with State priorities enhances their eligibility for Federal and state safety funds. Federal funding from the HSIP to support infrastructure projects is predicated on this linkage to emphasis areas in the SHSP; therefore, the region's alignment with the State's safety efforts is critical. Accessing these Federal funds helps to supplement local funding for projects stemming from this LRSP. Additionally, Federal behavioral safety grant funding from NHTSA and managed in the highway safety office in each State is available on an annual basis.

Establishment of a Kingsport Regional Safety Committee provides a leadership group to facilitate LRSP implementation. Membership from the multi-disciplinary LRSP stakeholder group ensures a seamless transition to this new Safety Committee. Essential activities can include coordinating with the various existing committees, collaborating with key stakeholders, prioritizing safety projects, and pursuing potential funding opportunities that support implementation of LRSP strategies and actions across the region. This Safety Committee would also coordinate with TDOT and VDOT to ensure the safety activities of the region align with the State safety priorities.

Evaluation of the LRSP will be in the form of process and outcomes. Process evaluation involves reviewing each numbered action under the strategies in the LRSP and determining if progress has been made. Outcome evaluation looks at the impact of activities. For some projects, such as site-specific projects, it is relatively straightforward to determine safety impact based on pre-construction and post-construction crash statistics. For other projects, it may be a combination of several activities that lead to a change in crash frequency. For example, a change in the frequency of impaired driving crashes may be a result of a combination of educational and enforcement initiatives. Therefore, because of the interrelationship between different safety activities in the region, KMTPO will use fatalities and injuries as the metric for annual progress in each of the emphasis areas.

KMTPO will consider other metrics, if data allow. Changes in traffic volumes, crash severity, and characteristics of crashes also provide meaningful insight into the effect of safety



countermeasures. Part B of the Highway Safety Manual (HSM)<sup>18</sup> is a useful resource that provides further information on different performance measures and evaluation methods.

The KMTPO and its stakeholders recognize that some strategies may take several years to fully implement. Additionally, it may take several years to realize the benefit of the strategies through a reduction of fatal and serious injury crashes. The LRSP is a living document and will be reviewed on an on-going basis. Like the SHSP, a full update of the LRSP is anticipated to be completed every five years, in conjunction with the LRTP update, or as deemed necessary by KMTPO. However, more frequent updates to the individual strategies and actions may take place to reflect the Plan's progress and any new policies that affect implementation. The KMTPO will be the primary agency responsible for updating the LRSP with support from the stakeholders.

KMTPO will also consult additional resources to guide the implementation of the LRSP, such as Chapter 3 of FHWA's reference, Implementing a Local Road Safety Plan<sup>19</sup>.

## Funding Sources

Funding is critical to implement the strategies and action items in this LRSP and may come from a variety of sources: federal, state, local, and the private sector. These include standard funding program mechanisms and grants as well as new initiative grants. Some potential sources of funding may include the following:


- **Local Agency Funding.** Local agencies have various funding sources that can be used to improve and maintain roadways and perform other safety activities. Consideration of the LRSP strategies during the allocation of funding, especially for maintenance activities or other roadway improvement projects can support implementation of the LRSP.
- **Highway Safety Improvement Program (HSIP.)**<sup>20</sup> The TDOT and VDOT each manage HSIP programs. This core Federal-aid highway program funds projects and strategies that are data-driven, align with the State SHSP, and through implementation, help reduce traffic-related fatalities and serious injuries on all public roads, including locally owned public roads and roads on Tribal lands. The HSIP supports advancing implementation of the Safe System Approach and LRSPs. KMTPO tabulates HSIP funds within its Transportation Improvement Program (TIP).
- **Safe Streets and Roads for All.** The Bipartisan Infrastructure Law (BIL) established the new Safe Streets and Roads for All (SS4A) discretionary program that will provide \$5-6

---

<sup>18</sup> AASHTO, Highway Safety Manual, <https://www.highwaysafetymanual.org/Pages/default.aspx>

<sup>19</sup> FHWA, Office of Safety, Implementing a Local Road Safety Plan, [https://safety.fhwa.dot.gov/local\\_rural/training/fhwasa20025/chap3.cfm](https://safety.fhwa.dot.gov/local_rural/training/fhwasa20025/chap3.cfm)

<sup>20</sup> FHWA, Office of Safety, HSIP Eligibility Guidance, [https://safety.fhwa.dot.gov/hsip/rulemaking/docs/BIL\\_HSIP\\_Eligibility\\_Guidance.pdf](https://safety.fhwa.dot.gov/hsip/rulemaking/docs/BIL_HSIP_Eligibility_Guidance.pdf)



billion in grants over the next 5 years. Funding supports regional, local, and Tribal initiatives through grants to prevent roadway deaths and serious injuries.

- **Federal NHTSA Grant Funding.** The highway safety office in each State manages the various federal NHTSA grant funding that the State receives to support enforcement, education, and emergency response activities to improve driver behavior and reduce deaths and injuries from motor vehicle-related crashes. The highway safety office in each State receives grant applications annually in early spring and approval by NHTSA, typically in July.
- **Congestion Mitigation and Air Quality Improvement (CMAQ) Program.** These federal funds are made available to State and local governments for transportation projects and programs to help meet the requirements of the Clean Air Act.
- **Technology Transfer (T2).** These federal funds are managed by the FHWA Division office and are used for research development, technology and innovation transfer, outreach, and communication activities (e.g., peer exchanges, scan tours). They are completely reimbursable for travel.
- **FHWA Grants and Technical Assistance.** FHWA may make other funding available through grants to advance various safety activities. Other initiatives through FHWA that can provide resources to assist locals with LRSP activities include technical assistance.

## Implementation of Strategies and Action Items

Each of the strategies and action items in the tables for each Safe System element addresses the seven emphasis areas identified within the KMTPO LRSP using the Safe System Approach.

Agency leads, priority locations, potential funding sources and timeframe for implementation have been provided for each emphasis area strategy and action item. The implementation time frame identified as “Short” is for a period of now to three years; “Medium” covers three to eight years; “Long” covers a period over eight years.










The strategies and actions in the LRSP can also link to the current and future updates of KMTPO-led programs including the Long Range Transportation Plan and the Transportation Improvement Program. Bringing together the LRSP with these other plans and programs has the potential to reduce administrative burden, encourages the use of consistent data and analysis methods, and allocates resources to identified locations and programs that address the greatest safety needs in the region.













# Regional Safety Priorities

Based on analysis of the High Injury Network, field reviews, and input from stakeholders, Table 4 presents projects that should be considered for implementation.

Legend:  = Equity Area  = Short Time Frame  = Medium Time Frame  = Long Time Frame

Table 4: Regional Safety Priority Projects

Project Name and Description	Lead Agency	Cost (Low, Medium, High)	Safe System Element	Emphasis Area	Equity	Time Frame
<b>Interstate 81; Interstate 26/James H. Quillen Parkway; US 23 enforcement campaigns</b>	THP; VSP	High	Safe Users	Distracted, Impaired, Occupant Protection		
<b>East Stone Drive/US-11W/TN-1 corridor access management and Complete Streets</b>	City of Kingsport	High	Safe Roads	Intersections, Young Drivers, Impaired, Roadway Departure		
<b>US-11 W/TN-1 (non-City portions) enforcement campaigns</b>	Sullivan County, Hawkins County	High	Safe Users	Distracted, Impaired, Occupant Protection		
<b>US-11 W/TN-1, 2000 ft each direction from Hord Creek (Church Hill), guardrail enhancement or new installation, edge delineation with reflectors/chevrons</b>	TDOT	Medium	Safe Roads	Lane Departure		
<b>Fort Henry Drive/TN-36 (Airport Drive to John B Dennis Highway/TN-93), new guardrail installation, edge delineation with reflectors/chevrons</b>	TDOT	Medium	Safe Roads	Lane Departure		
<b>East Carters Valley Road edge delineation by striping and/or reflectors/chevrons</b>	TDOT, VDOT	Medium	Safe Roads	Lane Departure		

Project Name and Description	Lead Agency	Cost (Low, Medium, High)	Safe System Element	Emphasis Area	Equity	Time Frame
<b>Carters Valley Road/TN-346/TN-2462 edge delineation by striping and/or reflectors/chevrons</b>	TDOT	Medium	Safe Roads	Lane Departure		
<b>Fort Henry Drive/TN-36 (north of Interstate 81) speed management (road diet, speed feedback signs, traffic calming strategies)</b>	TDOT	Medium	Safe Roads Safe Speeds	Roadway Departure, Speed		
<b>Fort Henry Drive/TN-36 (Airport Drive to John B Dennis Highway/TN-93) corridor access management and Complete Streets</b>	TDOT	Medium	Safe Roads	Intersections		
<b>John B. Dennis Highway/TN-93 (S Wilcox and Lincoln intersection approach signage and warnings)</b>	TDOT	Medium	Safe Roads Safe Speeds	Intersections		
<b>Memorial Boulevard/TN-126 (systemic intersection improvements, turn lanes)</b>	City of Kingsport; Sullivan County	Medium	Safe Roads	Intersections		
<b>US 23 Weber City speed management (feedback signs)</b>	VDOT	Low	Safe Speeds	Speed		
<b>US 23/58 Gate City @ US 58 Business speed management (feedback signs)</b>	VDOT	Low	Safe Speeds	Speed		
<b>E Stone Drive/US-11W/TN-1 (US 23 to TN 93) systemic pedestrian improvements (sidewalks, marked crossings of minor streets)</b>	TDOT	Low	Safe Roads	Intersections, Pedestrians		
<b>Center Street/TN-36 systemic pedestrian improvements (high visibility crosswalks, curb extensions)</b>	City of Kingsport, TDOT	Low	Safe Roads	Intersections, Pedestrians		



## Appendix: Crash Trees

# Regional Crash Trees

## Fatal Injuries and Suspected Serious Injuries

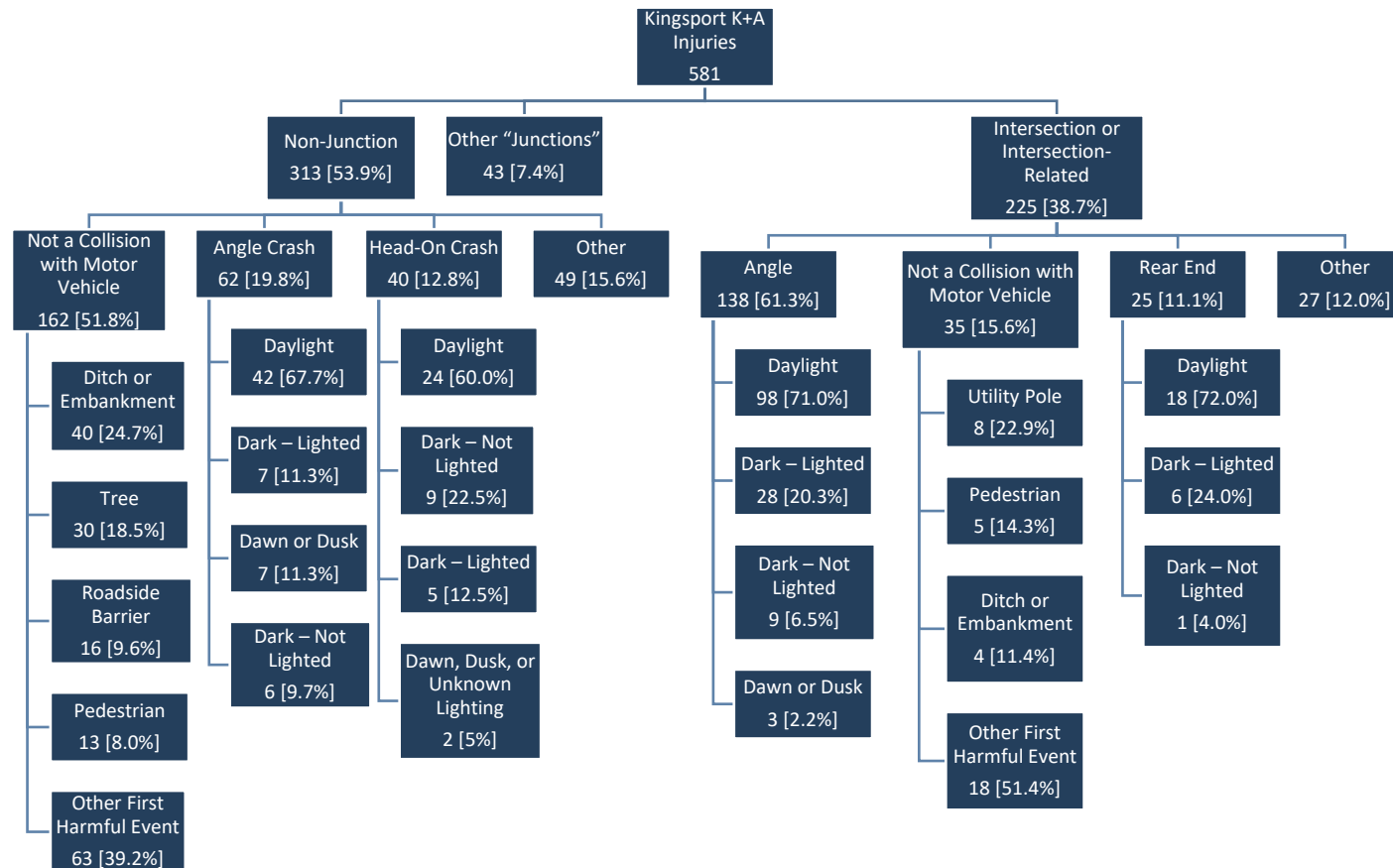


Figure 14. Graphic. Total fatal and suspected serious injuries in Kingsport (Source: TDOT, VDOT, 2022).

## Lane Departure Crashes

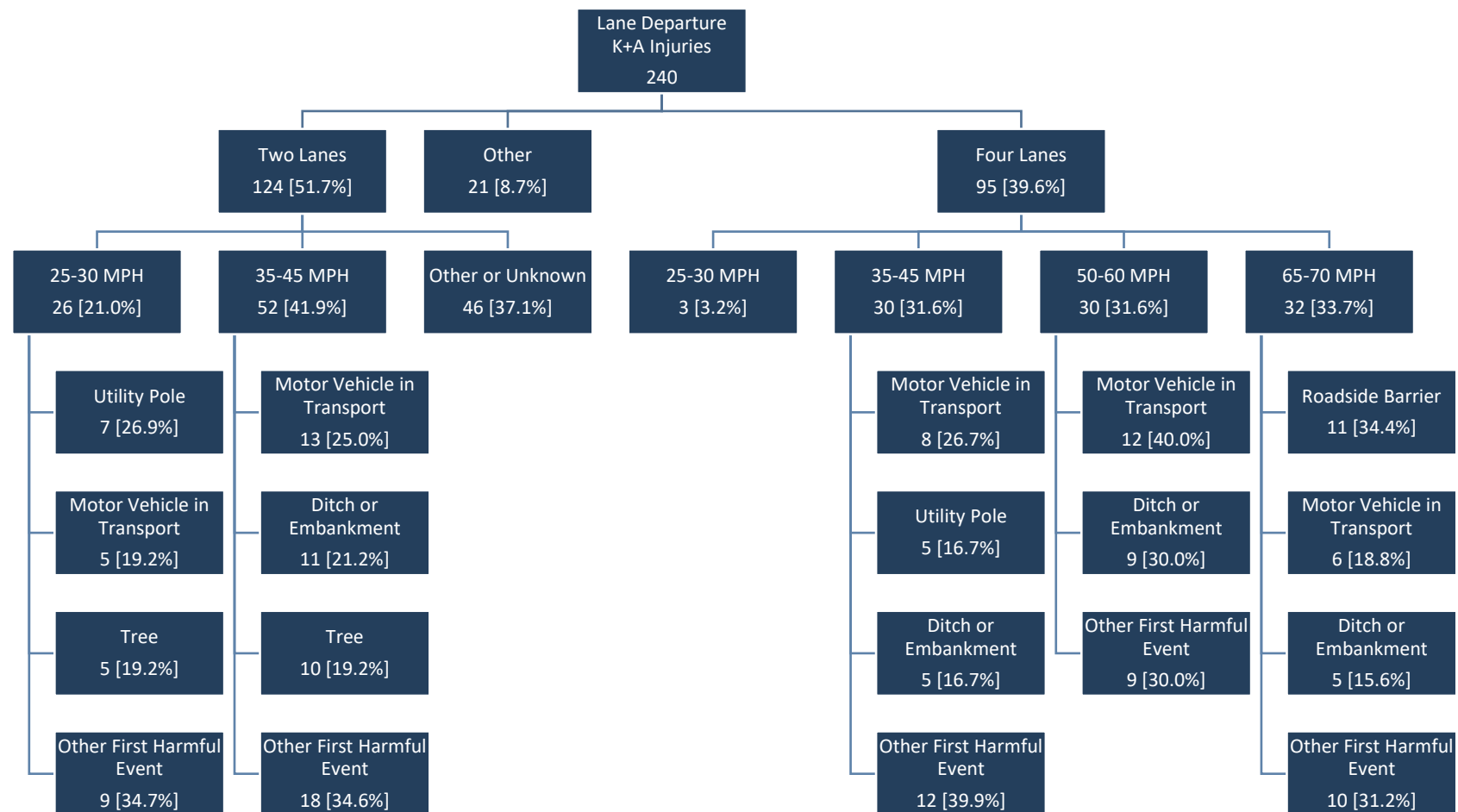


Figure 15. Graphic. Lane departure fatal and serious injury crashes (Source: TDOT, VDOT, 2022).

## Intersection Crashes

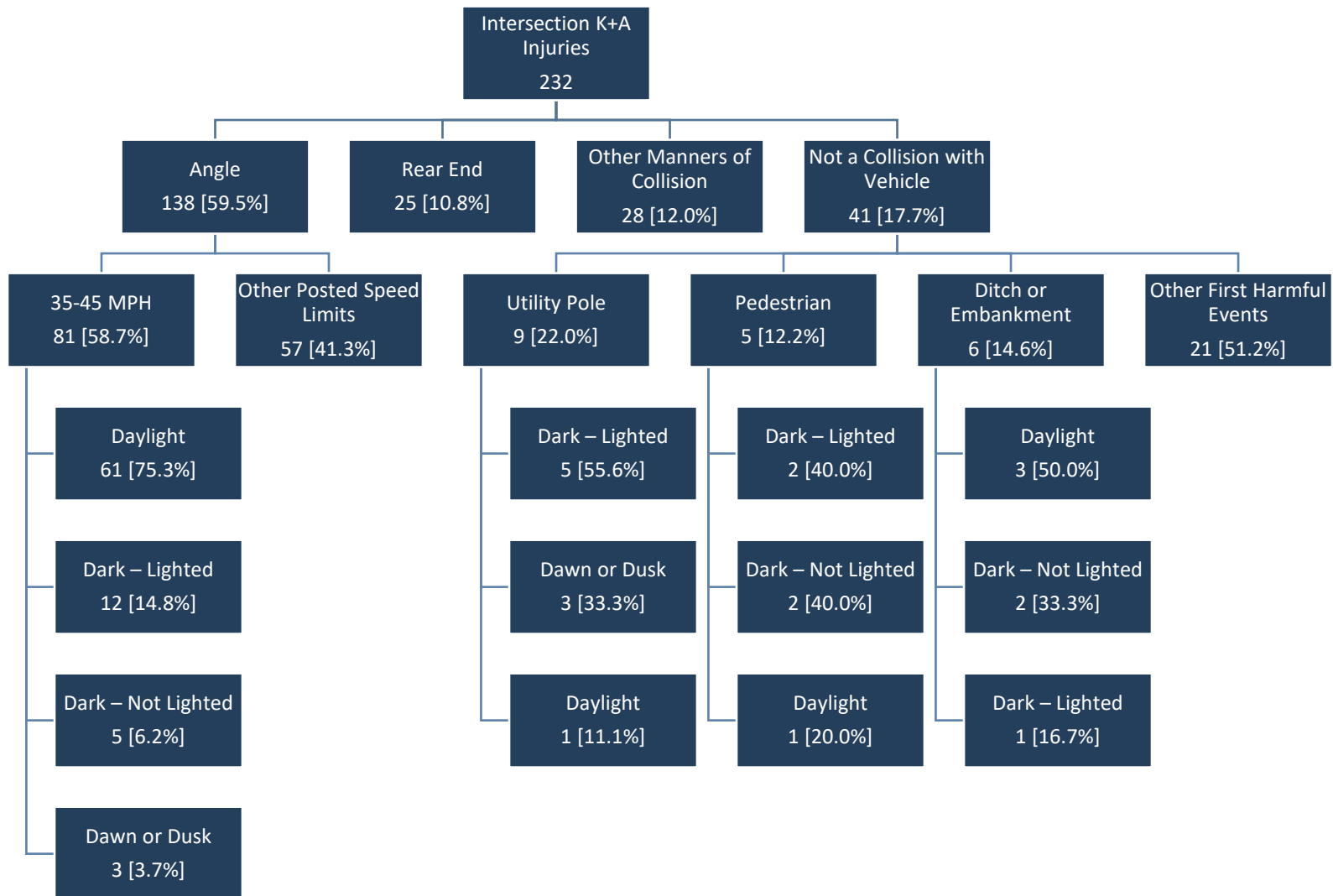


Figure 16. Graphic. Intersection-related fatalities and serious injuries (Source: TDOT, VDOT, 2022).

## Speed Crashes

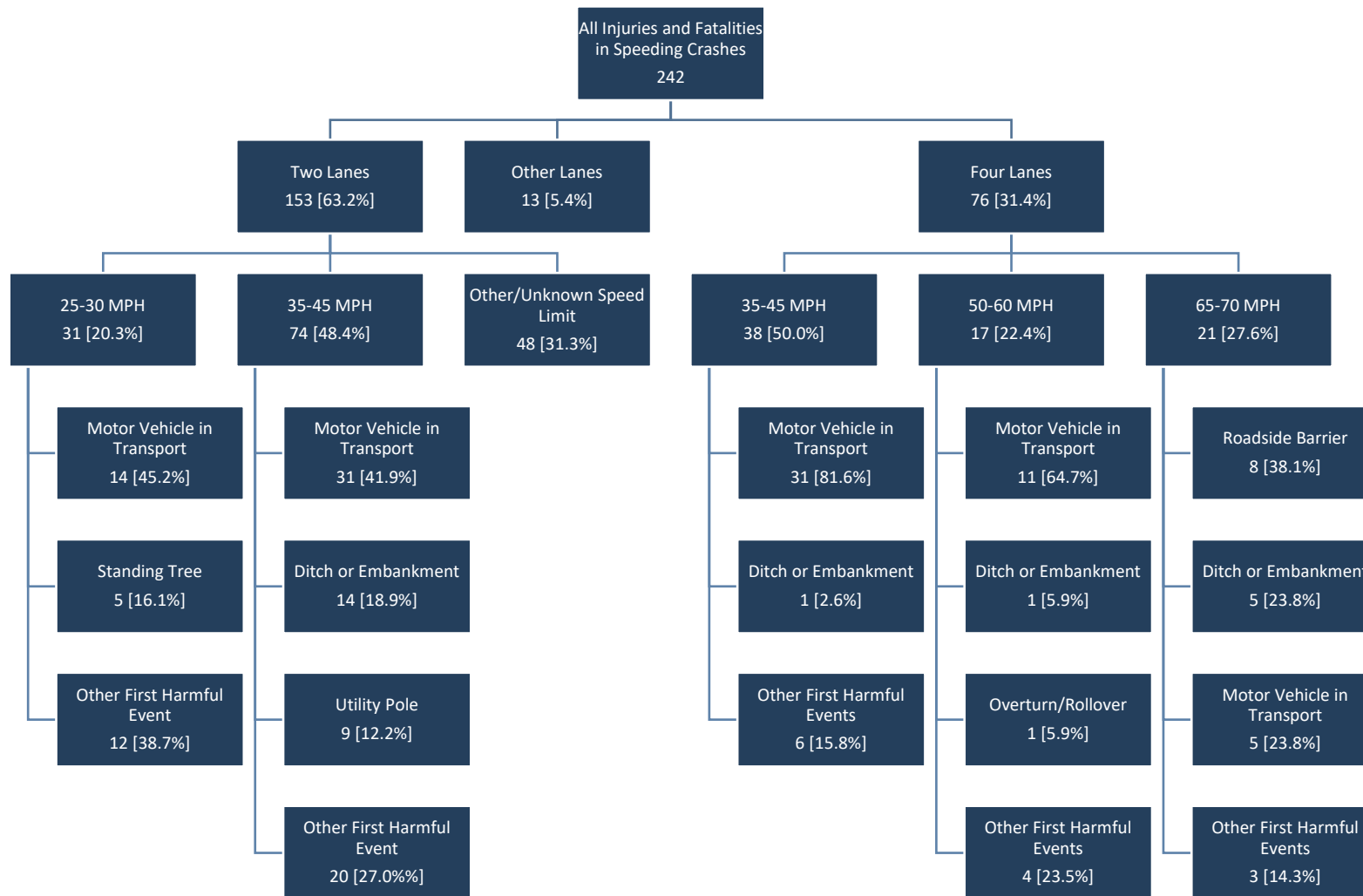


Figure 17. Graphic. All fatalities and injuries for speeding crashes (Source: TDOT, VDOT, 2022).

## Unbelted Occupants

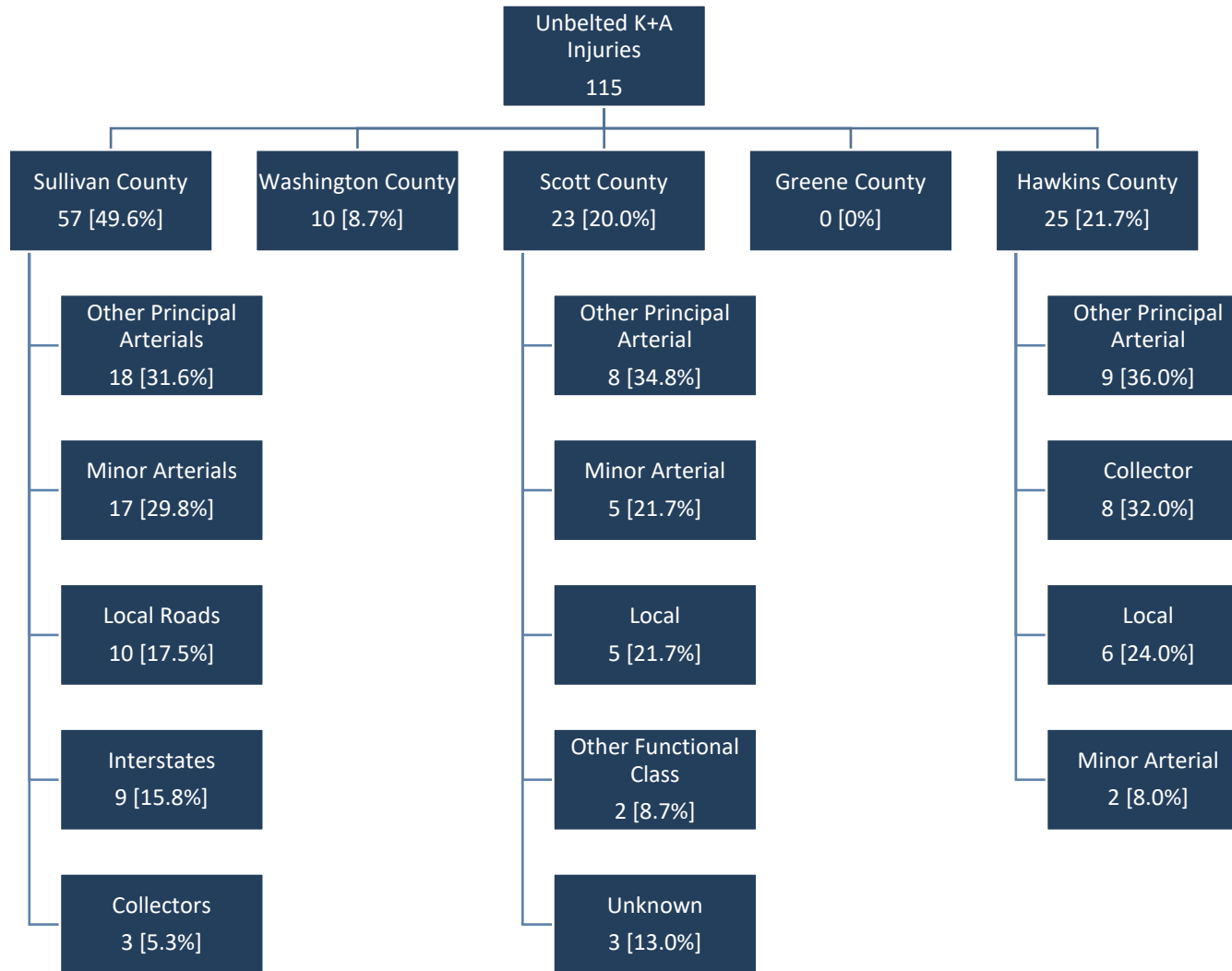


Figure 18. Graphic. Unbelted fatalities and serious injuries (Source: TDOT, VDOT, 2022).

## Impaired Driver Crashes

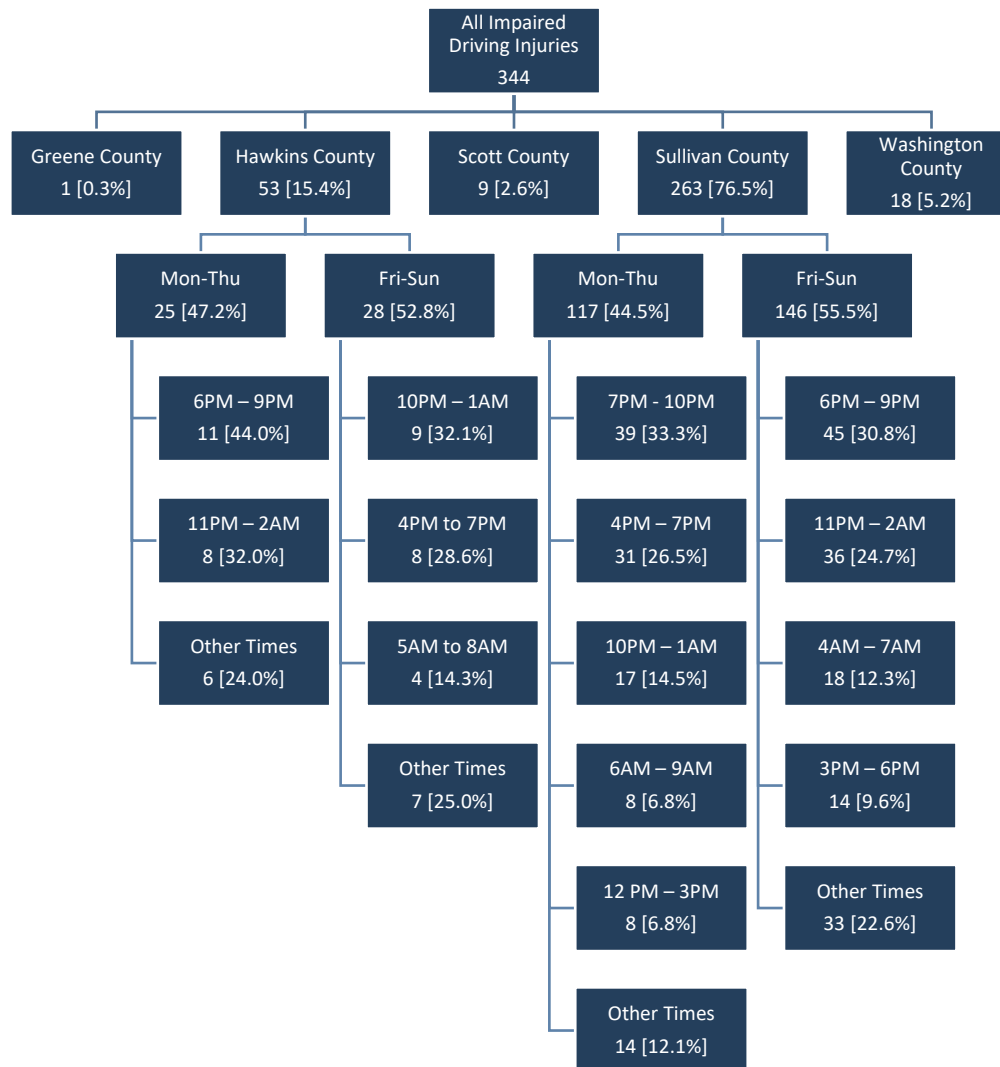


Figure 19. Graphic. All impaired driving injuries (Source: TDOT, VDOT, 2022).

## Distracted Driver Crashes

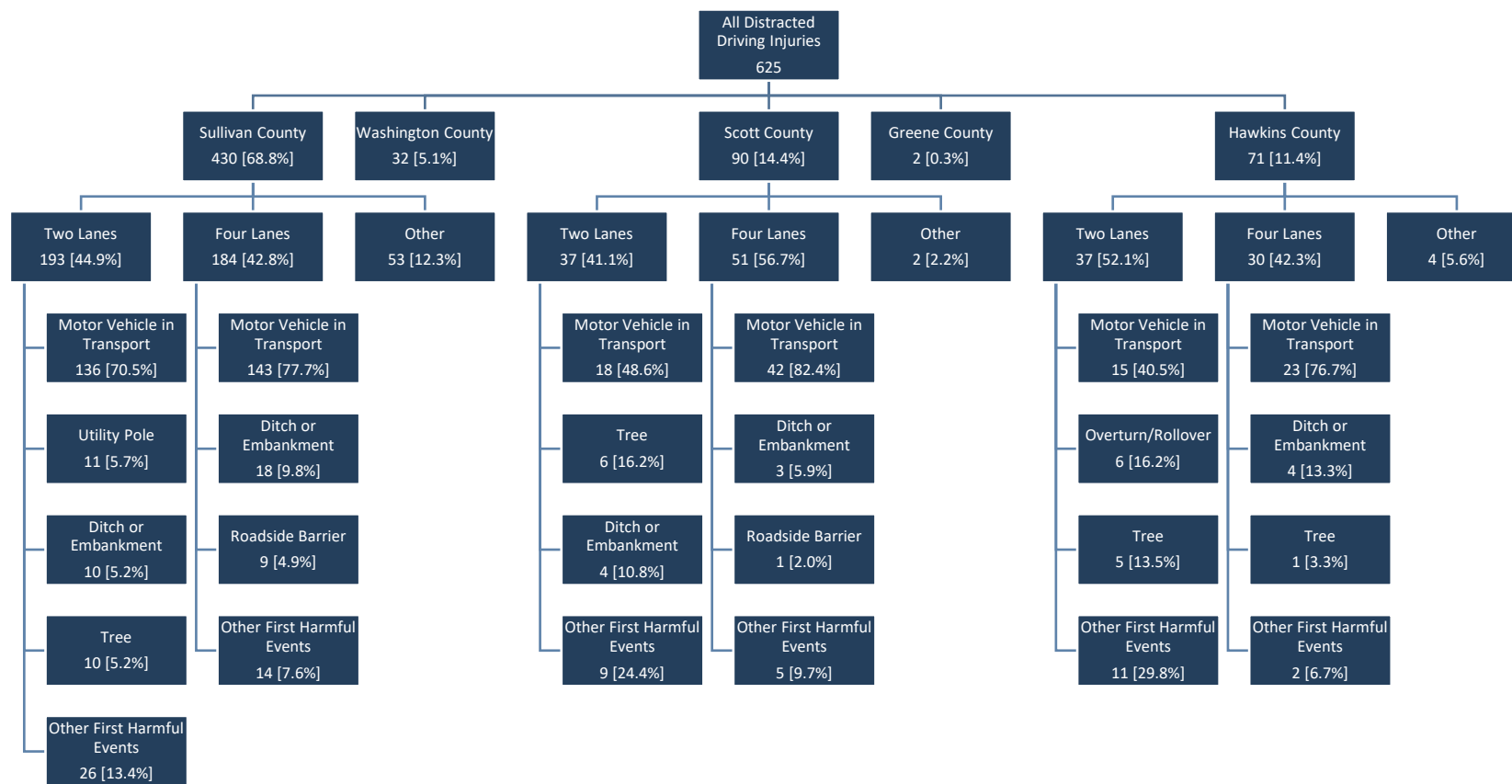


Figure 20. Graphic. All distracted driving injury crashes (Source: TDOT, VDOT, 2022).

## Young Driver Crashes

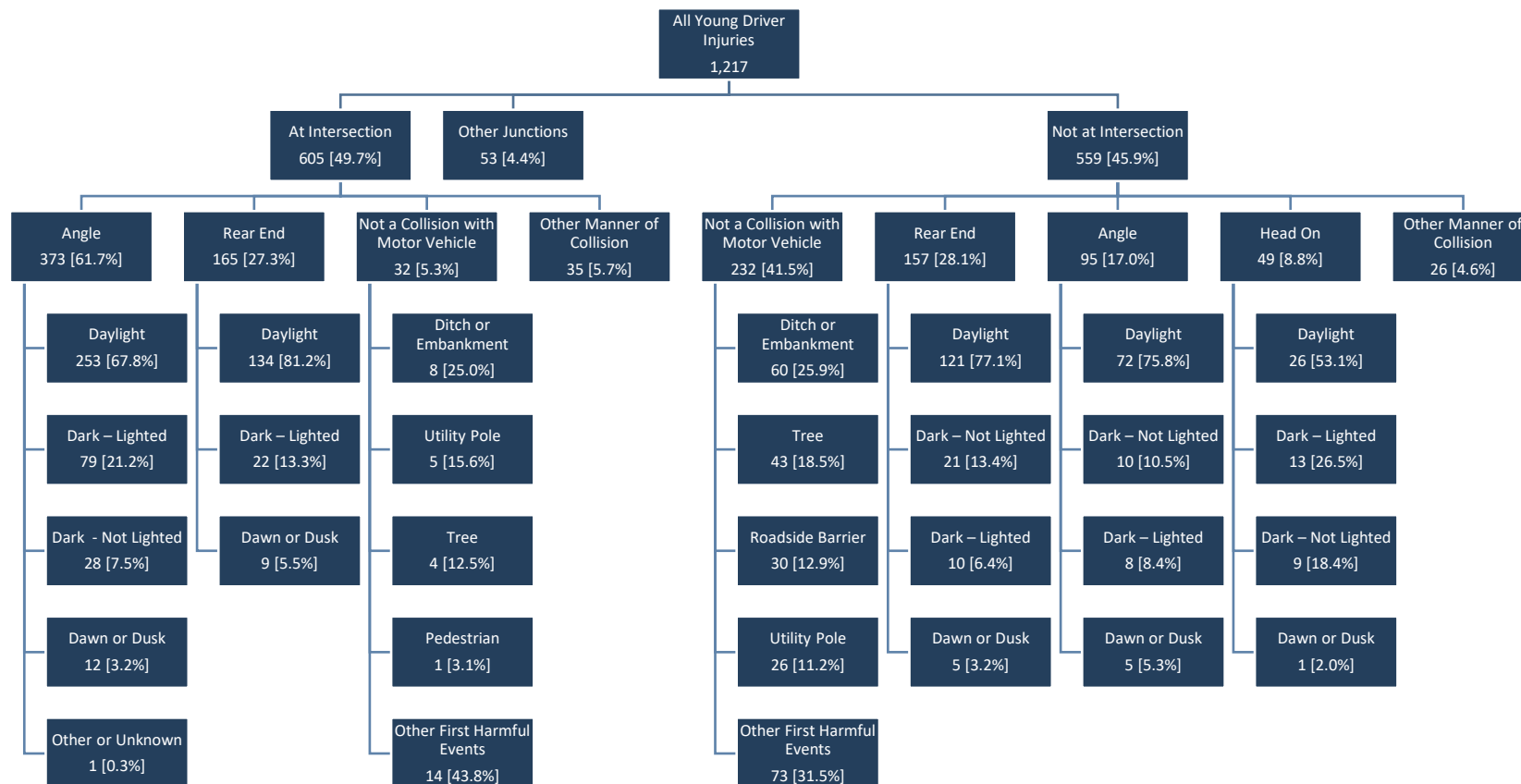


Figure 21. Graphic. All young driver injuries (Source: TDOT, VDOT, 2022).

