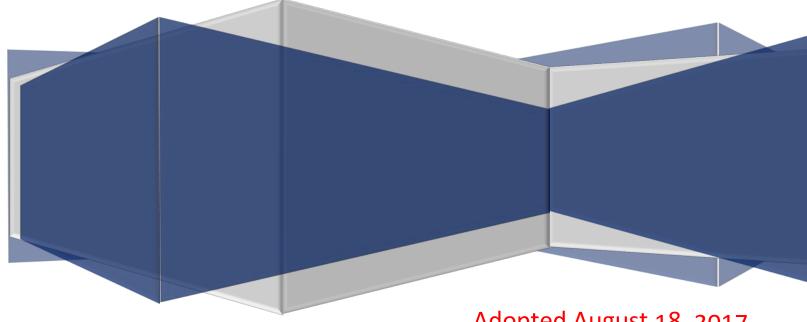


Unified Planning Work Program

Federal Fiscal Year 2018 October 1, 2017 to September 30, 2018



Adopted August 18, 2017 Amended February 22, 2018

This Unified Planning Work Program was developed by the Johnson City MTPO, in cooperation with:

U.S. Department of Transportation

Federal Highway Administration

Federal Transit Administration

Tennessee Department of Transportation

An electronic copy of this document can be found on our website at <u>http://jcmpo.org/upwp.html</u>.

If you need this document translated into Spanish or another language, please contact the MTPO Coordinator, by phone at (423) 434-6272 or email at icmpo@jcmpo.org.

Spanish Translation of the above statement:

Si usted necesita este document resumido en espanol contacta por favor al Coordinator del MTPO. Numero de telefono (423) 434-6272, correo electronico: jcmpo@jcmpo.org.

The Johnson City Metropolitan Transportation Planning Organization (MTPO) ensures compliance with Title VI of the Civil Rights Act of 1964; 49 CFR, part 26; related statutes and regulations to the end that no person shall be excluded from participation in or be denied the benefits of, or be subjected to discrimination under any program or activity receiving federal financial assistance from the U.S. Department of Transportation on the grounds of race, color, sex or national origin.

Table of Contents

RESOLUTION
List of Abbreviations
Introduction
Funding6
Johnson City MTPO Focus Areas
Priorities for Fiscal Year 20189
Johnson City MTPO Metropolitan Planning Area10
Organizational Structure
Executive Board10
Executive Staff12
Administrative Staff12
Public Participation
Amendments and Adjustments13
Title VI / Environmental Justice / ADA14
Federal Planning Factors and Federal Initiatives14
Federal Planning Emphasis Areas17
Work Program19
Task A1 – Administrative Activities (PL 112)19
Task A2 – Maintenance of Data Inventories and Surveillance (PL 112)
Task B – Long Range Transportation Plan – Maintenance (PL 112)
Task C – Transportation Improvement Program – Maintenance (PL 112)
Task D – Transit Planning (Section 5303)30
<mark>Task E – Vehicle Procurement</mark>
Contingency
Budget Summary – Funding Sources35
Budget Summary – Agency Participation
Budget Summary – Agency Participation by Funding Source
Appendix A – Criteria for TIP Project Selection
Appendix B – Performance Evaluation of the Johnson City MTPO Public Participation Plan

RESOLUTION OF THE EXECUTIVE BOARD OF THE JOHNSON CITY METROPOLITAN TRANSPORTATION PLANNING ORGANIZATION TO APPROVE AND ADOPT THE FISCAL YEAR 2018 UNIFIED PLANNING WORK PROGRAM

WHEREAS, a comprehensive, cooperative, and continuing transportation process is to be carried out in the Johnson City Metropolitan Planning Area; and

WHEREAS, under federal planning guidelines, Metropolitan Planning Organizations are required to submit a Unified Planning Work Program (UPWP) that identifies the transportation planning projects and planning activities to be undertaken by local, regional, and/or state agencies for the Johnson City Metropolitan Transportation Planning Organization (MTPO) Metropolitan Planning Area (MPA) for Fiscal Year 2018; and

WHEREAS, the various state, local and regional agencies involved with transportation planning for the Johnson City MTPO MPA have cooperatively developed a UPWP for Fiscal Year 2018; and

WHEREAS, the staff of the Johnson City MTPO, Tennessee Department of Transportation, Federal Highway Administration and Federal Transit Administration have reviewed the Fiscal Year 2018 UPWP and found it satisfies federal requirements; and

NOW, THEREFORE, BE IT RESOLVED the Johnson City MTPO Executive Board does hereby approve and adopt the Fiscal Year 2018 UPWP.

Johnson City MTPO Executive Board Chairman

Johnson City MTPO Executive Staff Chairman

RESOLUTION 2018-04

RESOLUTION OF THE EXECUTIVE BOARD OF THE JOHNSON CITY METROPOLITAN TRANSPORTATION PLANNING ORGANIZATION TO AMEND THE FISCAL YEAR 2018 UNIFIED PLANNING WORK PROGRAM (UPWP) TO ADD NEW FUNDING AND A NEW TASK

WHEREAS, a comprehensive cooperative and continuing transportation planning process is to be carried out in the Johnson City Metropolitan Transportation Area; and

WHEREAS, under Federal Planning Guidelines MPOs are required to submit a Unified Planning Work Program (UPWP) that identifies the transportation planning projects and planning activities to be undertaken by local, regional, and or state agencies for the Johnson City MTPO Area for Fiscal Year 2018; and

WHEREAS, the Fiscal Year 2018 UPWP needs to be amended to reflect additional funding and a new task; and

WHEREAS, the Fiscal Year 2017 allocation of Section 5303 funds from the Federal Transit Administration has been received through the newly created Consolidated Planning Grant through the Tennessee Department of Transportation (TDOT) and the Fiscal Year 2018 UPWP will need to be amended to add the additional funding to Task D – Transit Planning; and

WHEREAS, a new task is being added to procure a staff vehicle as a capital item with prior approval from TDOT and the Federal Highway Administration; and

NOW, THEREFORE, BE IT RESOLVED that the Executive Board of the Johnson City Metropolitan Transportation Planning Organization does hereby approve the amendment to the Fiscal Year 2018 Unified Planning Work Program.

MTPO Executive Board, Chairperson

MTPO Executive Staff, Chairperson

2-22-2018

Date

22 FEB 2018

Date

List of Abbreviations

3DEP	3D Elevation Program
ADA	Americans with Disabilities Act
COOP	Continuity Of Operations Planning
CPG	Consolidated Planning Grant
EDC	Every Day Counts
EPA	Environmental Protection Agency
ETRIMS	Enhanced Tennessee Roadway Information Management System
FAST Act	Fixing America's Surface Transportation Act
FHWA	Federal Highway Administration
FTA	Federal Transit Administration
FY	Fiscal Year
GIS	Geographic Information Systems
GPS	Global Positioning System
INVEST	Infrastructure Voluntary Evaluation Sustainability Tool
ITS	Intelligent Transportation Systems
JCT	Johnson City Transit
LRTP	Long Range Transportation Plan
MAP-21	Moving Ahead for Progress in the 21 st Century Act
MOA	Memorandum of Agreement
MPA	Metropolitan Planning Area
MPO	Metropolitan Planning Organization
MTPO	Metropolitan Transportation Planning Organization
PEL	Planning and Environmental Linkages
PL 112	Section 112 of the Federal-Aid Highway Act of 1973 (Public Law 93-87)
PPP	Public Participation Plan
RFP	Request for Proposals
RPO	Rural Planning Organization
Section 5303	U.S. Title 49, Section 5303 (Transit Planning)
SHRP	Strategic Highway Research Program
SPR	State Planning and Research Funds
TDM	Travel Demand Model
TDOT	Tennessee Department of Transportation
TIP	Transportation Improvement Program
TITAN	Tennessee Integrated Traffic Analysis Network
TNMUG	Tennessee Model Users Group (Travel Demand Model)
TSMO	Transportation System Management and Operations
UROP	Urban Operating Assistance Program
UPWP	Unified Planning Work Program
U.S. DOT	United States Department of Transportation
VMT	Vehicle Miles Traveled

Introduction

The Johnson City Metropolitan Transportation Planning Organization (MTPO) was established in 1982 when the 1980 Census identified the Johnson City Urbanized Area (urban areas with a population of at least 50,000). Federal law requires the Johnson City MTPO to conduct transportation planning activities within the Johnson City Urbanized Area in a continuous, cooperative, and comprehensive process, as defined in the following federal legislation and regulations:

- Current Transportation Authorization Fixing America's Surface Transportation (FAST) Act;
- Past Transportation Authorization Moving Ahead for Progress in the 21st Century (MAP-21) Act;
- Metropolitan Transportation Planning Title 23 of the United States Code (USC), Section 134;
- Formula Grant Program for Metropolitan Planning Title 49 of the USC, Section 5303;
- Metropolitan Transportation Planning and Programming Title 23 of the Code of Federal Regulations (CFR), Section 450; and
- Metropolitan Transportation Planning and Programming –Title 49 of the CFR, Section 613, Subpart A.

In order to carry out these duties, the Johnson City MTPO staff develops a work program in the form of a document called the Unified Planning Work Program, or UPWP as it is often referred to by transportation professionals. This UPWP covers Federal Fiscal Year (FY) 2018, beginning on October 1, 2017 and ending on September 30, 2018.

The UPWP is developed by the Johnson City MTPO staff in conjunction with its member jurisdictions, Tennessee Department of Transportation (TDOT), Federal Highway Administration (FHWA), Federal Transit Administration (FTA) and Johnson City Transit (JCT). The draft UPWP is then submitted to TDOT, FHWA, and FTA for comments. Once the comments have been adequately addressed, the UPWP is recommended for adoption by the Johnson City MTPO Executive Board. The Executive Board meeting is advertised at least seven days before the meeting. Then, the adopted UPWP is forwarded to TDOT and approved by FHWA and FTA.

The UPWP identifies tasks ranging from data collection tasks to plan development. Perhaps the two most important tasks in the UPWP are the development and maintenance of the Johnson City MTPO 2040 Long Range Transportation Plan (LRTP), referred to as the "Metropolitan Transportation Plan" in federal legislation, and the Transportation Improvement Program (TIP).

In addition to the development and maintenance of these two tasks, the UPWP identifies ongoing administrative activities and special projects or programs being undertaken by the Johnson City MTPO. As a result, these three core plans and programs support the "continuing, comprehensive and cooperative" planning process.

On December 4, 2015, the Fixing America's Surface Transportation Act, or FAST Act, was signed by the President and became federal law. It superseded the Moving Ahead for Progress in the 21st Century Act,

commonly referred to as MAP-21. The transportation act provides both funding and requirements for transportation activities, including transportation planning.

One of the requirements of MAP-21 that was continued by the FAST Act is to take a performance based approach in transportation planning by developing "performance measures" and "performance targets" for transportation. FHWA published the final rule for the Transportation Performance Management in Metropolitan Planning on May 27, 2016, with an effective date of June 27, 2016. Also, the Safety Performance Measures Final Rule was published March 15, 2016, with an effective date of April 14, 2016. The Pavement and Bridge Condition Measures and System Performance Measures final rules were published on January 18, 2017, with an effective date of May 20, 2017.

The intention of the performance-based planning requirement is for the U.S. DOT to set national performance measures and then the State and MPOs in turn set performance targets. The Johnson City MTPO staff will work closely with TDOT to set performance targets in FY 2018.

Funding

The primary funding source to accomplish tasks identified in the UPWP is provided by two programs. First, the FHWA Section 112 Metropolitan Transportation Planning funds (PL 112) and second, the FTA Section 5303 Transit Planning funds. As with most grants, matching funds are required. Shown in Table 1 and Table 2 on the next page is the funding program, required matching ratios and the amounts. In addition to these funding sources, TDOT receives State Planning and Research (SPR) funds. TDOT utilizes these funds to assist in transportation planning activities for the Johnson City MTPO.

Tennessee receives a direct apportionment of FHWA Section 112 Metropolitan planning (PL) funds and Federal Transit Administration (FTA) Section 5303 planning funds. Beginning with this amendment on this UPWP, TDOT participates in the Consolidated Planning Grant (CPG) Program, where FHWA and FTA planning funds are combined into a single fund administered by FHWA. The funds are distributed to the MPOs and administered by TDOT's Long Range Planning Division in accordance with 23 CFR 420.109. The PL distribution formula gives each MPO a base amount plus an amount based on their 2010 Census Urbanized Area Population and the formula also retains a small portion for TDOT to use for the benefit of all the MPOs. The distribution formula for the 5303 funds is based on each MPO's 2010 Census Urbanized Area Population.

The funds originating with FHWA require a 20% local match, resulting in an 80% Federal/20% Local split. The funds originating with FTA also require 20% matching funds. TDOT provides half of the match, resulting in an 80% Federal/10% State/10% Local split.

Table 1 – Funding Sources and Ratios

Funding Program	Program Description	Federal	State	Local
FHWA (PL 112)	Provides funding to the MPOs to establish a cooperative, continuous, and comprehensive framework for making transportation investment decisions in metropolitan areas	80%	0%	20%
FTA (Sec. 5303)	Provides funding and procedural requirements to the MPOs for multimodal transportation planning in metropolitan areas	80%	10%	10%
SPR	Provides funding to the States to establish statewide planning process, which establishes a cooperative, continuous, and comprehensive framework for making transportation investment decisions throughout the State	80%	20%	0%

Table 2 – Transportation Planning Funding Programs, FY 2018

Funding Program	Total	Federal	State	Local
Consolidate	d Planning Grant (<mark>CPG)</mark>		
CPG - Federal High	way Administration	<mark>n (80/0/20)</mark>		
FHWA (PL 112) (Percentages)	100%	80%	0%	20%
FY 2018 Est. Allocation	\$274,004	\$219,203	\$0	\$54,801
FY 2017 Est. Carryover	\$165,000	\$132,000	\$0	\$33,000
Prior Year Reserve Balance	\$192,547	\$154,038	\$0	\$38,509
FY 2018 Programmed Funds	<mark>\$400,000</mark>	<mark>\$320,000</mark>	<mark>\$0</mark>	<mark>\$80,000</mark>
Est. Unprogrammed Balance	<mark>\$231,551</mark>	<mark>\$185,241</mark>	<mark>\$0</mark>	<mark>\$46,310</mark>
CPG - Federal Tran	sit Administration	<mark>(80/10/10)</mark>		
FTA (Sec. 5303) (Percentages)	<mark>100%</mark>	<mark>80%</mark>	<mark>10%</mark>	<mark>10%</mark>
Sec. 5303 FY 2017 Est. Allocation	<mark>\$62,972</mark>	<mark>\$50,378</mark>	<mark>\$6,297</mark>	<mark>\$6,297</mark>
FY 2017 Est. Carryover	<mark>\$0</mark>	<mark>\$0</mark>	<mark>\$0</mark>	<mark>\$0</mark>
Prior Year Reserve Balance	<mark>\$0</mark>	<mark>\$0</mark>	<mark>\$0</mark>	<mark>\$0</mark>
FY 2018 Programmed Funds	<mark>\$62,972</mark>	<mark>\$50,378</mark>	<mark>\$6,297</mark>	<mark>\$6,297</mark>
Est. Unprogrammed Balance	<mark>\$0</mark>	<mark>\$0</mark>	<mark>\$0</mark>	<mark>\$0</mark>
Federal Transit Administration (FY 2	2016 funds distribu	ted prior to Cl	P <mark>G) (80/10/1</mark>	<mark>0)</mark>
FTA (Sec. 5303) (Percentages)	100%	80%	10%	10%
FY 2017 Est. Allocation	\$0	\$0	\$0	\$0
FY 2017 Est. Carryover	\$6 <i>,</i> 447	\$5,157	\$645	\$645
Prior Year Reserve Balance	\$63,808	\$51,046	\$6,381	\$6,381
FY 2018 Programmed Funds	\$70,255	\$56,203	\$7 <i>,</i> 026	\$7,026
Est. Unprogrammed Balance	\$0	\$0	\$0	\$0

Funding Program	Total	Federal	State	Local			
State Planning and Research (80/20/0)							
SPR (Percentages)	100%	80%	20%	0%			
FY 2018 Distribution	\$65,176	\$52,141	\$13,036	\$0			
FY 2017 Est. Carryover	\$0	\$0	\$0	\$0			
Prior Year Reserve Balance	\$0	\$0	\$0	\$0			
FY 2018 Programmed Funds	\$65,176	\$52,141	\$13,036	\$0			
Est. Unprogrammed Balance	\$0	\$0	\$0	\$0			

Table 2 – Transportation Planning Funding Programs, FY 2018 (continued)

Depending on the task, other funding sources may be used. If so, they are identified in the detail section of each task in the UPWP. However, it should be noted without the FHWA PL 112 and FTA Section 5303 funds, the Johnson City MTPO would not be able to operate in its current capacity as the majority of these funds are used for its operations. Both of these programs are administered by TDOT with the City of Johnson City providing the local matching funds.

The annual allocation for FHWA PL 112 funds are based on official population numbers from the decennial census conducted by the U.S. Census Bureau for the Johnson City Urbanized Area. The official Johnson City Urbanized Area population in the 2010 Census is 120,415. This figure will be valid until the U.S. Census Bureau releases new population figures for urbanized areas after the 2020 Census. This usually occurs within two years after the completion of the decennial census.

Johnson City MTPO Focus Areas

The following accomplishments were achieved for the Johnson City MTPO in FY 2017:

- Drafted and adopted a new FY 2018 UPWP;
- Maintained the FY 2014-2017 TIP with amendments and adjustments;
- Drafted and adopted the FY 2017-2020 TIP;
- Maintained the FY 2017-2020 TIP with amendments and adjustments;
- Expanded GIS capabilities by participating in the citywide Esri Enterprise License, with ArcGIS Online included (which enhances visualization techniques);
- Received completed 3D elevation data from United States Geological Services (USGS) for analysis;
- Finalized the launch of the electronic TIP database and interactive website;
- Analyzed commercial data to use for the update of the LRTP and provided it to the consultant;
- Continued the process of updating the LRTP by holding planning/stakeholder and public meetings;
- Finalized the draft of the LRTP for review by TDOT and FHWA/FTA;
- Worked with TDOT to prepare performance targets for metropolitan planning and safety;
- Prepared transit performance targets for state of good repair in cooperation with JCT;

- Assisted JCT with an update to the Coordinated Public Transit Human Services Transportation Plan that was completed in March 2017;
- Began the process to complete an Comprehensive Operational Analysis for JCT; and
- Began the process to prepare a bus procurement package for the purchase of medium-duty buses for JCT.

One of the basic needs for any performance targets is quality *information*. The first step in developing this information is the collection of raw data. Data can either be obtained through various techniques, including onsite data collection, sharing data with state agencies, or the purchase of data from commercial sources. For this data to become useful, information from it must be *analyzed*.

One of the tools used for this is the Geographic Information Systems (GIS). These systems are a valuable analytical tool that can be used to take raw data and convert it into useful information. Too often various agencies use GIS for a mapping tool and miss the opportunity to transform data into useful information. The Johnson City MTPO uses GIS to support the travel demand forecast model, as well as maintaining the functional classification system, transit infrastructure and data sets. GIS is used to analyze data, but more on a project by project basis. With the advent of performance measures, the Johnson City MTPO has identified the need to enhance and expand both data collection and analysis. In conjunction with this, the Johnson City MTPO continues to explore the FHWA's Infrastructure Voluntary Evaluation Sustainability Tool (INVEST) to evaluate sustainability in large transportation projects. Another tool that is being explored is the Transit Boardings Estimation and Simulation Tool, or TBEST, to assist JCT with transit demand modeling and planning.

In addition, technical aspects required to develop and maintain good transportation information must support the transportation planning process. The Johnson City MTPO also supports the policy initiatives in MAP-21 and the FAST Act, as explained further in this document. With this in mind, the Johnson City MTPO has developed the following priorities for FY 2018.

Priorities for Fiscal Year 2018

Priorities for the Johnson City MTPO UPWP first include the required federal documents that must be adopted and maintained in order to comply with federal laws and regulations and remain eligible to receive federal funds for transportation and transit projects. The staff of the Johnson City MTPO also meets with the staff of local jurisdictions and JCT to determine other planning needs for the upcoming year. The following represents the major activities for the FY 2018 UPWP:

- 1. TDOT, Johnson City MTPO, and public transportation providers will work together to establish performance targets for the Johnson City MTPO;
- 2. Maintain the Johnson City MTPO 2040 LRTP with adjustments and amendments as needed;
- 3. Continue the process of updating the LRTP as it goes through the state and federal review process and public comment period;
- 4. Adopt the final Johnson City MTPO 2045 LRTP prior to March 2018;

- 5. Maintain the current FY 2017-2020 TIP with adjustments and amendments as needed;
- 6. Maintain the FY 2018 UPWP through any necessary adjustments or amendments;
- 7. Update the website for the Johnson City MTPO to meet the needs of mobile users and accessibility requirements;
- 8. Develop the FY 2019 UPWP for submission to TDOT, FHWA, and FTA;
- 9. Participate as a stakeholder in regional transit planning meetings with Johnson City, Kingsport and Bristol;
- 10. Finalize the completion of the Comprehensive Operational Analysis for JCT; and
- 11. Finalize the completion of the bus procurement package for the purchase of medium-duty buses for JCT;
- 12. Continue to utilize GIS capabilities and databases, including data from the U.S. Census Bureau, Esri Enterprise applications and ArcGIS Online, to support transportation planning efforts by the Johnson City MTPO;
- 13. Monitor air quality regulations to prepare for potential impacts of new regulations from the Environmental Protection Agency (EPA); and
- 14. Procure an MTPO staff vehicle.

Johnson City MTPO Metropolitan Planning Area

The Johnson City MTPO Metropolitan Planning Area (MPA) consists of the Town of Bluff City, the City of Elizabethton, the City of Johnson City, the Town of Jonesborough, a portion of the Town of Unicoi, and parts of Carter, Sullivan and Washington Counties. Under current federal law, at a minimum any urbanized area with a population over 50,000 must be in an MPA for a Metropolitan Planning Organization (MPO). The map in Figure 1 on the next page shows the Johnson City MTPO Urbanized Area, as well as the MPA boundaries for the Johnson City MTPO. The current boundary was adopted by the Johnson City MTPO Executive Board at its meeting on October 9, 2014 and approved by the Governor of the State of Tennessee on December 17, 2014.

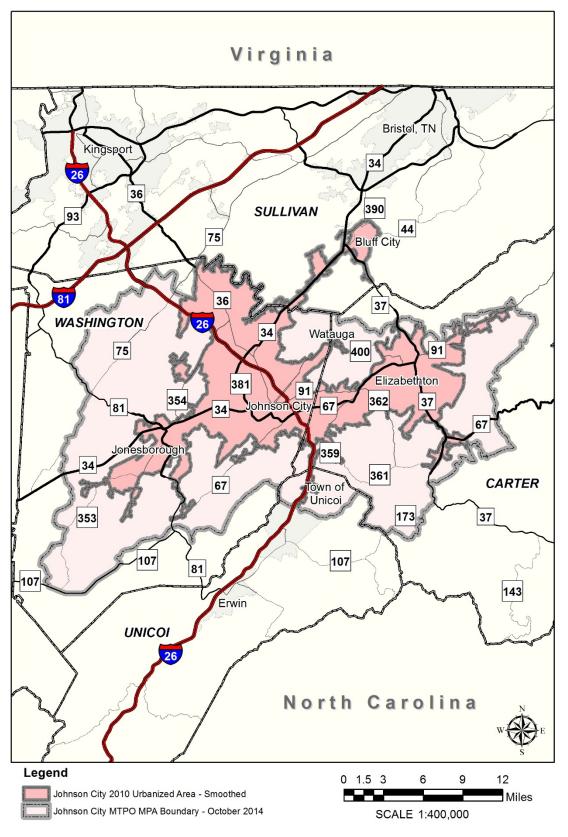
Organizational Structure

The Johnson City MTPO is comprised of an Executive Board, Executive Staff and administrative staff. The Executive Board is the overall governing body for the Johnson City MTPO and is supported by the Executive Staff and the Johnson City MTPO administrative staff.

Executive Board

The Executive Board is the governing body of the Johnson City MTPO and has the authority to adopt plans, programs, and policies. The Executive Board is comprised of the top elected officials from the member jurisdictions.





- Mayor of the City of Johnson City Executive Board Chairman
- Mayor of the City of Elizabethton Executive Board Vice Chairman
- Mayor of the Town of Bluff City Member
- Mayor of the Town of Jonesborough Member
- Mayor of the Town of Unicoi Member
- Mayor of Carter County Member
- Mayor of Washington County Member
- Governor of Tennessee Member
- Tennessee County Highway Officials Association Chosen Representative Member

Members of the Executive Board may designate a representative to serve on the board in their absence. Due to the duties and responsibilities of their office, the Governor of Tennessee usually sends a representative to meetings on their behalf. FHWA and FTA are non-voting members of the Executive Board.

Executive Staff

The Executive Staff is the next level of organization for the Johnson City MTPO. The Executive Staff assists in the development of plans and programs for the Johnson City MTPO MPA, keeps the Executive Board informed of transportation activities, and makes recommendations to the Executive Board for their consideration. Similar to the Executive Board, the Executive Staff is composed of representatives from each of the participating jurisdictions with additional agencies represented. The top administrator from each agency makes up the Executive Staff. Generally, these administrators are staff positions and not elected to office; however, in some cases, such as the Highway Superintendents, they are elected officials or appointed to their position.

- City Manager, City of Johnson City Executive Staff Chairman
- City Manager, City of Elizabethton Executive Staff Vice Chairman
- City Manager, Town of Bluff City Member
- Administrator, Town of Jonesborough Member
- Town Recorder, Town of Unicoi Member
- Highway Superintendent, Carter County Member
- Highway Superintendent, Washington County Member
- JCT Member
- First Tennessee Development District Member
- TDOT Member

FHWA and FTA are non-voting members of the Executive Staff. When necessary, the Executive Staff can assign tasks to other employees of their agency to assist with transportation projects.

Administrative Staff

The administrative staff of the Johnson City MTPO is housed as a division of the Development Services Department of the City of Johnson City. As required by federal law, the Johnson City MTPO is still responsible for coordinating transportation planning activities for all its member jurisdictions, as shown in Figure 2 on the next page. The administrative staff is also responsible for ongoing administration and day to day operations for the Johnson City MTPO.

Public Participation

In accordance with the Johnson City MTPO Public Participation Plan (PPP), after TDOT, FHWA and FTA have reviewed the UPWP, it is made available on the Johnson City MTPO website at http://www.jcmpo.org for review. The UPWP is reviewed and discussed at meetings of the Johnson City Executive Board and Executive Staff and adopted by the Executive Board. The Executive Board meeting is advertised at least seven days in advance. Any comments made are recorded and addressed before the UPWP is adopted. The document is available on the website and copies available at the MTPO administrative offices.



Figure 2

Amendments and Adjustments

The UPWP can be amended throughout the year if needed. An amendment is required if funding for a required task needs to be increased over 20% of the amount programmed for that task, if a new task is added, or if new or previously unprogrammed funds are added. Before an amendment to the UPWP is final, the amendment is placed on the Johnson City MTPO Executive Board agenda for their approval and adoption. The adopted amendment is then forwarded to TDOT and officially reviewed and approved by FHWA and FTA.

The UPWP can be adjusted if funding for a required task is not over 20% of the amount programmed for that task or a technical correction is made to a task that does not change its scope. The adjustment is sent to TDOT and forwarded to FHWA and FTA for their files.

Title VI / Environmental Justice / ADA

The Johnson City MTPO will continue to advocate for the fair treatment and meaningful involvement of all people regardless of race, color, national origin, sex, income, and disability. The Johnson City MTPO maintains an active Title VI program which is reviewed by TDOT Civil Rights Office on a triennial basis. The most recent Title VI assessment report submitted to TDOT in July 2013 can be found on the website at http://jcmpo.org/civilrights.html. The report will be updated per TDOT's schedule. The webpage currently provides contact information for the Title VI coordinator and ADA coordinator, along with forms for the complaint process. All projects using federal highway and transit funds for the Johnson City MTPO comply with Title VI, Environmental Justice and the Americans with Disabilities Act (ADA).

Federal Planning Factors and Federal Initiatives

Federal transportation legislation defines ten specific planning factors to be considered when developing transportation plans and programs in MPO areas. The planning factors are found in Title 23 of the United States Code, Section 134(h). The Johnson City MTPO will continue incorporating the ten federal planning factors and associated federal initiatives into the works tasks and resulting products provided for in this UPWP. The ten planning factors and related federal initiatives are:

- 1. Economic Vitality Support the economic vitality of the metropolitan area, especially by enabling global competitiveness, productivity, and efficiency.
 - Associated Federal Initiatives:
 - Transportation Performance Management
 - Economic Development
 - Financial Planning and Forecasting
 - o Multimodal and intermodal freight planning and performance
 - Public Private Partnerships
 - Strategic Highway Research Program (SHRP)
 - Every Day Counts (EDC)
- 2. System Safety Increase the safety of the transportation system for motorized and nonmotorized users.
 - Associated Federal Initiatives:
 - Transportation Safety Planning and Performance

- 3. System Security Increase the security of the transportation system for motorized and nonmotorized users.
 - Associated Federal Initiatives:
 - Disaster Preparedness and Continuity of Operations (COOP) Planning
 - Climate Trends and Extreme Weather
- 4. Accessibility & Mobility Increase the accessibility and mobility of people and freight.
 - Associated Federal Initiatives:
 - o Access Management and Corridor Management
 - ADA Accessibility
 - Congestion Management, Travel Time Reliability, and System Performance
 - o Active Transportation and Transportation Alternatives
 - Multimodal and intermodal freight planning and performance
- 5. Enhance Environment 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.
 - Associated Federal Initiatives:
 - o Livability
 - o Sustainability
 - o Title VI and Environmental Justice
 - Planning and Environmental Linkages (PEL)
 - Air Quality and Public Health
 - Integrating Transportation and Land Use
- 6. Integration and Connectivity Enhance the integration and connectivity of the transportation system, across and between modes throughout the metropolitan region, for people and freight.
 - Associated Federal Initiatives:
 - Active Transportation and Transportation Alternatives
 - o Multimodal and Intermodal Freight Planning and Performance
- 7. System Management and Operations Promote efficient system management and operation.
 - Associated Federal Initiatives:
 - Planning For Operations
 - Congestion Management, Travel Time Reliability, and System Performance
 - Transportation System Management and Operations (TSMO)
- 8. System Preservation Emphasize the preservation of the existing transportation system.
 - Associated Federal Initiatives:
 - Asset Management
 - Pavement and Bridge Performance

- 9. System Resiliency Improve the resiliency and reliability of the transportation system and reduce or mitigate stormwater impacts of surface transportation.
 - Associated Federal Initiatives:
 - Sustainability
 - Transportation Safety Planning and Performance
 - Climate Trends and Extreme Weather

10. Travel & Tourism – Enhance travel and tourism.

• Associated Federal Initiatives:

- Transportation Performance Management
- Economic Development
- o Livability

The UPWP is organized into work tasks. Table 3 below illustrates each of the planning factors and summarizes which of the work tasks address that factor.

Table 3

Summary of Planning Factors Matrix

			Та	sks		
Planning Factors	Task A1 – Admin Activities	Task A2 – Data Inventories	Task B – LRTP	Task C – TIP	Task D – Transit Planning	Task E – Vehicle Procurement
Economic Vitality	\checkmark	\checkmark	\checkmark	\checkmark	\checkmark	<mark>√</mark>
System Safety	\checkmark	\checkmark	\checkmark	\checkmark		 ✓
System Security	\checkmark	\checkmark	\checkmark	\checkmark		 ✓
Accessibility & Mobility		\checkmark	\checkmark	\checkmark	\checkmark	 ✓
Enhance Environment			\checkmark	\checkmark	\checkmark	 ✓
Integration & Connectivity	\checkmark	\checkmark	\checkmark	\checkmark	\checkmark	✓
System Management & Operations	\checkmark	\checkmark	\checkmark	\checkmark	\checkmark	 ✓
System Preservation		\checkmark	\checkmark	\checkmark	\checkmark	 ✓
System Resiliency	\checkmark	\checkmark	\checkmark	\checkmark		 ✓
Travel & Tourism	\checkmark	\checkmark	\checkmark	\checkmark	\checkmark	✓

Federal Planning Emphasis Areas

The U.S. DOT has also identified three Planning Emphasis Areas that the Johnson City MTPO will incorporate into the work tasks and resulting products provided for in this UPWP.

1. Models of Regional Planning Cooperation

The Johnson City MTPO will promote cooperation and coordination across MPO boundaries to ensure a regional approach to transportation planning. A memorandum of agreement (MOA) between the Johnson City MTPO and the Kingsport MTPO designates that the Johnson City MTPO will conduct planning activities in the portion of the Kingsport Urbanized Area which is currently within the Johnson City city limits. The Kingsport and Johnson City Urbanized Areas are adjacent and the Johnson City MTPO MPA boundary extends into the Kingsport Urbanized Area. The MOA defines the planning responsibilities for each MTPO MPA boundary.

The three MPOs in the Tri-Cities area, which are Bristol, Kingsport and Johnson City, are also working together to promote regional transit planning through meetings that involve all three MPOs, all three urban transit providers, the rural transit provider, along with elected officials and administrators from 16 jurisdictions. This transit planning process will determine how to best provide transportation for people who live inside the urbanized areas but outside the urban transit providers' service areas.

2. Access to Essential Services

The Johnson City MTPO, as part of the transportation planning process, will identify transportation connectivity gaps in access to essential services. The Coordinated Public Transit – Human Services Transportation Plan is a joint effort of the Johnson City MTPO and Johnson City Transit that identify gaps in transit services and determines cost effective improvements that result in a better transit system. It should be noted not all gaps may be met due to funding limitations. However, the opportunity to coordinate between transit systems, service providers, and other human services agencies is crucial in planning an efficient system focusing the services on the population in need of transit. In addition, the Johnson City MTPO will finalize a revision to the PPP by the end of FY 2016.

3. MAP-21 and FAST Act Implementation

Once the U.S. DOT has issued the final rule regarding the performance framework and TDOT and the Johnson City MTPO has set performance targets, the Johnson City MTPO will participate in the development and implementation of a performance management approach to transportation planning and programming, which will include the development and use of performance measures, target setting, performance reporting, and transportation investments that support the achievement of performance targets. These components will ensure achievement of transportation system performance outcomes. Table 4 below illustrates each of the emphasis areas and summarizes which of the work tasks meet that factor.

Table 4

Summary of Emphasis Areas Matrix

	Tasks					
Emphasis Areas	Task A1 – Admin Activities	Task A2 – Data Inventories	Task B – LRTP	Task C – TIP	Task D – Transit Planning	Task E – Vehicle Procure ment
Models of Regional Cooperation	\checkmark		\checkmark	\checkmark	\checkmark	<mark>√</mark>
Access to Essential Services			\checkmark	\checkmark	\checkmark	✓
MAP-21 / FAST Act Implementation	\checkmark	\checkmark	\checkmark	\checkmark	\checkmark	 ✓

Work Program

Task A1 – Administrative Activities (PL 112)

Responsible Agencies: Johnson City MTPO, TDOT – Long Range Planning Division, Office of Local Programs, Program Development Division and the Division of Multimodal Transportation Resources, FHWA, FTA

Purpose: (Johnson City MTPO and TDOT) To conduct continuing, cooperative, and comprehensive transportation planning activities consistent with the MPA's comprehensive general plans and ensure that all transportation projects meet federal and state requirements.

Previous Work: This is a continuing work activity. However, the following accomplishments were made in FY 2017:

For the Johnson City MTPO:

- Maintained FY 2017-2018 UPWP by completing an amendment;
- Developed and submitted FY 2018 UPWP;
- Held several Executive Board and Staff meetings;
- Attended meetings held by First Tennessee Rural Planning Organization (RPO), Tennessee Model Users Group (TNMUG), Tennessee MPO Conference, Tennessee Highway Operations Safety Conference, National Highway Institute course, LiDAR training, Tennessee Geographical Information Council Conference, and Region 1 Freight Advisory Council meeting and other meetings with TDOT staff; and
- Conducted annual maintenance of the Johnson City Regional ITS Architecture.

Activities for FY 2018

For the Johnson City MTPO:

- Continue to facilitate better coordination with the TDOT Office of Local Programs for the implementation of projects as they relate to the LRTP and TIP with member jurisdictions;
- Attend FHWA, TDOT, and other sponsored training and workshops, as available, to improve and maintain proficiency in the field;
- Attend FHWA and TDOT performance-based planning training and meetings to assist in setting performance targets for the Johnson City MTPO;
- Work with FHWA, FTA and TDOT to set performance targets;
- Continue to coordinate and develop outreach activities for the Title VI Program;
- Work with TDOT, FHWA, and FTA to prepare and submit technical reports (Financial Quarterly Reports);
- Maintain the FY 2018 UPWP for any necessary amendments or adjustments;

- Develop and submit the FY 2019 UPWP;
- Check for effectiveness of the PPP and make modifications if needed;
- Attend meetings of the Johnson City MTPO, First Tennessee RPO, TNMUG, local, regional, state, and federal sponsored meetings related to transportation planning as needed;
- Update and maintain any required Memorandums of Understanding with other MPOs or agencies;
- Facilitate Traffic Incident Management activities with regional first responders to enance safety, reduce traffic congestion, and reduce secondary traffic crashes on highways;
- Maintain the Johnson City ITS Regional Architecture;
- Prepare and maintain Johnson City MTPO committee contact lists as needed;
- Relay information about meetings and updates to all Executive Board and Executive Staff members;
- Review and submit various contractual documents;
- Update By-Laws and Prospectus as needed; and
- Purchase of items & services, such as office supplies and computers, necessary for day to day operations.

For TDOT:

The Long Range Planning Division, Tennessee Department of Transportation, will work jointly with the MPO to establish the required administrative and technical procedures and prepare contractual agreements. In addition, the Long Range Planning Division will attend technical and policy board meetings, distribute information on federal transportation planning guidelines and requirements, conduct seminars and work sessions, review the MPO's transportation planning studies and reports, and undertake general administrative activities.

The TDOT Office of Local Programs will coordinate, review and assist the Johnson City MTPO in maintenance of the TIP as it relates to the successful implementation and deployment of local projects. The Office of Local Programs will coordinate projects with FHWA on behalf of the Johnson City MTPO and participate in Johnson City MTPO meetings.

The Multimodal Transportation Resources Division, Tennessee Department of Transportation, will administer state and federal programs regarding river transportation, urban public transportation, rail service, ride-sharing, and transportation systems management. Representatives of this office will participate in MPO meetings, distribute federal transit guidelines and requirements, conduct seminars and work sessions, and review MPO studies and reports. This office will coordinate FTA Section 5303, 5307 and 5310 funding programs in Tennessee. It should be noted that there are no "navigable rivers" in the Johnson City MTPO MPA; however, there are two class 1 and one class 3 railroads.

End Products (Schedule)

End Product	By Whom	When
FY 2018 UPWP Activities	Johnson City MTPO Staff	Ongoing
Contracts and Agreements	Johnson City MTPO Staff	As Needed
Day to Day Operations	Johnson City MTPO Staff	Ongoing
Travel to Meetings & Workshops	Johnson City MTPO Staff	As Needed
Executive Board & Staff Meetings	Johnson City MTPO Staff	As Needed
Title VI Report submitted to TDOT Civil Rights Office	Johnson City MTPO Staff	Per TDOT Schedule
Traffic Incident Management meetings	Johnson City MTPO Staff	As Needed
Evaluate and maintain Public Participation Plan, as needed	Johnson City MTPO Staff	Ongoing
Set performance targets for the Johnson City MTPO	Johnson City MTPO Staff	December 2017
Quarterly Invoices and Progress Reports	Johnson City MTPO Staff	November 2017, February, May and August 2018
Update FY 2018 UPWP, as needed	Johnson City MTPO Staff	August 2018
Develop, adopt and submit FY 2019 UPWP	Johnson City MTPO Staff	August 2018

Planning Factors Considered: This task considers seven of the ten FAST Act Planning Factors, as shown in Table 3 on page 16, while conducting administrative activities, which are Economic Vitality, System Safety, System Security, Integration and Connectivity, System Management and Operations, System Resiliency, and Travel and Tourism. This task also considers two of the Federal Emphasis Areas, which are Models of Regional Cooperation and MAP-21/FAST Act Implementation.

Budget and Funding Source

Task A1 – Adm	inistrative Act	tivities – FY 2018	– Consolidat	ed Planning Gr	ant	
CPG –	Local	Johnson City	State	State SPR	State SPR	Total
PL 112	Match	MTPO Total	SPR	Match	Total	
<mark>(80%)</mark>	<mark>(20%)</mark>					
\$112,000	\$28,000	\$140,000	\$10,702	\$2,676	\$13,378	\$153,378

Task A2 – Maintenance of Data Inventories and Surveillance (PL 112)

Responsible Agencies: Johnson City MTPO, TDOT – Long Range Planning Division

Purpose

For the Johnson City MTPO:

- Inventory of transportation, demographic, and land-use data;
- Johnson City MTPO Urbanized Area and MPA boundaries;
- Database development;
- Maintenance and improvement of equipment necessary for data inventories; and
- Maintenance of the Johnson City MTPO website for dissemination of information.

For TDOT: Inventory of Transportation Data

Previous Work: This is a continuing work activity. However, the following accomplishments were made in FY 2017:

For the Johnson City MTPO:

- Collection and analysis of the following data on a local and regional basis for input into the LRTP update, TIP, and performance targets for the Johnson City MTPO:
 - Population datasets from the 2010 Census, American Community Survey and other Census Bureau products;
 - o Commuter patterns;
 - Bicycle and pedestrian facilities;
 - Freight information;
 - o Land use;
 - o Traffic data;
 - Crash data; and
 - Access to the Enhanced Tennessee Roadway Information Management System (ETRIMS), which is TDOT's roads database;
- Purchased commercial data products, ReferenceUSA, which is a national database of different types of demographic and employment data, of which was analyzed and provided to the consultant for use in the travel demand model to assist with determining employment projections;
- Provided TDOT with a proposal for Crucial Urban Freight Corridor, using ArcGIS to create a map and shapefiles to submit for inclusion in the National Highway Freight Network;
- Received delivery of completed GIS data for the MTPO area from the United States' Geological Survey Division 3D Elevation Program (3DEP);
- Participated in the acquisition of a city-wide Esri Enterprise license for access to a variety of applications and ArcGIS Online; and

• Maintained the Johnson City MTPO website with all documents, meetings, public notices, procurement, and upcoming events for public viewing.

For TDOT:

- Traffic volumes were collected annually throughout the Johnson City MTPO MPA by TDOT;
- Special count data collected for design projects as required;
- Crash data from Tennessee Department of Safety coded and filed; and
- High hazard accident data furnished for safety studies as needed.

Activities for FY 2018

For the Johnson City MTPO:

- Update and purchase/collect data on traffic, freight, bicycle and pedestrian facilities, population, land use, and socioeconomic data, if available and needed;
- Collect and/or organize crash and safety data to assist with creating a performance-based planning framework through the Tennessee Integrated Traffic Analysis Network (TITAN) database and ETRIMS;
- Maintain databases necessary for the LRTP, Travel Demand Model, and any other data that may need to be purchased. This would also include any data needed for any potential air quality attainment changes;
- Regional traffic count information is maintained (via interactive mapping system) on the Johnson City MTPO website via a link to the TDOT statewide count information and also downloaded and shown in an ArcGIS Online map;
- Maintain databases and mapping systems capable of storing, retrieving, correlating, analyzing, and displaying geographic information. This includes purchases of equipment needed by the Johnson City MTPO for storing data and for display purposes for various visualization techniques;
- Although TDOT collects traffic count data at established stations, special traffic counts may be conducted by the local agencies within the Johnson City MTPO MPA, which may require the purchase of special equipment;
- Continual updating of Johnson City MTPO website to provide up to date information and enhanced access to transportation planning products to the public and Johnson City MTPO member agencies;
- Update the website with a new template that will meet mobile users' needs and accessibility requirements;
- Updating and maintenance of data including products for GIS analysis and advanced visualization techniques for the Johnson City MTPO and website;
- Utilize professional services to assist in data collection, organization, traffic count, collection, and maintenance of GIS databases, as needed;
- Maintain license for existing software: Travel Demand Model, GIS, Global Position System (GPS) data collection units, and visualization software such as Google Earth Pro, website development software, and other software packages;

- Maintain the database for TransCAD model, which includes economic, population and socioeconomic data, for the future update of the LRTP and TIP. This would include purchase of databases if available; and
- Update and maintain the functional classification system for the Johnson City MTPO MPA.

For TDOT:

- Continue to collect annual traffic count data at established stations;
- Conduct special traffic counts as needed for planning and design projects;
- Maintain accident file and furnish high hazard listings and other safety data as required; and
- Travel time studies will be conducted if needed for special studies.

End Products (Schedule)

End Product	By Whom	When
Local and Regional Population and Land Use Data	Johnson City MTPO Staff	As Needed
Purchase or collect socioeconomic data, if available	Johnson City MTPO Staff	As Needed
Collect and/or organize data for performance-based planning framework	Johnson City MTPO Staff	As Needed
Maintain Johnson City MTPO website at <u>http://www.jcmpo.org</u>	Johnson City MTPO Staff	Ongoing
Obtain new website template to meet mobile users' needs and accessibility requirements	Johnson City MTPO Staff	By end of FY 2018
Maintain software licenses (GIS, Travel Demand Model, etc)	Johnson City MTPO Staff	Annually
3D Elevation Data analyzed	Johnson City MTPO Staff; State of Tennessee Staff	Ongoing for analysis
Maintenance of Functional Classification System	Johnson City MTPO Staff	Ongoing
Develop maps of Urbanized Area, MPA, demographics, Functional Classification System, and other maps as needed	Johnson City MTPO Staff	As Needed
Database Management for the Travel Demand Model	Johnson City MTPO Staff	Ongoing
Traffic Counts (including peak hour volumes, vehicle	TDOT Staff Johnson City MTPO Staff	September – November

classification, directional distribution, etc)		
Vehicle Miles Traveled (VMT)	TDOT Staff	Ongoing
Accident Data	TDOT Staff	Ongoing

Planning Factors Considered: This task considers nine of the ten FAST Act Planning Factors, as shown in Table 3 on page 16, while collecting and analyzing data, which are Economic Vitality, System Safety, System Security, Accessibility and Mobility, Integration and Connectivity, System Management and Operations, System Preservation, System Resiliency, and Travel and Tourism. This task also considers one of the Federal Emphasis Areas, which is MAP-21/FAST Act Implementation.

Budget and Funding Source

Task A2 – N	laintenance of Da	ata Inventories &	Surveillance	– FY 2018 –	Consolidated Pla	nning Grant
CPG –	Local	Johnson City	State SPR	State SPR	State SPR	Total
PL 112	Match	MTPO Total		Match	Total	
<mark>(80%)</mark>	<mark>(20%)</mark>					
\$88,000	0 \$22,000	\$110,000	\$12,806	\$3,202	\$16,009	\$126,008

Task B – Long Range Transportation Plan – Maintenance (PL 112)

Responsible Agencies: Johnson City MTPO, TDOT – Long Range Planning Division

Purpose: (Johnson City MTPO and TDOT) To provide a continuously updated comprehensive transportation plan that will provide for the long-range transportation needs of the Johnson City MTPO MPA.

Previous Work:

- The Johnson City MTPO continued to maintain the 2040 LRTP that was adopted by the Johnson City MTPO Executive Board on March 13, 2013; and
- Continued work with the consultant chosen to update the LRTP and the travel demand model;
- Held community planning meetings to go over growth areas and population projections;
- Held public participation activities for input into the LRTP, including community meetings and surveys;
- The final travel demand model was approved by TDOT (anticipated in July 2017); and
- Prepared a final draft of the LRTP (anticipated by the end of August 2017).

Activities for FY 2018

For the Johnson City MTPO:

- Maintain the 2040 LRTP and make any necessary adjustments or amendments (As needed);
- Continue the state and federal review process of the 2045 LRTP;
- Conduct the public review process of the 2045 LRTP;
- Adopt the 2025 LRTP by March 2018;
- Ensure all projects within the current TIP comply with the 2040 LRTP and the 2045 LRTP;
- Attend any workshops or class that may be beneficial for updating the future LRTP;
- Update LRTP with performance measures that comply with U.S. DOT's performance framework, TDOT's performance targets and Johnson City's performance targets;
- Assist TDOT with maintaining Statewide LRTP;
- Make any necessary updates to the current LRTP for requirements issued by new transportation authorizations; and
- If future air quality standards change and affect the Johnson City MTPO MPA, the Johnson City MTPO will update or develop necessary plans, models, and documents to make the Johnson City MTPO MPA air quality compliant. (Note: At this time, the Johnson City MTPO MPA is in attainment status).

End Products (Schedule)

End Product	By Whom	When
Maintain 2040 LRTP with amendments and adjustments	Johnson City MTPO Staff	As Needed
Continue the state and federal review process of the draft 2045 LRTP that began in FY 2017	Johnson City MTPO Staff; Consultant; TDOT Staff; FHWA/ FTA Staff	October 2017 – January 2018
Begin the public review process of the draft 2045 LRTP	Johnson City MTPO Staff; Consultant	January/February 2018
Adopt the final 2045 LRTP	Johnson City MTPO Staff; Consultant; Executive Board	March 2018

Planning Factors Considered: All ten FAST Act Planning Factors are considered when making any updates to the LRTP, which are Economic Vitality, System Safety, System Security, Accessibility and Mobility, Enhance Environment, Integration and Connectivity, System Management and Operations, System Preservation, System Resiliency, and Travel and Tourism. This task also considers all three of the Federal Emphasis Areas, which are Models of Regional Cooperation, Access to Essential Services and MAP-21/FAST Act Implementation.

Budget and Funding Source

Task B – Long	Task B – Long Range Transportation Plan Maintenance – FY 2018 – Consolidated Planning Grant													
CPG –	Local	Johnson City	State SPR	State SPR	State SPR	Total								
PL 112	Match	MTPO Total		Match	Total									
<mark>(80%)</mark>	<mark>(20%)</mark>													
\$76,000	\$19,000	\$95,000	\$28,632	\$7,158	\$35,790	\$130,790								

Task C – Transportation Improvement Program – Maintenance (PL 112)

Responsible Agency: Johnson City MTPO, JCT

Purpose: To prepare and maintain an accurate, timely, and fiscally constrained TIP.

Previous Work

For the Johnson City MTPO:

- Adjustments and amendments were completed as needed to the FY 2014-2017 TIP;
- Adopted the FY 2017-2020 TIP;
- Adjustments and amendments were completed as needed to the FY 2017-2020 TIP; and
- Annual Listing of Obligated Projects for FY 2016 was made available to the public.

Activities for FY 2018

For the Johnson City MTPO:

- Maintain the accuracy of the FY 2017-2020 TIP through amendments and adjustments when necessary while remaining fiscally constrained;
- Coordinate existing TIP projects with local, state, and federal agencies;
- Continue to explore INVEST for large projects in the Johnson City MTPO MPA; and
- Publish the FY 2017 Annual Listing of Obligated Projects (December 2017).

End Products (Schedule)

End Products	By Whom	When
Update FY 2017-2020 TIP with amendments and adjustments	Johnson City MTPO Staff	As Needed
FY 2017 Annual Listing of Obligated Projects will be made available	Johnson City MTPO Staff	December 2017

Planning Factors Considered: All ten FAST Act Planning Factors will be considered during the development and maintenance of the TIP, which are Economic Vitality, System Safety, System Security, Accessibility and Mobility, Enhance Environment, Integration and Connectivity, System Management and Operations, System Preservation, System Resiliency, and Travel and Tourism. This task also considers all three of the Federal Emphasis Areas, which are Models of Regional Cooperation, Access to Essential Services and MAP-21/FAST Act Implementation.

Budget and Funding Source

Task C – Trans	Task C – Transportation Improvement Program – Maint. – FY 2018 – Consolidated Planning Grant													
CPG –	Local	Johnson City	State SPR	State SPR	State SPR	Total								
PL 112	Match	MTPO Total		Match	Total									
<mark>(80%)</mark>	<mark>(20%)</mark>													
\$20,000	\$5 <i>,</i> 000	\$25,000	\$0	\$0	\$0	\$25,000								

Task D – Transit Planning (Section 5303)

Responsible Agencies: Johnson City MTPO, JCT, TDOT, FTA

Purpose: To collect, analyze, and store data necessary for conducting a viable transit planning process. To administer funds, coordinate planning activities, and to encourage citizen knowledge and awareness of public and private transit services.

Previous Work

For the Johnson City MTPO and JCT:

- Maintained data from previous transit studies and the U.S. Census Bureau, such as 2010 Census and American Community Survey;
- Assisted JCT with maintenance of records of ridership, fare revenue, and cost by route;
- Assisted JCT with training new staff members;
- Collected census data information to assist in the development of plans, including the LRTP and TIP;
- Johnson City MTPO assisted JCT with surveying transit passengers and human service agencies to collect data for the update to the 2045 LRTP and Coordinated Public Transit Human Services Transportation Plan update;
- Johnson City MTPO assisted JCT with an update to the Coordinated Public Transit Human Services Transportation Plan, which was completed in March 2017;
- JCT provided the Johnson City MTPO with performance targets for Transit Asset Management;
- Hired a consultant to conduct a comprehensive operational analysis for JCT;
- Hired a consultant to assist JCT with a medium-duty bus procurement package;
- Participated in regional transit planning meetings and discussions; and
- Conducted public participation activities for transit projects in the LRTP and TIP.

Activities for FY 2018

For the Johnson City MTPO and JCT:

- Continue to collect data that includes information on the elderly, disabled, and low-income populations;
- Continue to collect data on socioeconomic patterns, population density, financial costs, revenues, and ridership characteristics;
- Data collection and analysis techniques include patron surveys, GIS analysis, data collected by mobile data terminals on transit vehicles, and other methods;
- Continue to maintain database on JCT's bus stop inventory, bus routes, bus schedules, and other public transit data relevant to the GIS database;

- Transit activities associated with Disadvantaged Business Enterprise, Equal Employment Opportunity, and Title VI programs, and specialized programs for the elderly and disabled, including programs associated with the ADA will be ongoing throughout the year;
- Assist FTA, TDOT, and local transit providers in the development of public transportation plans, such as performance measures, development plans or safety plans, based on MAP-21 and FAST Act provisions;
- Continue to coordinate to include transit ITS projects in updates to the Johnson City Regional ITS Architecture;
- Continue to assist with TIP and LRTP additions, adjustments, amendments, and public participation on transit projects, including projects funded with FTA Section 5307, 5309, 5310, 5339 and the state's Urban Operating Assistance Program (UROP);
- Assist JCT by using TBEST for transit demand modeling and planning;
- Conduct quarterly meetings with local transit agencies, both urban and rural, along with TDOT Mulitmodal staff, to review ridership and operating trends to facilitate increase use of transit services;
- The Johnson City MTPO will continue to assist JCT by utilizing professional services to complete a comprehensive operational analysis of JCT's system;
- The Johnson City MTPO will continue to assist JCT by utilizing professional services to complete technical specifications to be used in the procurement process (Request for Proposal) for replacement buses in the JCT fleet that have reached the end of their useful life cycle;
- Continue to be a stakeholder in the regional transit planning meetings and discussions; and
- Continue to be a stakeholder in the First Tennessee District Regional Coordinated Human Services Plan by working with TDOT and its consultant to assess transportation needs and identify gaps in public transportation.

End Product	By Whom	When
Quarterly Invoices and Progress Reports	Johnson City MTPO Staff	November, February, May, and August
Review and Submit Multimodal Access Grants, if received	Johnson City MTPO Executive Board	December 2017
Participate in regional transit planning meetings and discussions	Johnson City MTPO Staff	Ongoing
Utilize TBEST for transit demand modeling and planning	Johnson City MTPO Staff; JCT Staff	Ongoing
Complete comprehensive operational analysis of JCT	Johnson City MTPO Staff; JCT Staff; Consultant	December 2017
Complete development of technical specifications for bus purchase for JCT	Johnson City MTPO Staff; JCT Staff; Consultant	December 2017

End Products (Schedule)

Planning Factors Considered: This task considers seven of the ten FAST Act Planning Factors, as shown in Table 3 on page 16, during the transit planning process, which are Economic Vitality, Accessibility and Mobility, Enhance Environment, Integration and Connectivity, System Management and Operations, System Preservation, and Travel and Tourism. This task also considers all three of the Federal Emphasis Areas, which are Models of Regional Cooperation, Access to Essential Services and MAP-21/FAST Act Implementation.

Budget and Funding Source

Task D – Tra	Task D – Transit Planning – FY 2018 - (FY 2016 funds prior to CPG)												
Sec.	TDOT	Local	Johnson	State	State	State	Total						
5303	Match	Match	City MTPO	SPR SPR		SPR							
<mark>(80%)</mark>	<mark>(10%)</mark>	<mark>(10%)</mark>	Total		Match	Total							
\$56,203	\$7,026	\$7,026	\$70,255	\$0	\$0	\$0	\$70,255						

Task D – Tra	Task D – Transit Planning – FY 2018 – Consolidated Planning Grant											
CPG –	TDOT	<mark>Local</mark>	<mark>Johnson</mark>	<mark>State</mark>	<mark>State</mark>	<mark>State</mark>	Total					
<mark>Sec. 5303</mark>	<mark>Match</mark>	<mark>Match</mark>	<mark>City MTPO</mark>	<mark>SPR</mark>	<mark>SPR</mark>	<mark>SPR</mark>						
<mark>(80%)</mark>	<mark>(10%)</mark>	<mark>(10%)</mark>	Total		<mark>Match</mark>	<mark>Total</mark>						
<mark>\$50,378</mark>	<mark>\$6,297</mark>	<mark>\$6,297</mark>	<mark>\$62,972</mark>	<mark>\$0</mark>	<mark>\$0</mark>	<mark>\$0</mark>	<mark>\$62,972</mark>					

Task D – Tra	Task D – Transit Planning – FY 2018 – Grand Total of all funds										
Sec.	TDOT	<mark>Local</mark>	<mark>CPG –</mark>	TDOT	<mark>Local</mark>	<mark>Johnson City</mark>					
<mark>5303</mark>	<mark>Match</mark>	<mark>Match</mark>	n <mark>Sec. 5303 Match Match</mark>		MTPO Grand						
<mark>(80%)</mark>	<mark>(10%)</mark>	<mark>(10%)</mark>	<mark>(80%)</mark>	<mark>(10%)</mark>	<mark>(10%)</mark>	<mark>Total</mark>					
<mark>\$56,203</mark>	<mark>\$7,026</mark>	<mark>\$7,026</mark>	<mark>\$50,378</mark>	<mark>\$6,297</mark>	<mark>\$6,297</mark>	<mark>\$133,227</mark>					

Task E – Vehicle Procurement

Responsible Agency: Johnson City MTPO

Purpose: To procure a vehicle for the use of MTPO Staff.

Activities for FY 2018

For the Johnson City MTPO:

- Vehicle will be procured using previously available funds in the grant contract but not programmed in the UPWP to replace the current vehicle that is used exclusively by MTPO staff;
- Review statewide contracts for available vehicles in the SUV category;
- Complete the procurement of a vehicle by September 2018;
- The following additional steps will be taken; however, these charges will be paid for by the City of Johnson City:
 - \circ Add the vehicle as covered under the City of Johnson City's auto insurance company; and
 - Maintain the vehicle through the City of Johnson City's Motor Transport Division according to the maintenance schedule.

End Products (Schedule)

End Products	By Whom	When
Procure staff vehicle	Johnson City MTPO Staff	<mark>By September 2018</mark>

Planning Factors Considered: All ten FAST Act Planning Factors will be considered during the development and maintenance of the TIP, which are Economic Vitality, System Safety, System Security, Accessibility and Mobility, Enhance Environment, Integration and Connectivity, System Management and Operations, System Preservation, System Resiliency, and Travel and Tourism. This task also considers all three of the Federal Emphasis Areas, which are Models of Regional Cooperation, Access to Essential Services and MAP-21/FAST Act Implementation.

Budget and Funding Source

Task E – Vehic	Task E – Vehicle Procurement – FY 2018 – Consolidated Planning Grant											
CPG –	<mark>Local</mark>	<mark>Johnson City</mark>	<mark>State SPR</mark>	State SPR	<mark>State SPR</mark>	Total						
PL 112	<mark>Match</mark>	MTPO Total		Match	Total							
<mark>80%</mark>	<mark>20%</mark>											
<mark>\$24,000</mark>	<mark>\$6,000</mark>	<mark>\$30,000</mark>	<mark>\$0</mark>	<mark>\$0</mark>	<mark>\$0</mark>	<mark>\$30,000</mark>						

Contingency

Responsible Agency: Johnson City MTPO

Purpose: This line item will be available to support any cost overruns or new projects for the FY 2018 work program. Use of the contingency fund will require an amendment to the UPWP, which requires approval by the Johnson City MTPO Executive Board, along with TDOT and FHWA/FTA.

Budget and Funding Source

CONSOLIDATED PLANNING GRANT											
	FHWA	LOCAL									
	PL 112	MATCH									
AGENCY	<mark>80%</mark>	<mark>20%</mark>	TOTAL								
Federal	\$20,000	\$0	\$20,000								
State	\$0	\$0	\$0								
MPO	\$0	\$0 \$5,000 \$5									
TOTAL	\$20,000	\$5,000	\$25,000								

Contingency Fiscal Year 2018

Budget Summary – Funding Sources

Table 5 Funding Sources- Johnson City Urban Area Fiscal Year 2018

			CONSOLIDATED PLANNING GRANT					FEDERAL TRANSIT ADMINISTRATION (FY 2016 funds prior to CPG)			STATE PLANNING & RESEARCH	
	TASK	<mark>FHWA</mark> PL 112 <mark>80%</mark>	LOCAL MATCH <mark>20%</mark>	FTA Sec. 5303 80%	TDOT MATCH 10%	LOCAL MATCH 10%	FTA Sec. 5303 <mark>80%</mark>	TDOT MATCH <mark>10%</mark>	LOCAL MATCH <mark>10%</mark>	SPR <mark>80%</mark>	TDOT MATCH <mark>20%</mark>	TOTAL
A1.	Administration	\$112,000	\$28,000	\$0	\$0	\$0	\$0	\$0	\$0	\$10,702	\$2,676	\$153,378
A2.	Data Inventories	\$88,000	\$22,000	\$0	\$0	\$0	\$0	\$0	\$0	\$12,806	\$3,202	\$126,008
в.	LRTP	\$76,000	\$19,000	\$0	\$0	\$0	\$0	\$0	\$0	\$28,632	\$7,158	\$130,790
C.	ТІР	\$20,000	\$5,000	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$25,000
D.	Transit Planning	\$0	\$0	<mark>\$50,378</mark>	<mark>\$6,297</mark>	<mark>\$6,297</mark>	\$56,203	\$7,026	\$7,026	\$0	\$0	\$133,227
<mark>E.</mark>	Vehicle Procurement	<mark>\$24,000</mark>	<mark>\$6,000</mark>	<mark>\$0</mark>	<mark>\$0</mark>	<mark>\$0</mark>	<mark>\$0</mark>	<mark>\$0</mark>	<mark>\$0</mark>	<mark>\$0</mark>	<mark>\$0</mark>	<mark>\$30,000</mark>
	TOTAL	<mark>\$320,000</mark>	<mark>\$80,000</mark>	<mark>\$50,378</mark>	<mark>\$6,297</mark>	<mark>\$6,297</mark>	\$56,203	\$7,026	\$7,026	\$52,140	\$13,036	<mark>\$598,403</mark>
Cont	ingency	\$20,000	\$5,000	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$25,000

Budget Summary – Agency Participation

Table 6 Agency Participation- Johnson City Urban Area Fiscal Year 2018

TASK		TDOT/SPR	MPO	TOTAL	
A1.	Administration	\$13,378	\$140,000	\$153,378	
A2.	Data Inventories	\$16,008	\$110,000	\$126,008	
В.	Long Range Planning	\$35,790	\$95,000	\$130,790	
С.	TIP	\$0	\$25,000	\$25,000	
D.	Transit Planning	<mark>\$13,323</mark>	<mark>\$119,904</mark>	<mark>\$133,227</mark>	
<mark>E.</mark>	Vehicle Procurement	<mark>\$0</mark>	<mark>\$30,000</mark>	<mark>\$30,000</mark>	
	TOTAL	<mark>\$78,499</mark>	<mark>\$519,904</mark>	<mark>\$598,403</mark>	

Budget Summary – Agency Participation by Funding Source

Table 7Agency Participation by Funding SourceFiscal Year 2018

	CONSOLIDATED PLANNING GRANT				FEDERAL TRANSIT ADMINISTRATION (FY 2016 funds prior to CPG)		STATE PLANNING & RESEARCH				
AGENCY	FHWA PL 112 <mark>80%</mark>	LOCAL MATCH <mark>20%</mark>	FTA SEC. 5303 <mark>80%</mark>	TDOT MATCH <mark>10%</mark>	LOCAL MATCH <mark>10%</mark>	FTA SEC. 5303 80%	TDOT MATCH 10%	LOCAL MATCH 10%	SPR 80%	TDOT MATCH 20%	TOTAL
TDOT - PD*	\$0	\$0	\$0	<mark>\$6,297</mark>	\$0	\$0	\$7,026	\$0	\$52,140	\$13,036	<mark>\$78,499</mark>
МРО	<mark>\$320,000</mark>	<mark>\$80,000</mark>	<mark>\$50,378</mark>	<mark>\$0</mark>	<mark>\$6,297</mark>	\$56,203	\$0	\$7,026	\$0	\$0	<mark>\$519,904</mark>
TOTAL	<mark>\$320,000</mark>	<mark>\$80,000</mark>	<mark>\$50,378</mark>	<mark>\$6,297</mark>	<mark>\$6,297</mark>	\$56,203	\$7,026	\$7,026	\$52,140	\$13,036	<mark>\$598,403</mark>

* PD = Program Development

Appendix A – Criteria for TIP Project Selection

The Johnson City MTPO considered several factors that were important to the MTPO area. They are as follows: clean air, existing plans, the aging population, maintaining existing roads, the State LRTP, growth areas, connectivity, rail, Title VI, economic development, transportation mode choices, route choices, congestion, and safety. These factors were then used to develop criteria for the selection of projects for the Local STP funding. The Johnson City MTPO Executive Staff reviews the projects submitted for Local STP funding. They then rank the projects using weighted criteria (see below) and develop a recommendation for the Johnson City MTPO Executive Board. The Executive Board will adopt the ranking of the projects if they feel the ranking is suitable. The Executive Board may choose to amend or reorder the ranking of the projects before adopting.

Criteria	Points available		
CONSISTENCY WITH PLANS			
In previous TIP or related project in TIP	15		
Consistent with growth plan/land use plans	8		
CONGESTION MANAGEMENT			
Reduces/manages travel demand (TDM)	8		
Improves traffic operations (ITS)	10		
Transit capital improvement	2		
Alternative Mode (incl. Bike/Pedestrian and other modes)	5		
Intelligent Transportation System (ITS) project	2		
TRAFFIC CIRCULATION			
Improves access to major highways	5		
Provides/enhances connection between modes	4		
Enhances connectivity of street network	14		
ECONOMIC DEVELOPMENT			
Improves facility for freight movement (air, distribution, rail)	2		
Enhances economic development investments	10		
AIR QUALITY			
Promotes positive effect on air quality	2		
SAFETY MANAGEMENT			
Promotes safety	7		
VALUE ADDED			
Match greater than minimum required	2		
Right of way was donated, eng. already complete, etc.	4		
Total	100		

Appendix B – Performance Evaluation of the Johnson City MTPO Public Participation Plan

In 2016, the Johnson City MTPO staff reviewed past records of public participation and outreach methods for performance and made the following updates to the Public Participation Plan:

- 1. Recommended the removal of eight of the nine locations currently listed as Appendix C Locations for review of MTPO and Transit Documents:
 - a. For the past three years (as far back as 2008), no comments have ever been received from the public using this outreach method;
 - b. Staff will continue to have copies of the documents available to the public at the Johnson City MTPO office located at the Johnson City Transit Center; and
 - c. Documents will continue to be available online, on the Johnson City MTPO website at <u>www.jcmpo.org</u>; all area libraries and city/town halls have internet access in which the public can access the documents available online.
- 2. Recommended continuing the public hearings held during document public comment review periods:
 - a. Very few participants attend these hearings; however, the Johnson City MTPO will continue to hold these hearings in addition to the meetings of the Executive Board to adopt these documents.
- 3. Recommended using Google Analytics to begin tracking website statistics for the Johnson City MTPO website:
 - a. The host service for the Johnson City MTPO website, <u>www.jcmpo.org</u>, ended its service to provide website statistics in 2014;
 - b. Google Analytics is a free web analytics service that provides statistics and basic analytical tools for data visualization and custom reports; and
 - c. Staff has begun an account with Google Analytics and is now tracking website statistics through this method.

2017 Review

For this update to the FY 2018 UPWP, staff considered making changes to the placement of legal notices in the Johnson City Press, the regional newspaper, to mirror the practice recommended by TDOT. As the Johnson City MTPO is currently in the process of updating its Long Range Transportation Plan (LRTP), staff declines to make changes at this time. Staff will revisit this item for the next UPWP, as the LRTP process will have concluded.