FY2018 and FY2019
Unified Planning Work Program
For Regional Transportation Planning
What is NCTCOG?

The North Central Texas Council of Governments (NCTCOG) is a voluntary association of, by, and for local governments within the 16-county North Central Texas Region. The agency was established by state enabling legislation in 1966 to assist local governments in planning for common needs, cooperating for mutual benefit, and coordinating for sound regional development. Its purpose is to strengthen both the individual and collective power of local governments, and to help them recognize regional opportunities, resolve regional problems, eliminate unnecessary duplication, and make joint regional decisions – as well as to develop the means to implement those decisions.

North Central Texas is a 16-county metropolitan region centered around Dallas and Fort Worth. The region has a population of more than 7 million (which is larger than 38 states), and an area of approximately 12,800 square miles (which is larger than nine states). NCTCOG has 229 member governments, including all 16 counties, 167 cities, 19 independent school districts, and 27 special districts.

NCTCOG’s structure is relatively simple. An elected or appointed public official from each member government makes up the General Assembly which annually elects NCTCOG’s Executive Board. The Executive Board is composed of 17 locally elected officials and one ex-officio non-voting member of the legislature. The Executive Board is the policy-making body for all activities undertaken by NCTCOG, including program activities and decisions, regional plans, and fiscal and budgetary policies. The Board is supported by policy development, technical advisory and study committees – and a professional staff led by R. Michael Eastland, Executive Director.

NCTCOG’s offices are located in Arlington in the Centerpoint Two Building at 616 Six Flags Drive (approximately one-half mile south of the main entrance to Six Flags Over Texas).

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NCTCOG’s Department of Transportation

Since 1974 NCTCOG has served as the Metropolitan Planning Organization (MPO) for transportation for the Dallas-Fort Worth area. NCTCOG’s Department of Transportation is responsible for the regional planning process for all modes of transportation. The department provides technical support and staff assistance to the Regional Transportation Council and its technical committees, which compose the MPO policy-making structure. In addition, the department provides technical assistance to the local governments of North Central Texas in planning, coordinating, and implementing transportation decisions.

Prepared in cooperation with the U.S. Department of Transportation (Federal Highway Administration and Federal Transit Administration) and the Texas Department of Transportation.

The contents of this report reflect the views of the authors who are responsible for the opinions, findings, and conclusions presented herein. The contents do not necessarily reflect the views or policies of the Federal Highway Administration, the Federal Transit Administration, or the Texas Department of Transportation.
FY2018 and FY2019 Unified Planning Work Program
For Regional Transportation Planning

Approved by the Regional Transportation Council July 13, 2017
Through Modification #6

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North Central Texas Council of Governments
NCTCOG Executive Board 2018-2019

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Director of Transportation, NCTCOG

Surface Transportation Technical Committee

Kristina Holcomb, Chair
Vice President of Strategic Planning and Development,
Denton County Transportation Authority
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I. Introduction

The North Central Texas Council of Governments (NCTCOG), through designation by the Governor of the State of Texas, serves as the Metropolitan Planning Organization (MPO) for the Dallas-Fort Worth-Arlington, Denton-Lewisville, and McKinney Urbanized Areas. The designation of the MPO is by agreement among the units of general purpose local governments and the Governor.

In order to conduct the metropolitan transportation planning process, the State of Texas, acting through the Texas Department of Transportation (TxDOT), and the North Central Texas Council of Governments as the Metropolitan Planning Organization, have entered into an agreement referred to as the Metropolitan Transportation Planning Contract. This agreement serves to delineate the responsibilities of each organization, TxDOT in the administration of federal and State funds to support the planning process, and NCTCOG in carrying out the responsibilities of the MPO.

Under federal law (23 USC 134 and 49 USC 5303, as amended), the MPO designated for each urbanized area is to carry out a “continuing, cooperative, and comprehensive multimodal transportation planning process,” including the development of a metropolitan transportation plan (MTP) and a transportation improvement program (TIP). This process should be one that encourages and promotes the safe and efficient development, management, and operation of surface transportation systems to serve the mobility needs of people and freight (including accessible pedestrian walkways and bicycle transportation facilities) and fosters economic growth and development, while minimizing transportation-related fuel consumption and air pollution.
The Unified Planning Work Program (UPWP) is prepared biennially by NCTCOG in accordance with current Surface Transportation legislation, the Fixing America’s Surface Transportation (FAST) Act, adopted by Congress and signed by the President on December 4, 2015. This legislation continues the concepts of a continuing, cooperative, and comprehensive planning process identified in previous legislation, the Intermodal Surface Transportation Efficiency Act (ISTEA); the Transportation Equity Act for the 21st Century (TEA-21); the Safe, Accountable, Flexible, Efficient Transportation Equity Act: A Legacy for Users (SAFETEA-LU); and Moving Ahead for Progress in the 21st Century (MAP-21). The UPWP is developed in cooperation with the Texas Department of Transportation, transportation authorities, toll authorities, and local governments in the Dallas-Fort Worth Metropolitan Area. Specific planning needs for the region are identified through requests solicited from representatives of these agencies and local governments. This information is combined with regional needs identified by NCTCOG and, after allocating funds from available resources, presented as a proposed Work Program for the upcoming fiscal years.

The metropolitan planning process utilized in the region for delivering transportation projects consists of four phases: system planning, project refinement, innovative finance, and project programming. The process is outlined in Exhibit I-1. System planning is a primary function of the Metropolitan Planning Organization, and as such, the North Central Texas Council of Governments takes the lead in the development of the Metropolitan Transportation Plan. As projects contained in the Plan undergo more detailed analyses, the transportation providers in the region assume leadership roles for specific projects, as applicable, with support from NCTCOG. The private sector may join in the planning process as revenue sources for the projects are investigated and identified. With the decline in revenue from traditional funding sources, participation from the private sector is becoming more and more relied upon in order to identify revenue streams to expeditiously implement viable transportation projects. Once project funding
has been identified, the North Central Texas Council of Governments, in carrying out another primary responsibility, reassumes the lead in the planning process and includes the projects in the Transportation Improvement Program.
EXHIBIT I-1

Metropolitan Planning Process for Delivering Transportation Projects

- **System Planning**
  - Metropolitan Transportation Plan:
  - Congestion Management
  - Bike/Pedestrian Facilities
  - Rail/Bus Transit
  - Managed/Toll Lanes
  - Thoroughfares/Freeways

- **Project Refinement**
  - Corridor Studies
  - Planning and Environment Linkages (PEL)
  - National Environmental Policy Act (NEPA) Process

- **Innovative Finance**
  - Local-State-Federal
  - Fund Leveraging
  - Public/Private Partnerships
  - Value Capture

- **Project Programming**
  - Project Selection
  - Project Monitoring
  - Project Reporting

NCTCOG MPO Staff Activities

NCTCOG | Transportation Providers | Private Sector | NCTCOG
The draft UPWP document is reviewed by the Surface Transportation Technical Committee and is presented for comment at public meetings. The Unified Planning Work Program is then presented for approval to the Regional Transportation Council and the NCTCOG Executive Board.

In addition to working cooperatively to develop the Unified Planning Work Program, NCTCOG, as the Metropolitan Planning Organization, works with the Texas Department of Transportation and the transportation operators to carry out the metropolitan planning process within the region. Included as Exhibit I-2 is a table illustrating the respective responsibilities of NCTCOG; the Texas Department of Transportation; the North Texas Tollway Authority; the Collin County Toll Road Authority; Dallas Area Rapid Transit; the Fort Worth Transportation Authority (also known as Trinity Metro); the Denton County Transportation Authority; the Cities of McKinney, Mesquite, Arlington and Grand Prairie; and the Dallas Fort Worth International Airport with regard to the development of financial forecasts, the Metropolitan Transportation Plan, the Metropolitan Transportation Improvement Program, the Annual Listing of Obligated Projects, the Congestion Management Process, Air Quality Conformity, and Corridor Studies. Appendix H contains a Memorandum of Agreement between the above entities demonstrating each entity’s commitment to work cooperatively.
## EXHIBIT 1-2
### METROPOLITAN TRANSPORTATION PLANNING PROCESS RESPONSIBILITIES

<table>
<thead>
<tr>
<th>Planning Activity</th>
<th>NCTCOG/RTC</th>
<th>TxDOT/NTTA/CCTRA</th>
<th>DFW Airport</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Financial Forecasts</strong></td>
<td>Develop alternative financial forecasts based on policy variables.</td>
<td>Provide estimate of statewide revenue projections for statewide sources such as federal/state fuel tax, vehicle registrations, and state discretionary programs.</td>
<td>Provide estimate of agency revenue projections for local, state, and federal sources such as local sales tax, federal and state formula funds and discretionary programs.</td>
</tr>
<tr>
<td>(23 CFR 450.324(g)(11))</td>
<td>Develop forecasts for locally generated and local option revenue.</td>
<td>Develop and maintain revenue forecasting model for federal/state revenue sources, including local option alternatives.</td>
<td>Provide financial plan information regarding allocation of revenue sources to project types, such as rail capital, bus capital, and maintenance and operations.</td>
</tr>
<tr>
<td><strong>Metropolitan Transportation Plan (MTP) Development</strong></td>
<td>Develop system revenue forecasts.</td>
<td>Provide roadway project status and cost information, including revenue source.</td>
<td>Provide transit project status and cost information, including revenue source.</td>
</tr>
<tr>
<td>(23 CFR 450.324)</td>
<td>Develop system-wide alternative scenarios.</td>
<td>Provide potential project staging and phasing, including expected opening year.</td>
<td>Provide potential project staging and phasing, including expected opening year.</td>
</tr>
<tr>
<td></td>
<td>Develop system-wide travel forecasts and performance reporting.</td>
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<tr>
<td>Planning Activity</td>
<td>NCTCOG/RTC</td>
<td>TxDOT/NTTA/CCTRA</td>
<td>DART/FWTA/DCTA/ McKinney/Mesquite/ Arlington/Grand Prairie</td>
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<tr>
<td>Coordinate public and transportation</td>
<td>Coordinate public and transportation partner involvement activities</td>
<td>Develop region-wide demographic information.</td>
<td>opening year for major locally funded projects.</td>
</tr>
<tr>
<td>partner involvement activities regarding</td>
<td>regarding Metropolitan Transportation Plan development.</td>
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<tr>
<td>Metropolitan Transportation</td>
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<td></td>
</tr>
<tr>
<td>Improvement Program (TIP) (23 CFR 450.326)</td>
<td>Compile and maintain list of funded projects by year and funding source,</td>
<td>Provide list of projects implemented by own agencies to NCTCOG for inclusion</td>
<td>Provide list of locally funded, regionally significant</td>
</tr>
<tr>
<td></td>
<td>including basic scope, limits, and total project cost/funding details.</td>
<td>in the metropolitan and Statewide Transportation Improvement Program (STIP) in the metropolitan area. TxDOT submits rural projects to STIP.</td>
<td>projects implemented by own agencies to NCTCOG for</td>
</tr>
<tr>
<td></td>
<td>Submit metropolitan Transportation Improvement Program for inclusion in</td>
<td>Provide updated status, costs by phase, and dollar amounts by funding category and year.</td>
<td>inclusion in the metropolitan and Statewide Transportation Improvement Program.</td>
</tr>
<tr>
<td></td>
<td>the Statewide Transportation Improvement Program.</td>
<td></td>
<td>Provide updated status, costs by phase, and dollar</td>
</tr>
<tr>
<td></td>
<td>Draft and submit quarterly Transportation Improvement Program modifications and Statewide Transportation Improvement Program revisions to the Texas Department of Transportation Districts (includes review for</td>
<td>Submit locally funded, regionally significant projects for inclusion in the Transportation Improvement Program/Statewide Transportation Improvement Program.</td>
<td>amounts by funding category and year for each federal, state, or locally funded project.</td>
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<td></td>
<td>Submit locally funded, regionally significant projects for inclusion in the Transportation Improvement Program/Statewide Transportation Improvement Program.</td>
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<td></td>
<td>Submit locally funded, regionally significant projects for inclusion in the Transportation Improvement Program/Statewide Transportation Improvement Program.</td>
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<td>Submit Transportation Program modifications/Statewide Transportation Improvement Program revisions for own agency’s projects to NCTCOG.</td>
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<tr>
<td>Planning Activity</td>
<td>NCTCOG/RTC</td>
<td>TxDOT/NTTA/CCTRA</td>
<td>DART/FWTA/DCTA/ McKinney/Mesquite/ Arlington/Grand Prairie</td>
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<tr>
<td>Planning Activity</td>
<td>Conformity consistency and requisite public involvement).</td>
<td>modifications/Statewide Transportation Improvement Program revisions to own agency’s projects for NCTCOG processing and review.</td>
<td>Submit Transportation Improvement Program modifications/Statewide Transportation Improvement Program revisions for own agency’s projects to NCTCOG.</td>
</tr>
<tr>
<td><strong>Annual Listing of Obligated Projects</strong></td>
<td>Compile list of obligated projects for each fiscal year with data from the Federal Transit Administration information system, transit agencies, and the Texas Department of Transportation.</td>
<td>Provide list of obligated projects (including project status and obligation amounts) to NCTCOG at the end of each fiscal year.</td>
<td>N/A</td>
</tr>
<tr>
<td>(23 CFR 450.334)</td>
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</tr>
<tr>
<td><strong>Congestion Management Process (CMP)</strong></td>
<td>Develop multimodal, system-wide monitoring and evaluation performance process.</td>
<td>Provide collected transportation data for inclusion in regional data collection program.</td>
<td>Provide collected transit data for inclusion in regional data collection program.</td>
</tr>
<tr>
<td>(23 CFR 450.322)</td>
<td>Develop, coordinate and collect regional transportation data for</td>
<td>Identify, select and implement congestion management strategies.</td>
<td>Identify, select and implement congestion strategies.</td>
</tr>
<tr>
<td>Planning Activity</td>
<td>NCTCOG/RTC</td>
<td>TxDOT/NTTA/CCTRA</td>
<td>DART/FWTA/DCTA/ McKinney/Mesquite/ Arlington/Grand Prairie</td>
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<tr>
<td><strong>Planning Activity</strong></td>
<td><strong>NCTCOG/RTC</strong></td>
<td><strong>TxDOT/NTTA/CCTRA</strong></td>
<td><strong>DART/FWTA/DCTA/ McKinney/Mesquite/ Arlington/Grand Prairie</strong></td>
</tr>
<tr>
<td><strong>Air Quality Conformity</strong> (40 CFR Part 93)</td>
<td>Develop and coordinate the transportation conformity analyses for the nonattainment area within the Metropolitan Planning Area. Enter into a Memorandum of Agreement with the Texas Department of Transportation, in the event the nonattainment area extends beyond the Metropolitan Planning Area boundary, for cooperative planning and air quality analysis of projects to reach a positive conformity determination.</td>
<td>TxDOT: Enter into a Memorandum of Agreement with NCTCOG, in the event the nonattainment area extends beyond the Metropolitan Planning Area boundary, for cooperative planning and air quality analysis of projects to reach a positive conformity determination. Participate as one of the interagency consultation partners for the conformity determination process,</td>
<td>Review conformity analysis, if applicable; provide comments during public participation process.</td>
</tr>
<tr>
<td>Planning Activity</td>
<td>NCTCOG/RTC</td>
<td>TxDOT/NTTA/CCTRA</td>
<td>DART/FWTA/DCTA/ McKinney/Mesquite/ Arlington/Grand Prairie</td>
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<tr>
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<td>positive conformity determination. Coordinate with consultation partners (Federal Highway Administration, Federal Transit Administration, Environmental Protection Agency, Texas Commission on Environmental Quality, and Texas Department of Transportation) regarding review requirements for the conformity review process. Transmit the joint Federal Highway Administration/Federal Transit Administration conformity determination to affected entities.</td>
<td>review conformity analyses and provide comments. Provide consent to the Federal Highway Administration on the transportation conformity determination.</td>
<td>NTTA/CCTRA: Review conformity analysis, if applicable; provide comments during public participation process.</td>
</tr>
<tr>
<td><strong>Corridor and Subarea Studies</strong></td>
<td>Lead corridor studies agreed upon by partner agencies. Support partner agency corridor studies by providing travel forecasts for alternative scenarios.</td>
<td>Lead corridor studies agreed upon by partner agencies. Provide funding support for travel forecasting support as agreed upon between lead agency and NCTCOG. Provide design concept and scope information for</td>
<td>Lead corridor studies agreed upon by partner agencies. Provide funding support for travel forecasting support as agreed upon between lead agency and NCTCOG.</td>
</tr>
<tr>
<td>Planning Activity</td>
<td>NCTCOG/RTC</td>
<td>TxDOT/NTTA/CCTRA</td>
<td>DART/FWTA/DCTA/ McKinney/Mesquite/ Arlington/Grand Prairie</td>
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</tr>
<tr>
<td>Provide Mobile Source Air Toxics and Environmental Justice analysis as appropriate to support National Environmental Policy Act documents.</td>
<td>Provide potential project alternatives as necessary to perform travel forecasts.</td>
<td>Provide design concept and scope information for potential project alternatives as necessary to perform travel forecasts.</td>
<td></td>
</tr>
</tbody>
</table>
The North Central Texas Council of Governments has received designation as a Regional Economic Development District. It is anticipated that data available through the metropolitan planning process may be utilized to help support the Agency in the development of Comprehensive Economic Development Strategies for the region.

The North Central Texas Council of Governments and the Regional Transportation Council have also executed five Memorandums of Understanding (MOUs) with regions beyond the Metropolitan Planning Area for interregional and interstate cooperation on transportation issues that are of mutual interest to the North Central Texas region and the respective region. These MOUs have been executed with the East Texas Council of Governments and East Texas Corridor Council; the East Texas Council of Governments, East Texas Corridor Council, and the Northwest Louisiana Council of Governments; the East Texas Council of Governments, East Texas Corridor Council, Northwest Louisiana Council of Governments, and the North Delta Regional Planning and Development District/Ouachita Council of Governments; the Heart of Texas Council of Governments and Waco Metropolitan Planning Organization; and Metroplan (five-county area designated as the Metropolitan Planning Organization for the Central Arkansas Regional Transportation Study Area). Several of these agreements are on display in the Transportation Council Room of the North Central Texas Council of Governments. To advance high-speed rail planning efforts, NCTCOG and the Association of Central Oklahoma Governments, the Metropolitan Planning Organization for the Oklahoma City metropolitan area, documented an agreement to work cooperatively to evaluate and plan for potential rail service between the Houston and Oklahoma City metropolitan areas. Additionally, NCTCOG and the RTC executed an MOU with the Lone Star Rail District, a governmental entity planning and developing rail passenger service and freight rail improvements in the Central Texas region, to assist with and coordinate rail planning activities in the Dallas, Fort Worth, Austin and San Antonio regions.
Locally, NCTCOG entered into a Memorandum of Understanding with Texas Central Partners to cooperatively develop a high-speed rail system from Houston to Fort Worth.

The Unified Planning Work Program has been prepared using the standard format for MPOs provided by the Texas Department of Transportation. The remaining portion of this chapter summarizes the overall purpose of the Unified Planning Work Program; the geographic area identified as the Metropolitan Area for Transportation Planning; the organizational structure for conducting regional transportation planning in the Dallas-Fort Worth Metropolitan Area, ongoing activities related to private-sector involvement, and an overview of planning issues and emphasis areas for Fiscal Years 2018 and 2019.

Chapters II-VI include project descriptions, funding levels, sources of funding, and anticipated products for each planning subtask to be carried out by NCTCOG. Work completed during the previous two fiscal years is also highlighted. In addition to planning activities, initiatives being carried out by NCTCOG to implement transportation programs in the region are identified. These Management and Operations initiatives are being included to provide a complete inventory of NCTCOG staff activities. Chapter VII contains strategic regional initiatives to investigate non-traditional funding methods for transportation projects in light of the decline in traditional funding sources. Funds will be sought from varying sources to support these strategic initiatives, and when received, will be categorized as Revenue Center 6 funds. Chapter VIII provides a summary of overall funding levels and the sources of funding for each task. Appendix A provides a summary of policy and technical committee membership; Appendix B illustrates the Metropolitan Planning Area boundary; Appendix C contains the NCTCOG Debarment Certification; and Appendix D provides the Lobbying Certification for contracts, grants, loans, and cooperative agreements. Appendix E contains the Contract and Procurement Procedures Certification of Compliance; Appendix F contains the Ethics and Compliance Certification; Appendix G contains
the NCTCOG Transportation Public Participation Plan; and Appendix H contains the Metropolitan Planning Agreement.

A. Purpose

The Unified Planning Work Program (UPWP) is the instrument for coordinating metropolitan transportation and air quality planning activities in North Central Texas. This Work Program includes a description of proposed work submitted to state and federal agencies that are the financial sponsors of the Program. This Unified Planning Work Program describes the transportation and air quality planning efforts in the North Central Texas region for the period of October 1, 2017 to September 30, 2019.

Consistent with the standard UPWP format provided by TxDOT, the following five tasks have been identified to guide transportation planning activities in the NCTCOG Metropolitan Area:

1.0 Administration and Management
2.0 Transportation Data Development and Maintenance
3.0 Short-range Planning and Programming, and Air Quality and Transit Operations
4.0 Metropolitan Transportation Plan
5.0 Special Studies and System Operation

Exhibit I-3 below identifies the ten planning factors that must be considered in the metropolitan transportation planning process, per 23 USC 134(h).
EXHIBIT I-3
TEN FACTORS TO BE CONSIDERED IN THE PLANNING PROCESS

- Support the economic vitality of the metropolitan area, especially by enabling global competitiveness, productivity, and efficiency.
- Increase the safety of the transportation system for motorized and nonmotorized users.
- Increase the security of the transportation system for motorized and nonmotorized users.
- Increase the accessibility and mobility of people and freight.
- Protect and enhance the environment, promote energy conservation, improve quality of life, and promote consistency between transportation improvements and state and local planned growth and economic development patterns.
- Enhance the integration and connectivity of the transportation system, across and between modes, for people and freight.
- Promote efficient system management and operation.
- Emphasize the preservation of the existing transportation system.
- Improve the resiliency and reliability of the transportation system and reduce or mitigate stormwater impacts of surface transportation.
- Enhance travel and tourism.

Through MAP-21, and as further defined by the FAST Act, national transportation performance management is being used as a strategic approach to making investment and policy decisions, utilizing system information to achieve the national performance goals of safety, infrastructure condition, congestion reduction, system reliability, freight movement and economic vitality, environmental sustainability, and reduced project delivery delays. NCTCOG publishes *Progress North Texas*, a state-of-the-region report that focuses on establishing measures of system performance for which data gathered on an annual basis is used to index overall performance of the transportation system from year to year. Data reported includes demographics, congestion, air pollution, safety and project development.

NCTCOG has utilized performance-based planning as an integral part of the metropolitan transportation planning process since enactment of The Intermodal Surface Transportation Efficiency Act of 1991. Pending federal guidance regarding performance-based planning will provide states and MPOs insight and instruction on how performance-based planning should be
integrated into the transportation planning and programming processes. As part of this UPWP, NCTCOG will continue dialogue with TxDOT and other MPOs across the state to build consensus on how best to implement new federal guidance. NCTCOG will need to determine how to integrate new federal requirements into its already developed performance-based planning process to ensure federal, State, and local consistency and more importantly, to ensure that data being collected supports these measures and corresponds with federal guidance. This increased emphasis on performance-based planning will translate into increased dialogue with policy officials and transportation partners in the region regarding the use of performance measures and associated data collection and analysis in both planning and project programming efforts. With NCTCOG various program areas encompassing a large variety of transportation modes and collected data, focus will be placed on building greater consistency in how performance measures are used to achieve the regional goals.

In addition to these performance measures, the rules emphasize that the metropolitan planning organizations shall develop and adopt a proactive public involvement process. NCTCOG’s public involvement process incorporates Environmental Justice and Title VI considerations. Public participation is solicited and strongly encouraged in NCTCOG’s transportation planning program. Increasing communication among cities, elected officials, and technical staff permits these entities to work together to achieve desired goals and objectives. The public outreach and involvement programs emphasize the importance of participation at all levels, from government agencies to the individual. When the public is informed and involved, the direction and content of the planning efforts are more likely to address the wide range of issues that impact the region. Including the public during the planning phase of any project will reduce the time and cost of eventual project implementation.
The public outreach initiative is a major ongoing program to increase the level of interaction with the general public regarding transportation planning activities being carried out by the Metropolitan Planning Organization. A wide variety of strategies have been developed to address the goal. Different strategies may be employed for different projects and activities, depending on specific project needs, available time, and project budgets.

Formal public involvement procedures to be used in the metropolitan transportation planning process were originally adopted by the Regional Transportation Council (RTC) on June 1, 1994, and subsequently revised May 10, 2007, March 11, 2010, and February 12, 2015 to increase the public’s access to information related to the MPO planning process, as well as opportunities for public participation in the overall decision-making process. The current Public Participation Plan approved by the RTC is included in Appendix G. The most recent revisions addressed changing communication trends, aligning outreach and input opportunities to the significance of decision under consideration, and suggestions received from the public and partners. The Public Participation Plan, as approved by the RTC in February 2015, also includes, as attachments, a Language Assistance Plan and Title VI Complaint Procedures. The Language Assistance Plan outlines how people with limited proficiency in English have access to information and the ability to participate in NCTCOG Transportation Department Programs. Title VI Complaint Procedures outline the NCTCOG policy, how an individual may submit a complaint, how the complaint will be investigated and potential resolution scenarios. The public involvement procedures represent the required public involvement process that must be carried out for involving the public in the various aspects of the regional transportation planning process; additional strategies are often pursued through public outreach activities that are also identified in Appendix G. NCTCOG staff continually reviews requirements for and guidance on public participation from the Federal Highway Administration and the Federal Transit Administration and maintains public involvement procedures consistent with requirements and guidance.
Guidance received from federal and state transportation funding agencies in the past requested MPOs to include activities to ensure and enhance the compliance of the metropolitan transportation planning process with Title VI of the Civil Rights Act of 1964. Title VI states that 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 Civil Rights Restoration Act of 1987 expanded the prohibition of discrimination to include religion, sex, age, or disability and clarified the intent of Title VI by including the following language: “Nondiscrimination programs require that federal-aid recipients, sub-recipients, and contractors prevent discrimination and ensure nondiscrimination in all of their programs and activities, whether those programs and activities are federally funded or not.” Executive Order 12898 mandates that federal agencies also incorporate environmental justice principles by identifying and addressing, as appropriate, disproportionately high and adverse human health or environmental effects of their programs, policies, and activities on minority populations and low-income populations. Periodically, TxDOT will request a Title VI Compliance Review of the North Central Texas Council of Governments’ metropolitan planning process. During the review, NCTCOG gives TxDOT documentation of how the Agency is complying with non-discrimination requirements in the outreach and planning processes. On May 9, and May 23, 2013, the Regional Transportation Council and the NCTCOG Executive Board approved an update to NCTCOG’s Title VI program. Initiatives to maintain compliance with all applicable regulations and orders will continue to be pursued as part of the FY2018 and FY2019 UPWP.

During a series of public meetings held on March 13, 15, and 20, 2017, the public was notified that development of the FY2018 and FY2019 UPWP was beginning. Attendees were asked to provide ideas for regional transportation or air quality planning studies and/or requests for planning study technical assistance for potential inclusion in the UPWP. On June 13, 14, and 20,
2017, a public meeting series was also held to present to the public the draft FY2018 and FY2019 UPWP for comments prior to requesting technical committee and RTC approval of the Work Program. This public meeting was also video recorded and made available on line, as was a draft copy of the document.

B. Definition of Area

North Central Texas Region

The North Central Texas region is the 16-county area within which the North Central Texas Council of Governments is responsible for coordinating regional planning activities that address the common needs of its constituents. Counties encompassed by NCTCOG for regional coordination are Collin, Dallas, Denton, Ellis, Erath, Hood, Hunt, Johnson, Kaufman, Navarro, Palo Pinto, Parker, Rockwall, Somervell, Tarrant, and Wise. The region was designated as the North Central Texas State Planning Region by Executive Order of the Texas Governor, Dolph Briscoe, on August 28, 1973.

Dallas-Fort Worth Metropolitan Area

The Texas Department of Transportation (then known as the Texas Highway Department) initiated comprehensive transportation planning in North Central Texas in July 1967, as the Dallas-Fort Worth Regional Transportation Study. These early planning efforts set the foundation for subsequent transportation planning in the region and defined the area of primary interest for such work. Since then, extensive growth in population and employment, followed by subsequent growth in travel, resulted in several expansions of the study area, or that area on which the MPO focuses its transportation and air quality planning activities and that is expected to be principally urbanized by the appropriate planning horizon (approximately 20 years). Following action by the Regional Transportation Council, the NCTCOG Executive Board and the Texas Transportation Commission in 2009, the Metropolitan Planning Area boundary now includes the 12 counties of
Collin, Dallas, Denton, Ellis, Hood, Hunt, Johnson, Kaufman, Parker, Rockwall, Tarrant and Wise; a total area of approximately 9,441 square miles, as shown in Exhibit I-4.

Per federal legislation, the Metropolitan Area also has been designated as a Transportation Management Area (TMA).

Federal planning regulations require that if any federal public lands and/or Indian tribal lands are included within the Metropolitan Planning Area, the affected federal agencies and Indian tribal governments shall be involved appropriately in the development of transportation plans and programs. NCTCOG includes tribes that have areas of concern in the North Texas region in public involvement processes related to transportation planning. Tribal groups are included in the 13,500-record public involvement database.

EXHIBIT I-4

Transportation and Air Quality Planning Areas

Legend
- Metropolitan Planning Area
- 8-Hour Ozone Nonattainment Area

North Central Texas Council of Governments
September 2012
Air Quality Nonattainment Area

With the passage of the Clean Air Act Amendments of 1990, the counties of Collin, Dallas, Denton, and Tarrant were originally designated as a nonattainment area for being in violation of the 1-hour ozone standard. In July 2012, the ozone nonattainment area was expanded due to implementation of the revised 8-hour ozone standard. The current nonattainment area includes Collin, Dallas, Denton, Ellis, Johnson, Kaufman, Parker, Rockwall, Tarrant, and Wise Counties. In addition, Hood County has remained in attainment but is partnering with EPA through the Ozone Advance Program. Ozone Advance encourages actions that result in reduced ozone precursor emissions to enable continued compliance in meeting the ozone standard. Air quality planning activities to be conducted as part of the FY2018 and FY2019 UPWP are described within Task 3 of the Work Program.

C. Organization

Multimodal transportation planning and development, facilitated through a single policy direction for all modes of travel, ensures that plans and programs are coordinated across various city, county, and agency jurisdictional boundaries and that cooperation is occurring among implementing agencies. In North Central Texas, this direction is provided through an extensive committee structure forming partnerships in regional transportation planning and implementation, as illustrated in Exhibit I-5. This structure consists of the NCTCOG Executive Board and the Regional Transportation Council, comprised primarily of local elected officials; transportation providers; and technical or advisory committees comprised of staff involved in the planning for various modes of travel. A variety of task forces also support planning initiatives as needed.
Transportation Providers
- Texas Department of Transportation
- North Texas Tollway Authority
- Dallas Area Rapid Transit
- Denton County Transportation Authority
- Collin County Toll Road Authority
- Fort Worth Transportation Authority
- Dallas Fort Worth International Airport

EXHIBIT I-5
PARTNERSHIP IN REGIONAL TRANSPORTATION PLANNING

RTC Subcommittees
- Surface Transportation Technical Committee
- Air Transportation Advisory Committee
- Regional Freight Advisory Committee
- Bicycle/Pedestrian Advisory Committee
- Regional Safety Advisory Committee

Regional Transportation Council
Executive Board
NCTCOG Executive Board

The NCTCOG Executive Board, consisting of 17 locally elected officials and one ex-officio non-voting member of the legislature, establishes overall policy for comprehensive planning and coordination in the North Central Texas region. The Executive Board sets policy for the administration of funds granted to the MPO, as well as the NCTCOG staff in carrying out the day-to-day responsibilities of the MPO. NCTCOG is the overall umbrella under which the regional transportation planning process functions. The Executive Board meets monthly in the North Central Texas Council of Governments' offices.

Regional Transportation Council

The Regional Transportation Council, consisting of 44 members, serves as the independent policy body for regional transportation decisions. The primary functions of the RTC are to provide guidance for multimodal transportation planning and to assure coordination among transportation modes, local government entities, and planning activities. The RTC is responsible for direction and approval of the Metropolitan Transportation Plan, the Transportation Improvement Program, the Congestion Management Process, the Unified Planning Work Program, and for satisfying and implementing federal and state laws and regulations pertaining to the regional transportation planning process.

The RTC meets monthly in the North Central Texas Council of Governments' offices. As of September 2015, the RTC meetings are live streamed over the Internet, video recorded, and available online within 24 hours following each meeting. The organizational structure of the RTC is shown in Exhibit I-6, and current membership is shown in Appendix A. At the discretion of the RTC officers, RTC members also serve on Standing and Ad Hoc Subcommittees formed by the officers to respond to specific issues that come before the Council.
### EXHIBIT I-6

**REGIONAL TRANSPORTATION COUNCIL ORGANIZATIONAL STRUCTURE**

<table>
<thead>
<tr>
<th>City/Region</th>
<th>Count</th>
</tr>
</thead>
<tbody>
<tr>
<td>City of Arlington</td>
<td>2</td>
</tr>
<tr>
<td>Cities of Carrollton and Farmers Branch</td>
<td>1</td>
</tr>
<tr>
<td>Cities of Dallas, Highland Park, and University Park</td>
<td>6</td>
</tr>
<tr>
<td>Cities of Denton, Sanger, Corinth, and Lake Dallas</td>
<td>1</td>
</tr>
<tr>
<td>Cities of Duncanville, DeSoto, Lancaster, Cedar Hill, Glenn Heights, and Hutchins</td>
<td>1</td>
</tr>
<tr>
<td>City of Fort Worth</td>
<td>3</td>
</tr>
<tr>
<td>City of Garland</td>
<td>1</td>
</tr>
<tr>
<td>City of Grand Prairie</td>
<td>1</td>
</tr>
<tr>
<td>Cities of North Richland Hills, Richland Hills, Haltom City, Watauga, White Settlement, River Oaks, Lake Worth, Westworth Village, Saginaw, Azle, Keller, and Sansom Park</td>
<td>1</td>
</tr>
<tr>
<td>Cities of Irving and Coppell</td>
<td>1</td>
</tr>
<tr>
<td>Cities of Lewisville, Flower Mound, and Highland Village</td>
<td>1</td>
</tr>
<tr>
<td>Cities of Mansfield, Benbrook, Forest Hill, Crowley, Everman, and Kennedale</td>
<td>1</td>
</tr>
<tr>
<td>Cities of Mesquite, Balch Springs, Seagoville, and Sunnyvale</td>
<td>1</td>
</tr>
<tr>
<td>Cities of Grapevine, Southlake, Colleyville, Westlake, Trophy Club, Roanoke, Bedford, Euless, and Hurst</td>
<td>1</td>
</tr>
<tr>
<td>Cities of McKinney, Fairview, Anna, Princeton, and Melissa</td>
<td>1</td>
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<tr>
<td>City of Plano</td>
<td>1</td>
</tr>
<tr>
<td>Cities of Richardson and Addison</td>
<td>1</td>
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<tr>
<td>Cities of Frisco, Prosper, Little Elm, The Colony, Celina, and Providence Village</td>
<td>1</td>
</tr>
<tr>
<td>Cities of Allen, Lucas, Wylie, Rowlett, Sachse, and Murphy</td>
<td>1</td>
</tr>
<tr>
<td>Collin County</td>
<td>1</td>
</tr>
<tr>
<td>Dallas County</td>
<td>2</td>
</tr>
<tr>
<td>Denton County</td>
<td>1</td>
</tr>
<tr>
<td>Ellis County and the Cities of Waxahachie, Midlothian, Ennis, and Red Oak, and Kaufman County and the Cities of Forney, Terrell, and Kaufman</td>
<td>1</td>
</tr>
<tr>
<td>Johnson County and the Cities of Burleson, Cleburne, Keene, and Joshua and Hood County and the City of Granbury</td>
<td>1</td>
</tr>
<tr>
<td>Rockwall County and the Cities of Rockwall, Heath, Royse City, and Fate and Hunt County and the Cities of Greenville and Commerce</td>
<td>1</td>
</tr>
<tr>
<td>Parker County and the Cities of Weatherford and Mineral Wells, and Wise County and the Cities of Decatur and Bridgeport</td>
<td>1</td>
</tr>
<tr>
<td>Tarrant County</td>
<td>2</td>
</tr>
<tr>
<td>District Engineer, Dallas District, TxDOT (also represents the TxDOT Paris District’s interests)</td>
<td>1</td>
</tr>
<tr>
<td>District Engineer, Fort Worth District, TxDOT</td>
<td>1</td>
</tr>
<tr>
<td>Policy Representative, Dallas Area Rapid Transit</td>
<td>1</td>
</tr>
<tr>
<td>Policy Representative, Fort Worth Transportation Authority</td>
<td>1</td>
</tr>
<tr>
<td>Policy Representative, Denton County Transportation Authority</td>
<td>1</td>
</tr>
<tr>
<td>Policy Representative, North Texas Tollway Authority</td>
<td>1</td>
</tr>
<tr>
<td>Policy Representative, Dallas Fort Worth International Airport</td>
<td>1</td>
</tr>
<tr>
<td><strong>Total</strong></td>
<td>44</td>
</tr>
</tbody>
</table>
Transportation Technical and Advisory Committees

Technical and advisory committees provide advice to the RTC and guidance for the NCTCOG staff. Committee members may be called upon to provide the RTC with information about the concerns and priorities of the individual local entities they represent. They also provide specialized expertise and serve as a means of facilitating communication and coordination between the regional planning process and individual local agencies. Representatives on these committees may include staffs of local governments, transportation providers in the region, private-sector representatives, personnel from state and federal agencies, or citizens.

Surface Transportation Technical Committee

The Surface Transportation Technical Committee (STTC) reviews, comments on, and prepares recommendations regarding surface transportation planning and development in the Dallas-Fort Worth Metropolitan Area. The current members of the Surface Transportation Technical Committee are listed in Appendix A. The Committee meets monthly in the North Central Texas Council of Governments’ offices.

Air Transportation Advisory Committee

The Air Transportation Advisory Committee (ATAC) provides technical expertise and review for the general aviation system planning process to the Regional Transportation Council and NCTCOG Executive Board. The general aviation system is the system of airports and heliports in the region that provide for general aviation and air cargo activity. The Committee meets quarterly in the North Central Texas Council of Governments’ offices.

Regional Freight Advisory Committee

The Regional Freight Advisory Committee provides technical expertise, review of and input on Freight North Texas products, recommendations for freight project funding, review of freight-
related publications, and review of and contributions to freight forecasting efforts to the Regional Transportation Council. Freight North Texas is the regional freight system inventory for the NCTCOG region. The Committee meets quarterly in the North Central Texas Council of Governments’ offices.

Bicycle and Pedestrian Advisory Committee

The Bicycle and Pedestrian Advisory Committee (BPAC) provides technical expertise, public outreach support, review of regional bicycle and pedestrian planning, and assistance in the selection of bicycle and pedestrian projects funded by the Regional Transportation Council and the Executive Board. The Committee meets quarterly in the North Central Texas Council of Governments’ offices.

Regional Safety Advisory Committee

The Regional Safety Advisory Committee (RSAC) assists in the development of regional safety policies, programs, procedures, projects, and activities that help improve traffic safety throughout the region. The Committee also provides technical expertise, public outreach support, review of regional safety planning, and assistance in the selection of safety projects funded by the Regional Transportation Council and the NCTCOG Executive Board. The Committee meets quarterly in the North Central Texas Council of Governments' offices.

D. Private-Sector Involvement

The private sector is encouraged, to the maximum extent feasible, to participate in NCTCOG's metropolitan transportation and air quality planning process. Private/public sector partnerships are playing an increasingly important role in the development and implementation of strategies to reduce congestion and improve air quality, as well as in the joint funding of transportation improvements. Private-sector representatives participate directly in the planning process by
serving as members on various task forces and coalitions facilitating the various planning disciplines. The NCTCOG Transportation Public Participation Plan is directed toward involving the private sector through various mailings of meeting notices and publications. Additionally, as federal air quality requirements become increasingly more difficult to meet, many air quality initiatives are expanding their focus beyond traditional local government involvement to include the private sector in a variety of ways as part of the planning process and project implementation.

In support of the region’s Sustainable Development initiatives, since 2011 the Regional Transportation Council has allocated RTC Local, Regional Toll Revenue, Congestion Mitigation and Air Quality Improvement Program, and Surface Transportation Block Grant Program funds for transportation improvements. A principal requirement for the eligibility of funding in this program is private-sector participation in the funding and implementation of these projects. This very successful funding program forms the foundation for an ongoing dialogue with the private-sector development community regarding opportunities for coordinating transportation and land-use investment decisions to improve mobility and air quality. These discussions are taking place in part through the ongoing process of working with the project developers and local governments toward implementation of these specific projects.

NCTCOG also serves as ex-officio representatives to the Dallas Regional Mobility Coalition and the Tarrant Regional Transportation Coalition, which assist local governments, TxDOT, DART, and FWTA with implementation of transportation improvements in the TxDOT Dallas and Fort Worth Districts.

In addition to these activities, third-party private contractors play a significant role in providing technical support services in completing work contained in the UPWP. The contracting procedures used by NCTCOG establish standards and guidelines for the procurement of services.
through third-party contracts. TxDOT has approved NCTCOG’s procedures for procuring consultants to assist with implementation of the transportation and air quality planning projects included in the UPWP. Copies of NCTCOG’s contracting procedures are available upon request. Appendix E contains a current certification of compliance for NCTCOG’s contract and procurement procedures.

As part of the development and implementation of the UPWP, NCTCOG staff, in cooperation with local governments, TxDOT, and the transportation providers, identifies those work subtasks in which consultant assistance will be desired. As individual projects move forward, a Request for Proposals (RFP), which includes an overview of the work to be completed, is issued for each of these projects. A list of prospective consultants by area of specialization is maintained by NCTCOG and is used to guide the distribution of RFPs. Firms are encouraged to provide information to NCTCOG in order to be included on the list of prospective consultants. A notice of intent to retain consultant services for each project is also published in the Texas Register, on the NCTCOG website, and in local newspapers, two of which are targeted for ethnic minorities. Consultants may obtain a copy of the RFP through the NCTCOG website. A review committee is established for each project to review proposals and provide recommendations to NCTCOG’s Executive Board regarding the firm(s) to conduct the work.

In addition to NCTCOG retaining private-sector assistance in the form of consultants on its planning projects, the transportation providers and local governments within the region also retain consultants to assist with their planning efforts. Transportation providers also increasingly seek to form project implementation partnerships through a variety of innovative project development and financing tools authorized by federal and State legislation and regulation. In the course of these efforts, NCTCOG’s assistance is often requested. Staff participates in meetings, provides data, and performs specialized planning work to support the efforts of the transportation providers
and local governments, as well as potential private transportation project developers in order to ensure that potential projects are consistent with adopted regional policies, plans, and programs.

E. Planning Issues and Emphasis

The Federal Highway Administration and the Federal Transit Administration have jointly issued Planning Emphasis Areas to be addressed in the Unified Planning Work Program. These three emphasis areas are identified in Exhibit I-7 and include 1) MAP-21 Implementation – Transition to Performance Based Planning and Programming, 2) Regional Models of Cooperation – Ensure a Regional Approach to Transportation Planning by Promoting Cooperation and Coordination Across Transit Agency, MPO and State Boundaries; and 3) Ladders of Opportunity – Access to Essential Services. Included in this Exhibit are examples of what NCTCOG is already doing or plans to do to address each of these areas.
### EXHIBIT I-7

**PLANNING EMPHASIS AREAS**

<table>
<thead>
<tr>
<th>Emphasis Area</th>
<th>Work Program Subtasks Addressing Emphasis Area</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>MAP-21 Implementation</strong>&lt;br&gt;<strong>Transition to Performance Based Planning and Programming</strong>&lt;br&gt;Further develop performance management approach to transportation planning and programming. Performance-based planning and programming includes using transportation performance measures, setting targets, reporting performance, and programming transportation investments directed toward the achievement of transportation system performance outcomes. Appropriate UPWP work tasks could include working with local planning partners to identify how to implement performance-based planning provisions such as collecting performance data, selecting and reporting performance targets for the metropolitan area, and reporting actual system performance related to those targets. The MPOs might also explore the option to use scenario planning to develop their metropolitan transportation plan.</td>
<td>1.01 Community Outreach – Performance measures are reported for the department through the Progress North Texas state-of-the-region annual report.</td>
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<tr>
<td></td>
<td>2.01 Travel Forecasting Support - Data collection programs and modeling activities are ongoing to benchmark travel behavior of users, including several transportation system usage statistics.</td>
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<td></td>
<td>2.02 Transportation Data Management – Performance data such as traffic counts, travel times, transit ridership, and gasoline consumption, are organized and archived for use in reporting.</td>
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<td></td>
<td>3.01 Transportation Project Programming – Many system and project performance factors are taken into account in selecting projects and programs, such as level of service and cost/benefit calculations. Project tracking activities have increased substantially, which will be an integral part of the performance management approach.</td>
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<tr>
<td></td>
<td>3.02 Regional Air Quality Planning – In order to make sound emission-reduction control strategy decisions, it is critical to have accurate fundamental building blocks that go into those decisions. Successful transportation conformity determinations are a primary performance measure to ensure the region’s short- and long-range planning are consistent with air quality goals. In addition, analyzing a variety of emission, vehicle, and activity trends that are direct output from many of the tools utilized in traditional air quality planning, helps to ensure quality transportation information for application into other efforts.</td>
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<td></td>
<td>3.03 Air Quality Management and Operations — Performance measures are heavily relied upon to make decisions regarding the selection and implementation of air quality improvement projects to meet three elements: successful transportation conformity determination, State Implementation Plan support, and ultimately, regional compliance to the Environmental Protection Agency’s National Ambient Air Quality Standards as measured by the regional ozone design value. Examples include number of entities adopting regional policies and/or participating in regional collaborative efforts, number of technology improvements implemented and resulting emissions reductions, and emissions reductions attributed to efforts to enforce existing strategies.</td>
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<tr>
<td></td>
<td>3.03 Air Quality Management and Operations – It is important to verify information provided by a performing party to ensure grant-funded activities are used in accordance with the performing party agreement. Field inspections of sub-grantees will be conducted by staff to verify various grant requirements. Outcomes from documenting retired vehicles/equipment, inspecting replacement vehicle/equipment purchases, verifying construction completion, recording digital images for documentation purposes, and reviewing sub-grantee records along with risk assessment will help refine the field inspection process.</td>
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<tr>
<td>Emphasis Area</td>
<td>Work Program Subtasks Addressing Emphasis Area</td>
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<tr>
<td>3.04 Transportation and Air Quality Communications – It is important to receive feedback from the customers served to ensure overall effectiveness and audience interests. Outcomes from Google analytics, social media statistics, and direct participant participation at events help refine and shape future endeavors.</td>
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<tr>
<td>3.06 Transit Operations – Performance measures are included in project management and program oversight for federal formula and discretionary funds for public transportation. Measures for both operations and capital grants are used in the decision-making process to maximize program outcomes with available funding.</td>
<td></td>
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<tr>
<td>4.01 Metropolitan Transportation Plan – Performance measures such as level-of-service analysis and congestion assessments are outputs of the current planning processes and are documented throughout the Metropolitan Transportation Plan. In addition to these ongoing efforts, staff is reviewing proposed rulemaking related to performance measures and targets as mandated by MAP-21. Now that official federal rules have been issued, NCTCOG will coordinate with TxDOT to establish measures and targets that are appropriate for the regional transportation system. NCTCOG is also working with FHWA to implement elements of the Sustainable Highways Initiative to incorporate performance measures into the metropolitan transportation planning process. The focus of this work is the development of sustainable performance measures for the region’s transportation system. As work continues on a new long-range transportation plan, Mobility 2045, sustainable performance measures and supplemental measures will be incorporated to allow for the tracking of the region’s transportation system performance.</td>
<td></td>
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<tr>
<td>5.01 Regional Transportation Studies - Through new federal legislation and guidance to MAP-21, the Corridor Studies/Environmental Study Support element will continue to be a performance-driven, and outcome-based program providing support in the development of corridor studies throughout the region. Performance measures such as report of daily volumes, peak-hour volumes, level of service, vehicle miles traveled, ridership totals, boarding and alighting figures, and other travel model data for ongoing corridor studies are evaluated for MTP recommendations and inclusion.</td>
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<tr>
<td>5.01 Regional Passenger Rail Innovative Finance Initiative – This initiative incorporates various performance measures to determine optimum funding and financing strategies for regional passenger rail corridors.</td>
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<tr>
<td>5.01 Regional People Mover Initiative – This initiative examines the feasibility of using light-duty passenger rail technology to connect various land uses within mixed-use developments. Performance measures are utilized extensively to determine optimum alignment and operational conditions for these very important “last mile” connections.</td>
<td></td>
</tr>
<tr>
<td>5.01 High Speed Rail – NCTCOG staff utilizes performance measures extensively in this effort as a partner to TxDOT and private-sector teams examining high and higher speed rail alternatives within the Dallas-Fort Worth region. Performance measures are a critical component for the alignment, operation and transportation system connectivity analyses.</td>
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<tr>
<td>5.02 Subarea Studies and Local Government Assistance - Through guidance from MAP-21 legislation, the 5.02 subtask provides an evaluation of multimodal transportation needs within a specific geographic area or along an arterial or transit corridor. These projects are designed to study a specific issue and allow for a comprehensive assessment</td>
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<tr>
<td>Emphasis Area</td>
<td>Work Program Subtasks Addressing Emphasis Area</td>
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<tr>
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<tr>
<td>of general transportation needs within an area prior to examining system alternatives. The anticipated performance-based products of this subtask can include:</td>
<td></td>
</tr>
<tr>
<td>• Travel demand modeling for study alternatives and alignment analysis.</td>
<td></td>
</tr>
<tr>
<td>• Report of daily volumes, peak-hour volumes, level of service, vehicle miles traveled, ridership totals, boarding and alighting figures, the collection and transmittal of travel model networks, and performance report model outputs.</td>
<td></td>
</tr>
<tr>
<td>• Identification of recommendations and incorporation of said recommendations in the next Metropolitan Transportation Plan.</td>
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<td>5.03 Land-Use/Transportation Initiatives – The Sustainable Development livability program is developing performance measures that look at the impact of program investments from the three calls for projects that have occurred since 2001. Staff is tracking the number of infrastructure and planning projects funded and completed through the program and their impact, along with the number of projects within one-half mile from a transit station to evaluate the impact of transit oriented development (TOD) funding. Additionally, efforts are underway to measure the success of bicycle and pedestrian modes of alternative transportation and to determine any commuting patterns that may exist. Staff will monitor the volume of trips, directional and time-of-day information for various locations in Dallas-Fort Worth in order to better evaluate facility use and other patterns within the region. A network of regionally significant bicycle and pedestrian corridors, and their nearby access to development are important quality-of-life components to sustainable development and effective mixed-use development. Daily counts of bicycle and pedestrian users are conducted in various locations in Dallas-Fort Worth in order to better evaluate facility use and other patterns within the region.</td>
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<td>5.04 Capital and Operational Asset Management System – This program focuses on gaining maximum utilization of the current system and capacity, and the use of strategic investments in the transportation system to extend the operating life of the current system, thereby delaying the expenditure of limited resources. Both observed and planning performance measures are used to balance between preserving, upgrading or replacing existing transportation assets. These performance dimensions include traffic volumes, infrastructure conditions, traffic control devices, geometric design elements, safety, land use and congestion.</td>
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<td>5.05 Congestion Management Planning and Operations – NCTCOG’s congestion management process, in place since 1994, relies heavily on various performance measures as the primary mechanisms for assessing levels of congestion and recommended strategies for alleviating congestion. Both observed and planning performance measures are utilized to score and rank corridors for inclusion in the Congestion Management Process. The evaluation is based on four categories including alternative roadway infrastructure, modal options, system demand, and system reliability. NCTCOG staff prepares an annual report for Travel Demand Management programs based on observed data collected by NCTCOG and partner agencies; this includes the Vanpool Program and the Regional Trip Reduction Program. Observed data is also collected and utilized to report performance measures for the Regional Traffic Signal Retiming Program.</td>
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<td>5.06 Regional Freight Planning – Regional freight planning efforts assess the impact of truck traffic, rail freight, and other freight movement issues within and through the DFW region. This task includes the collection and analysis of data pertaining to freight mobility and safety. The analysis also includes gathering performance measures useful</td>
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<td>Emphasis Area</td>
<td>Work Program Subtasks Addressing Emphasis Area</td>
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<td>Emphasis Area</td>
<td>in monitoring changes in the freight system over time. These tasks will include continued coordination with private-sector partners in the trucking, rail, and freight forwarding businesses.</td>
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<td>5.08 Railroad Crossing Coordination – Railroad crossing coordination efforts collect and tabulate railroad crossing safety and performance measures regarding the regional railroad banking program, including a closed-crossing tracking system and a database to collect credits for railroad crossing closure projects. This effort also uses performance measures to identify target areas for railroad safety educational efforts.</td>
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<td>5.08 Transportation Safety Planning – An annual report of observed safety data including crash data, Traffic Incident Management Program data, and Mobility Assistance Patrol Program data for the Dallas-Fort Worth region is developed.</td>
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<td>Regional Models of Cooperation</td>
<td>1.01 Community Outreach – Staff coordinates with transportation providers and surrounding regions to develop joint communications opportunities to improve information provided to the public.</td>
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<td>2.01 Travel Forecasting Support – Hill County, which is outside of the 12-county Metropolitan Planning Area, is included in the regional travel model due to the geography of IH 35, its split into IH 35E and IH 35W just south of the boundary, and the impact that travel on this facility has on transportation planning within the boundary. In addition, as part of the survey program and forecasting process, several coordination efforts will be made with TxDOT and local transportation agencies to avoid duplication of efforts and create a consistent and efficient analytical environment.</td>
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<td>3.01 Transportation Project Programming – Periodic coordination with other metropolitan planning organizations regarding their processes, procedures, and new developments in transportation project programming improves regional, state, and national efforts.</td>
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<td>3.02 Regional Air Quality Planning – NCTCOG staff actively participates in the Statewide Technical Working Group for Mobile Sources. With inclusion of Hood County into the Ozone Advance Program, NCTCOG continues quarterly discussions with other areas, including all of the Environmental Protection Agency's Region 6 (the five States of Arkansas, Louisiana, Oklahoma, New Mexico, and Texas).</td>
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<td>3.03 Air Quality Management and Operations – Staff coordinates with other NCTCOG Transportation program areas and Agency Administration, and communications occur between staff to ensure performing parties and activities are appropriately identified for field inspections.</td>
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<td>3.03 Air Quality Management and Operations – The following programs highlight coordination and cooperation across various boundaries:</td>
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<td>• Management and Operations Emissions Enforcement – Efforts continue for local law enforcement and the Houston and Austin areas, for both training and access to NCTCOG databases containing statewide information.</td>
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**Regional Models of Cooperation**

*Ensure a Regional Approach to Transportation Planning by Promoting Cooperation and Coordination Across Transit Agency, MPO and State Boundaries.*

To improve the effectiveness of transportation decision making, State DOTs, MPOs, and providers of public transportation are encouraged to think beyond traditional borders and adopt a coordinated approach to transportation planning. A coordinated approach supports common goals and capitalizes on opportunities related to project delivery, congestion management, safety, freight, livability, and commerce across boundaries. Improved multi-jurisdictional coordination by State DOTs, MPOs, providers of public transportation, and rural planning organizations (RPO) can reduce project delivery times and enhance the efficient use of resources, particularly in urbanized areas that are served by multiple MPOs. The MPOs can revisit their metropolitan area planning agreements to ensure that there are effective processes for cross-jurisdictional communication among State DOTs, MPOs, and providers of public transportation to improve collaboration, policy implementation, technology use, and performance management. State DOTs and MPOs can explore the opportunity to partner with RPOs to conduct transportation planning in nonmetropolitan areas.
### Emphasis Area

#### Work Program Subtasks Addressing Emphasis Area

- Low-income Repair and Replacement Assistance Program and Texas Emissions Reduction Program – Coordinating with other regional administrators in Houston and Austin on program processes, outreach efforts, and various issues to improve efficiencies and effectiveness.

- Diesel Inspection and Maintenance – Expanding coordination with Austin and Houston areas, in addition to the Department of Public Safety and TxDOT, to ensure efforts meet all needs.

- Freight Efficiency and SmartWay Efforts – Coordinating with the trucking industry to reduce emissions, which affects a large region as much of the affected truck traffic is long-haul; encouraging other agencies throughout EPA regions 6 and 7 to become engaged in promoting SmartWay strategies.

- Electric Vehicles North Texas – Carrying NCTCOG local efforts to those that comprise the Texas Triangle (Dallas, Fort Worth, Austin, San Antonio, and Houston) for broader implementation.

- Engine Off North Texas/Anti-Idling Efforts – Coordinating statewide conference calls with partner agencies across the state on two topics: improving outreach to enhance effectiveness of anti-idling efforts, and evaluating technical information related to idling.

- Alternative Fuel Corridors – In conjunction with work as DFW Clean Cities, coordinating with fellow Clean Cities coalitions, Councils of Governments, and the Texas Department of Transportation to develop consensus around submittal of a network of roadways under Section 1413 of the FASTAct.

- Volkswagen Settlement – Participating in conference calls with stakeholders across the state to proactively discuss ways in which the benefits of Volkswagen investments – primarily through the Environmental Mitigation Trust - can be optimized across Texas.

3.04 Transportation and Air Quality Communications – NCTCOG’s Clean Cities program coordinates with other regional Clean Cities programs, and communications occur between the region’s general public awareness program, Air North Texas, and other State and regional air quality awareness campaigns to ensure consistency.

3.05 Public Transportation Planning and Management Studies – Coordination is a high priority for public transportation within the NCTCOG region and across boundaries. Focusing on seamless public transportation services, planners facilitate partnerships and support scalable, region-wide programs for travel training, public information about transit options, and best practices for transit operations.

5.03 Land-Use/Transportation Initiatives – Staff participates in Bicycle and Pedestrian Planning peer exchanges in other states to provide information about various funding programs and NCTCOG initiatives.

5.06 Regional Freight Planning – NCTCOG staff serves as a technical advisor and supporter to the Texas Department of Transportation for the Texas Statewide Freight Plan. NCTCOG staff also closely coordinates with the Association of Texas Metropolitan Planning Organizations regarding freight topics germane to freight movement within Texas.

### Ladders of Opportunity

#### Access to Essential Services

- State DOTs, MPOs, and providers of public transportation, as part of the transportation planning process

- Travel Forecasting Support – Analytical tools and data collection programs are designed to forecast ridership and roadway facilities demand. As the definitions of the essential services become more established, the tools and surveys will consider them more precisely in the process.
process, are encouraged to identify transportation connectivity gaps in accessing essential services. Essential services include employment, health care, schools/education, and recreation. Suggested UPWP work tasks include developing and implementing analytical methods to identify gaps in the connectivity of the transportation system and developing infrastructure and operational solutions that provide the public, especially the traditionally underserved populations, with adequate access to essential services. Other effective work tasks could include: evaluating the effectiveness of public participation plans for engaging transportation disadvantaged communities in the transportation decision making process; updating the Section 5310 Coordinated Human Service Public Transportation Plans; assessing the safety and condition of pedestrian and bicycle facilities; and evaluating compliance with Americans with Disabilities Act, particularly around schools, concentrations of disadvantaged populations, social services, medical, and transit facilities.

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<td>3.01 Transportation Project Programming - NCTCOG has used criteria to boost ladders of opportunity via project selection for many years. For example, project selection criteria often include filling in service gaps, implementing projects in traditionally underserved communities, etc.</td>
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<td>3.02 Regional Air Quality Planning – National Ambient Air Quality Standards are set for pollutants considered harmful to public health and the environment, including protecting the health of asthmatics, children, and the elderly. NCTCOG will continue to utilize actual emissions data collected from the robust monitoring network existing in North Central Texas. This information will be monitored in analyzing spatially (where) and temporally (when) emissions, peaks, trends, locally generated, or transported, to name a few. NCTCOG will also continue to assist with new ground-level monitor expansion, keeping in mind elements such as traffic patterns, terrain, meteorological conditions, and low-income residencies.</td>
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<td>3.03 Air Quality Management and Operations – Efforts will be made to perform field inspections on performing parties and consultants to ensure activities meet agreements. This effort helps to ensure performing parties and consultants are working to meet the ongoing transportation needs of the public.</td>
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<td>3.03 Air Quality Management and Operations - Staff will continue to refine performance measures and the data utilized in order to assist in the identification of traditionally underserved populations and their connections to essential services and programs such as rural transit, alternative transportation modes, and availability of financial incentives. GIS-based analysis is used to support identification of gaps in networks of emissions-reducing activities such as deployment of electric vehicle supply equipment and electrified truck parking. NCTCOG will look towards opportunities where the existing transportation system can be enhanced to minimize exposure to harmful pollutants, such as near schools, truck stops, hospitals, low-income residencies, high-volume truck activities, and others.</td>
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<td>3.04 Transportation and Air Quality Communications – Efforts are made to inform the region of identified solutions and availabilities for addressing gaps in transportation system connectivity, with continued focus on traditionally underserved populations. Different forms of translation, media type, and format will be utilized. Results will be tied back to performance evaluation to determine effectiveness and future directions.</td>
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<td>3.05 Public Transportation Planning and Management Studies – The Regional Public Transportation Coordination Plan specifically concentrates on access to essential services throughout the region and identifies strategies to address gaps in service. This planning process also informs funding decisions for public transportation and pinpoints areas where additional coordination could increase access to services for underserved populations.</td>
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<td>4.04 Ensuring Nondiscrimination and Environmental Justice in MPO Planning/Program Activities – During the development of each long-range transportation plan, NCTCOG conducts an analysis of the impacts of the roadway and transit recommendations on the region’s population as part of a comprehensive environmental justice analysis. These measures indicate whether there are disproportionate impacts to traditionally underserved populations, such as low-income and minority groups. Among these measures is access to special generators, including universities, hospitals, and regional shopping centers. To date, no disparate impacts to protected populations have been identified through this analysis.</td>
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<tr>
<td>5.03 Land-Use/Transportation Initiatives – The Transit-Oriented Development program uses data collection and various evaluation techniques of sidewalk and bicycle infrastructure to identify connectivity gaps between more than 70 active rail stations in the DFW region and various nodes of employment and housing.</td>
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The Metropolitan Planning Organization has the continued responsibility of preparing and maintaining the various federal planning requirements including: the Metropolitan Transportation Plan, Congestion Management Process, Transportation Improvement Program, and the Unified Planning Work Program. Each of these areas, together with travel forecasting, information systems, and air quality planning, represent core planning functions of the MPO. The FY2018 and FY2019 UPWP addresses a number of interrelated multimodal transportation issues aimed at facilitating the implementation of transportation projects and programs to reduce congestion and improve mobility and air quality and are highlighted below.

The Metropolitan Transportation Plan

Mobility 2040: The Metropolitan Transportation Plan for North Central Texas was approved by the Regional Transportation Council in March 2016. The focus for FY2018 and FY2019 will be the development and monitoring of a new Plan, Mobility 2045, while continuing to coordinate Plan activities and work with federal, State, and local transportation providers to implement the recommendations contained within both Mobility 2040 and Mobility 2045, upon its approval. As the region, State, and country continue the struggle to adequately fund needed transportation improvements, innovative ways to finance projects will be a focus as will the identification of ways to make strategic improvements to the existing transportation system to allow them to function more effectively and to provide targeted capacity improvements where necessary.

Transportation Funding Initiatives, Partnership Programs, and Innovative Financing Strategies

Lack of available funding to meet critical transportation needs in the region remains a significant issue. Efforts to identify opportunities for increased revenue for the implementation of transportation improvements that result in enhanced mobility in the region will be conducted. A key initiative will be focused on working with the region’s transportation providers to move forward with implementation of transportation financing tools authorized by the Texas Legislature.
Advancing the Regional Transportation Council’s partnership programs with transportation providers and local governments will be pursued, including various Calls for Projects in conjunction with funding available from MAP-21 and the FAST Act and available revenue from the innovative financing tools authorized by the Legislature.

**Transportation System Operation**

Commuter traffic is a major concern of area travelers. Increasing traffic congestion and the resulting vehicle emissions are major problems in the region. Faced with growing travel demand and limited resources, it is important that operational management and travel demand reduction strategies are utilized. Although major capital investments are needed to meet the growing travel demand, operational management and travel demand reduction strategies complement major capital recommendations. The results are a more efficient and effective transportation system, increased mobility and leveraging of resources. Efforts will focus on implementation and monitoring of operational management and travel demand reduction strategies to maximize the capacity of the existing transportation system.

**Data Collection and Enhanced Travel Models**

Travel-related data and models are building blocks in NCTCOG’s metropolitan planning process. The data and models provide analytical capability to objectively analyze different project plans and create consistent and meaningful information about future plans. The information provides insights for the planning process, which leads to creating consensus and a sense of future among decision makers. During Fiscal Years 2018 and 2019, the emphasis on data collection and improvements to the travel model will continue. The data collection initiatives include household travel survey; transit travel survey; external travel survey; and a toll road users’ survey. Model improvements will be made as a result of these data collection efforts.
**Expedited Project Delivery**

As regional roadway and freight/passenger rail projects continue to increase in complexity, scope, and impacts, the MPO has expanded its involvement beyond its current planning and programming functions to help improve project delivery in the region. An emphasis in FY2018 and FY2019 will be to continue the technical assistance for local, regional, State, and federal partners to expedite the environmental clearance and implementation of major transportation projects, particularly those that deal with multiple transportation modes concurrently.

**Coordination of Transportation and Environmental Planning Processes**

Environmental stewardship in transportation is a key emphasis of MAP-21 and the FAST Act and is reflected through NCTCOG’s efforts to improve coordination between the long-range transportation planning and conservation planning processes. These efforts are intended to achieve benefits by incorporating environmental and community values into transportation decisions early in the transportation planning process and identify strategies to carry these considerations through project development, design, construction, and operations. NCTCOG’s enhanced review and consultation on potential environmental impacts earlier in the transportation planning process supports a decision-making process that minimizes duplication of effort, promotes environmental stewardship, and reduces delays in project implementation. Consulting with resource agencies and stakeholders to identify key environmental issues (related to both the natural and built environs) and the identification of mitigation strategies for transportation impacts and building partnerships with external entities aimed at environmental stewardship are the emphases for NCTCOG in the FY2018 and FY2019 timeframe and is carried out through several programs.
Bicycle and Pedestrian Planning

The Bicycle and Pedestrian Program provides technical assistance for the development of bicycle and pedestrian plans and facilities to local governments throughout the Dallas-Fort Worth Metropolitan Area. The program will provide safety and education outreach materials to the public and interested parties and assist with data and mapping. The Regional Veloweb and other maps included in the Metropolitan Transportation Plan will be maintained and updated. In addition, a comprehensive, regionwide approach for planning and implementing additional bicycle and pedestrian facilities across the region will be used to guide local governments in future planning efforts.

Capital Asset Management System

Transportation facilities throughout the region will experience increasing deterioration over time due to usage, age, damage from accidents, and changes in various environmental conditions. With limited dollars available for system expansion and reconstruction, limitation on available right-of-way, and growing concerns regarding the environmental mitigation of major transportation improvements, this emphasis area of Capital Asset Management will focus on identifying strategies to extend the operational life of transportation facilities by promoting the use of strategic maintenance, repair, and expansion in transportation corridors. While it is anticipated that substantial costs savings can be achieved or costs deferred, the complexity of this approach will require a high degree of cooperation among the region’s transportation partners.

Regional Freight Planning

The Dallas-Fort Worth Metropolitan Area is the largest metropolitan area of the United States without direct access to a seaport. As a result, a much greater burden is placed on the rail, trucking, and aviation modes for the shipment of commodities to, from, and through the area. NCTCOG has previously developed Freight North Texas, a document that outlines the
current state of freight activities and provides a starting point for a comprehensive freight planning exercise. This emphasis area will build on previous work to address the impact of truck traffic, rail freight, and other freight movement issues in and throughout the region.

Safety and Security in the Transportation Planning Process

Safety and security of the transportation system is a national priority and an emphasis of MAP-21 and the FAST Act. Data collection, analysis, training, education, and enforcement are key aspects of improving transportation system safety and security. The FY2018 and FY2019 UPWP includes activities intended to reduce injuries and fatalities, improve overall system security and reduce incident clearance times on freeways and tollways.

Management and Operations

Since the Regional Transportation Council funding of Management and Operations initiatives in 1999, the Metropolitan Planning Organization’s role in Management and Operations has continued to expand. These projects, oriented towards addressing the need for reducing traffic congestion and improving air quality, focus on making better use of existing resources to address regional transportation needs. A continued emphasis of NCTCOG staff in FY2018 and FY2019 will be on the implementation of the Management and Operations initiatives.

Automated Vehicle Technology

There is a substantial level of interest regarding automated vehicles and the wide variety of potential impacts this technology will have on the transportation system. Activities in FY2018 and FY2019 will plan for the arrival of these vehicles, focusing on the implications that automated vehicles may have with regard to travel demand, land use, and congestion. Planning tools, including travel forecasting models, are going to need to be able to account for these vehicles in
the system. Automated vehicles are no longer only being discussed in the context of automobile passenger travel, but also in freight, transit, and people mover/shuttle systems.

**Funding and Technical Assistance Policies**

As part of the FY2018 and FY2019 UPWP approval process, the Regional Transportation Council and the NCTCOG Executive Board reaffirmed the policies shown in Exhibit I-8 to guide the allocation of transportation planning funds.

**EXHIBIT I-8**

**UNIFIED PLANNING WORK PROGRAM POLICIES**

- The emphasis of the Unified Planning Work Program is on planning activities. Projects that require preliminary engineering or design services are not eligible for UPWP Transportation Planning Funds. Such projects should be funded through the Transportation Improvement Program process.

- Twenty-five percent of Federal Transit Administration Section 5303 Planning Funds will be reserved for transit planning and management studies with the funds distributed to the Eastern and Western Sub-regions based on the formula used for the annual sub-allocation of Transit Formula (5307) Program funds.

- The Texas Department of Transportation (TxDOT) will assist NCTCOG in funding activities related to the preparation of travel forecasts to support TxDOT freeway and high occupancy vehicle lane studies.

- The North Texas Tollway Authority will assist NCTCOG in funding activities related to the preparation of travel forecasts to support NTTA feasibility studies.

- The transportation authorities will assist NCTCOG in funding activities related to the preparation of travel forecasts to support rail and high occupancy vehicle lane studies.

- Assistance in Transportation Subarea Studies, Comprehensive/Thoroughfare Planning, Local Technical Assistance, and TransCAD Support will represent approximately 20 percent of the Unified Planning Work Program. Priority will be given to these subtasks identified in the UPWP.

- NCTCOG assistance to local governments in Thoroughfare Planning will be limited to providing travel forecasts to determine facility sizing and lane warrants, in Comprehensive Planning to providing travel forecasts and technical support, in Bicycle/Pedestrian Planning to providing technical guidance on plan and facility development, and in Travel Model Support (TransCAD) to providing model input data and application support. Local governments will be responsible for consultant assistance funding.

- For projects not specified in the UPWP, the requesting entity may be asked to assist in project funding. Scheduling of the planning study is contingent on NCTCOG staff availability.
MPO Staff Organization

In order to conduct this comprehensive, multimodal transportation and air quality planning process, the NCTCOG Transportation Department, serving as the staff of the MPO, is organized into 11 functional program areas as illustrated in Exhibit I-9. Each of these program areas is assigned staff in areas of expertise, skill, and specialization that best facilitates the needs of each program area. Program Managers oversee the activities in each of these areas and serve as the principal point of contact with the public, local governments, and transportation agencies. From time to time, staff work activities require out-of-state travel. Approval from the Texas Department of Transportation will be sought in advance.

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<th>(1) Sustainable Development</th>
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<td>(2) Transportation Project Programming</td>
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<td>(3) Congestion Management, Innovative Project Delivery, and Outreach</td>
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<td>(4) Transportation Planning</td>
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<td>(5) Air Quality Management</td>
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<td>(6) Model Development and Data Management</td>
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Exhibit I-9

NCTCOG Transportation Program Areas
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<tr>
<td>7</td>
<td>Fiscal Management</td>
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<td>8</td>
<td>Program Administration</td>
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<td>9</td>
<td>Environmental Streamlining</td>
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<td>10</td>
<td>Legal Services</td>
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<td>11</td>
<td>Automated Vehicle Technology</td>
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II. Task 1 – Administration and Management

A. Objective

Coordination, communication, and management tasks essential to maintaining the planning process are included in Administration and Management. The preparation and circulation of information relevant to regional transportation policy are major components of this task. Current legislation, the Fixing America’s Surface Transportation (FAST) Act, places emphasis on public involvement in the metropolitan transportation planning process, including the Metropolitan Transportation Plan and Transportation Improvement Program development, which is addressed in this Work Program area. Appendix G contains the Public Participation Plan, which includes a summary of ongoing public outreach activities, many of which are funded through this task, as are the outreach efforts to ensure compliance with Title VI of the 1964 Civil Rights Act.

Publication of Regional Mobility Initiatives, an educational report series begun in Fiscal Year (FY) 1996 aimed at informing the public about the ongoing transportation planning activities and air quality programs of the Metropolitan Planning Organization (MPO), is anticipated to continue in FY2018 and FY2019, as is the publication of Progress North Texas, the department’s annual state-of-the-region report. Various other public information documents are also published under this Work Program task. Activities also include development and maintenance of Web resources for efficient dissemination of electronic information.

Development and maintenance of the Unified Planning Work Program (UPWP) and annual reports documenting Metropolitan Planning Organization work performance and project expenditures, as well as support to the Regional Transportation Council (RTC), the North Central
Texas Council of Governments’ (NCTCOG’s) Executive Board, and associated technical committees are also components of this task.

Overall direction of planning activities is included in this task, together with necessary grant administration functions, including personnel management and training, purchasing, risk assessment, contract development, auditing, and internal legal services. Also included is management of computer resources and computer hardware requests necessary for transportation planning at the local level, as well as coordination activities related to the use of Geographic Information System technologies and aerial photography to support planning efforts. Management of the University Partnership Program, which draws upon the State’s academic institutions to assist MPO staff in addressing transportation and air quality planning initiatives in North Central Texas, is also included in this Work Program task.

Although not a requirement in the Unified Planning Work Program, management and operations projects that are being managed or carried out by MPO staff are included in the document in addition to planning activities. These projects are included in order to provide a more complete inventory of staff activities. These implementation projects or programs are aimed at reducing congestion and improving air quality in the Dallas-Fort Worth Metropolitan Area. Included in Task 1 are staff activities to coordinate, administer, and oversee these transportation and air quality initiatives.

B. Expected Products

Products from this task are those items needed to conduct the day-to-day operations of the North Central Texas Council of Governments’ Transportation Department in facilitating a continuous, cooperative, and comprehensive regional transportation planning process for the Dallas-Fort Worth Metropolitan Area. Committee meetings, correspondence, progress reports, financial
summaries, agreements, publications, and the various documentation needed to support this process are included in this task. Specific products are included in the subtask descriptions.

C. Previous Work

Routine Work Efforts – Daily operations of the Transportation Department of NCTCOG were supported by efforts within the areas of public outreach, program administration and office management, grant management, internal legal services, computer systems management, and quality control. These efforts continued during FY2016 and FY2017, and will carry on throughout FY2018 and FY2019. Staff supported monthly policy and technical committee meetings, which included the production of notices, agendas, minutes and supporting materials. Policy and technical committees, along with other transportation partners, were also kept updated on legislative activity relevant to transportation issues at the State and federal levels. Numerous public meetings, input opportunities, community events, social media, and print and digital media kept the public informed and engaged. Continued improvement of NCTCOG’s online presence occurred through modernizing web applications and resources, strategic website management and technical assistance. Six sets of amendments to the FY2016 and FY2017 Unified Planning Work Program and corresponding Annual Reports on Performance and Expenditures were processed. Staff continued to participate in numerous professional development opportunities. Legal support was provided to ensure compliance in federal law and regulations (e.g., MPO Planning regulations) as well as applicable state law (e.g., Public Information Act, Open Meetings Act, etc.). In addition, legal support was provided to assist with partnerships between the Regional Transportation Council (RTC), Texas Department of Transportation and other transportation providers. Efforts to maintain, protect and enhance computer resources such as computer deployment, software installations and updates, and inventory documentation, supported the entire department. A process to organize and protect GIS data was initiated, and GIS technical support continued through training and the organization of a GIS working group. Quality control
of agreements relative to equipment and facilities resulted in over 60 site visits for equipment inspections and visits to more than 50 vehicle repair facilities and dealers. Notably, a shared electronic system for documenting all Transportation agreements was created, along with new risk assessment processes and tools.

D. Subtasks

1.01 Community Outreach

This annual Work Program subtask will be conducted in FY2018 and FY2019 and includes staff activities in support of NCTCOG’s Transportation public involvement, outreach, and education program; monitoring of the regional transportation system performance and reliability; business community outreach; legislative outreach; and Internet/Intranet outreach and support improvements.

Public Involvement, Publications, and Legislative Support

Transportation Planning Funds

Staff will appear regularly at community and business events to discuss transportation and air quality matters. Efforts to ensure full and fair participation in the transportation decision-making process consistent with Title VI and Environmental Justice principles are implemented through a public/participation plan. Anticipated products include:

- Regular opportunities, including public meetings, online opportunities, and listening sessions, among others, for North Texans to learn about and provide input on transportation and air quality plans, programs and policies;
- Summaries of public input provided to the Regional Transportation Council (RTC);
- Appearances at neighborhood meetings, professional association meetings, business community/chamber of commerce meetings, and other events;
- Dynamic outreach and communications plan to continually enhance public involvement;
- Press releases and other media relations materials;
- Department newsletters including Local Motion and Mobility Matters, among others;
- Progress North Texas state-of-the-region report and other reports and brochures;
- Contributions to agency newsletters;
- Enhanced multimedia and social media presence;
• Summaries of activity in the Legislature and Congress relating to Metropolitan Planning Organization functions;
• Legislative testimony;
• RTC state and federal legislative programs; and
• Regular updates to policy and technical committee members on legislative initiatives related to RTC priorities.

Other Funding Sources

NCTCOG local funds will be utilized to support activities that are not eligible for federal reimbursement. Such items may include:

• Meal expenses;
• Travel expenses; and
• Special meetings with state or federal elected officials.

Internet/Intranet Outreach and Support

Transportation Planning Funds

This element is ongoing throughout both FY2018 and FY2019, providing technical support for regional committees, public information and participation efforts and the transportation planning process. This includes the ongoing creation, maintenance and modernization of Web resources presented externally and internally on the Internet/Intranet sites. Anticipated products include:

• Website edits, updates and maintenance;
• Website content development, including articles, public information resources and program area updates;
• Review of Web design/interface for enhanced usability;
• Web application development and support;
• Websites and applications available on the most common browsers and an improving mobile experience;
• Performance reports of Web page usage, including analytic assistance;
• Assessment and improvement of visual architecture, accessibility, and usability;
• Web pages and applications audited and reviewed for internal standards/branding and security (QA/QC);
• Standards for search engine optimization;
• Software upgrades, including migration of web assets and content to a new content management platform;
• Microsoft ERP: CRM 2016 and SharePoint 2013 development/administration; and
• Internal training opportunities.

1.02 Program and Policy Administration

Management and administrative activities conducted by the MPO staff support operations of the NCTCOG Transportation Department and implementation of all projects. Activities such as development, monitoring, and coordination of the Unified Planning Work Program and necessary modifications; preparation of the Annual Performance and Expenditure Report; personnel and recruitment support; risk assessment; process development; committee support; legal review of agreements and policies; and general office management are included in a cost allocation plan. Costs are allocated to all projects, including projects funded with Transportation Planning funds and other funding sources. These costs are included in the funding summaries for each Task. Program administration efforts described below include activities that may be excluded from the cost allocation plan and charged directly to the funding sources identified.

Program Administration

Transportation Planning Funds

This subtask includes management and administrative activities that directly support the NCTCOG Transportation Department’s role as the Metropolitan Planning Organization and fulfillment of responsibilities outlined in regulations governing the administration of Federal Highway Administration Transportation Planning Funds. This subtask is ongoing throughout Fiscal Years 2018 and 2019, and includes participation in and support for the Association of Metropolitan Planning Organizations (AMPO), the Texas Metropolitan Planning Organization (TEMPO), and the Transportation Research Board (TRB). Additionally, this subtask includes oversight and coordination of the NCTCOG University Partnership Program. Anticipated products include:

• NCTCOG representation at AMPO and TEMPO meetings;
• NCTCOG participation in the TRB annual meeting and other conferences and professional development opportunities;
• Hosting and provision of training opportunities for local government, transportation providers, and planning agency staff;
• Appropriate office accommodations for staff and guests, including provision of consumable supplies, furniture, and leasehold improvements;
• Project topics for participation in the University Partnership Program;
• Assistance to the Texas Transportation Commission, as requested;
• Participation on and support for special task forces;
• Eligible and accurate billings within identified budgets;
• Agreement between the Texas Department of Transportation, the North Central Texas Council of Governments, and the Regional Transportation Council outlining continuing responsibilities of the Metropolitan Planning Organization.

Other Funding Sources

NCTCOG and RTC Local funds will be utilized to support activities in Program Administration that may not be eligible for federal reimbursement. Such items may include, but are not limited to:

• Small stipend and travel expenses for a minority student and supporting professor to attend annual TRB meeting to represent work conducted on behalf of NCTCOG under the TRB Minority Student Fellowship Program partnership;
• Meal expenses;
• Individual staff memberships in professional organizations;
• Service awards;
• Travel expenses for foreign applicants;
• Legal and application filing fees for foreign employees;
• Audio/video expenses (i.e., equipment and maintenance) in the Transportation Council Room (as noted in Exhibit II-2 of Subtask 1.04); and
• Other special projects.

Policy and Project Coordination

Other Funding Sources

This element is ongoing throughout both FY2018 and FY2019, providing contract management and legal support. Among these activities is staff legal assistance relative to coordination for Regional Transportation Council policies and projects; evaluation, development, and negotiation of legal instruments and mechanisms to implement MPO programs and initiatives; enhancements of resources and compliance mechanisms related to the Disadvantaged Business Enterprise (DBE) Program; outreach to the vendor community to raise awareness of the DBE program; and development of new partnerships with regional and state certification agencies. Surface Transportation Block Grant Program funds, supported by Transportation Development Credits will be used for this effort. Anticipated products include:

• Assistance to the Texas Department of Transportation, as requested;
• Participation on and support for special task forces;
• Identification of federal and State laws to support policy decisions;
• Identification of institutional mechanisms to implement policies and projects;
• Executed contracts and/or agreements and amendments;
• Education, outreach, events, and workshops with potential bidders/consultants;
• Website content updates, including traditional and new media tutorials for potential bidders/consultants;
• Collaboration and new partnerships with regional and State DBE certification agencies, such as the North Central Texas Regional Certification Agency.

1.03 Fiscal Management and Information Systems

The North Central Texas Council of Governments staff continues to support diverse programs, providing opportunity to facilitate projects with unique and innovative funding methodologies. This subtask includes work activities and strategies to enable effective fiscal coordination and streamlined accounting. Some fiscal management and information systems activities, such as enhancement of procedures; development of financial management tools; compilation, assessment, and coordination of the NCTCOG Transportation Department annual budget; and accounting support activities and fiscal management processes are included in a cost allocation plan. These costs are included in the funding summaries for each Task. The activities described below may be excluded from the cost allocation plan.

Comprehensive Fund Management

Other Funding Sources

During FY2018 and FY2019, NCTCOG Local and RTC Local funds will be utilized to support certain fiscal processes and fulfill financial commitments. Such items may include:

• Local match to support TxDOT Direct State Costs for State-administered projects; and
• Other costs to supplement project implementation.

Fiscal Information Systems

Other Funding Sources

An extensive information system is utilized for overseeing the transportation fiscal management activities. This information system is constantly being expanded and improved upon to meet ever-evolving project management and reporting needs, including the following:

• Tracking grant and project management activities;
• Providing information for better and more consistent project management; and
• Generating reports for policy officials, members of the public, partners and consultants, and agencies providing funding for projects.

This element is ongoing for FY2018 and FY2019, and will specifically focus on modernizing and streamlining the current fiscal management information, transitioning from an Access-based interface to a web-based interface. Additionally, other code will be updated to improve the
efficiency and reliability of the system. Surface Transportation Block Grant Program funds, supported by Transportation Development Credits, will be used for this effort. Anticipated products include:

- Web-based fiscal forms for NCTCOG staff.

Innovative Transportation Financing Strategies

Other Funding Sources

Ongoing throughout FY2018 and FY2019, the focus of this work program element is to explore innovative transportation financing and funding strategies as authorized by State and federal law. Innovative funding tools allow for enhanced flexibility in meeting critical transportation needs. The Regional Transportation Council, in partnership with transportation providers in the Dallas-Fort Worth area, is pursuing many of these strategies including the use of innovative public and private partnerships, State Infrastructure Bank loans, Transportation Infrastructure Financing and Innovation Act loans, tax increment financing, transportation reinvestment zones, and value capture mechanisms through municipal land-use authority. In addition, staff will explore the institutional structures, partnerships, and agreements necessary to leverage these innovative financing and funding tools in the Dallas-Fort Worth region. Lastly, staff will continue to monitor and track existing and proposed innovative financing partnerships and funding. Regional Toll Revenue funds will support work activities. Anticipated products include:

- Innovative finance policies and strategies;
- Assessments of State and federal legal authority; and
- Presentations and informational materials.

1.04 Computer System Administration and Application Coordination

The overall goal of this subtask is to provide NCTCOG staff with the tools and technical support needed to complete work tasks in an efficient and timely manner. Computer resource management activities are conducted by the MPO staff in support operations of the NCTCOG Transportation Department and implementation of all projects. Activities such as planning for, monitoring, and coordinating computer and software replacements and upgrades, as well as various audio/video, computer and computer-related staff support and system maintenance functions are included in a cost allocation plan. Costs are allocated to all projects, including projects funded with Transportation Planning Funds and other funding sources. These costs are included in the funding summaries for each Task. Efforts described below include activities that may be excluded from the cost allocation plan and charged directly to the funding sources identified.

Computer Resource Management and Equipment Purchases

Transportation Planning Funds

This subtask is ongoing throughout FY2018 and FY2019. It includes software and hardware purchases or leases. As NCTCOG continues with the production of travel forecasts using the
enhanced TransCAD model in a desktop computer/file and network server environment internal to the agency, additional computer hardware will be required. This will consist of desktop microcomputers, application groups of new TransCAD computers, network interconnection support, and additional software. Consultant assistance may be pursued to assist with this task. The list of equipment and software purchases for which Transportation Planning Funds will be utilized is provided as Exhibit II-1. Equipment and software purchases over $5,000 per unit require prior State and Federal approval. Anticipated products include:

- Replacement of computers that are out of warranty; and
- Software ordered.

**EXHIBIT II-1**

**PLANNED COMPUTER SOFTWARE AND EQUIPMENT PURCHASES/LEASES USING TRANSPORTATION PLANNING FUNDS**

<table>
<thead>
<tr>
<th>QUANTITY</th>
<th>DESCRIPTION</th>
<th>ESTIMATED PRICE</th>
</tr>
</thead>
<tbody>
<tr>
<td>110</td>
<td>Microcomputer systems (desktops, portable, tablet)</td>
<td>$275,000</td>
</tr>
<tr>
<td>8</td>
<td>Laser printers for network group usage</td>
<td>$76,000</td>
</tr>
<tr>
<td>12</td>
<td>High-end modeling computers</td>
<td>$240,000</td>
</tr>
<tr>
<td>20</td>
<td>Voice-over-Internet-Protocol (VoIP) phone devices, including accessories such as microphones for conference phones or hands-free devices.</td>
<td>$8,000</td>
</tr>
<tr>
<td>---</td>
<td>Other computer hardware items, replacements, accessories, and upgrades (for example, text and image scanners, hard drives, additional RAM, projectors, monitors/televisions, video cards, digital data tapes, network cards, network cabling, warranty extensions)</td>
<td>$23,000</td>
</tr>
<tr>
<td>---</td>
<td>Licenses to traffic simulation and assignment software packages (two “TransModeler” and one “DTA” dynamic)</td>
<td>$10,000</td>
</tr>
<tr>
<td>---</td>
<td>Two years of software support by Caliper and specific renewal for 50 TransCAD licenses</td>
<td>$150,000</td>
</tr>
<tr>
<td>---</td>
<td>Software purchases/upgrades (for example, the current or higher versions of: SPSS and Adobe licenses), software/services, cable service, application subscriptions, advanced mapping/presentation software, and software support renewals - Other</td>
<td>$60,000</td>
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<tr>
<td>---</td>
<td>Web-based traffic count reporting software (funding to support this purchase is included in Subtask 2.02)</td>
<td>$30,000</td>
</tr>
</tbody>
</table>
Other Funding Sources

Additional digital equipment, software and services funded by other sources are provided in Exhibit II-2. The funding is programmed in the appropriate subtask for the work.

EXHIBIT II-2
PLANNED COMPUTER SOFTWARE AND EQUIPMENT PURCHASES USING OTHER FUNDING SOURCES

<table>
<thead>
<tr>
<th>QUANTITY</th>
<th>DESCRIPTION</th>
<th>ESTIMATED PRICE</th>
</tr>
</thead>
<tbody>
<tr>
<td>---</td>
<td>Automated bicycle and pedestrian count equipment (Subtask 5.03)</td>
<td>$16,000</td>
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<tr>
<td>---</td>
<td>Web hosting and maintenance for Air North Texas and Clean Cities Coalition (Subtask 3.04)</td>
<td>$3,000</td>
</tr>
<tr>
<td>---</td>
<td>Tablets and audio, video, camera equipment for outreach and education (Subtask 3.04)</td>
<td>$28,500</td>
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<tr>
<td>---</td>
<td>Audio/video equipment, updates, and maintenance for the Transportation Council Room (Subtask 1.02)</td>
<td>$84,000</td>
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</table>

Regional Aerial Photography

Other Funding Sources

Carrying over from FY2017, this project will produce high-resolution color digital orthophotography for areas of North Central Texas. Data will be collected using a high-resolution aerial mapping camera and a high-accuracy Global Positioning System. Digital orthophotos will be created using industry-accepted procedures and standards, and image accuracy will be ensured through ground control and surface integration. The resulting photos will be used for a wide variety of planning purposes, including improvements to travel demand modeling, corridor alignment planning, outer loop planning, and population/employment change tracking. In addition, there may be some enhanced aerial photography needs specifically for aviation planning purposes. This work will be supported through Surface Transportation Block Grant Program funds and Texas Department of Transportation funds. Anticipated products include:

- Digital orthophotos for use in a wide variety of planning purposes.

Geographic Information Systems Coordination

Transportation Planning Funds

This element is ongoing throughout both FY2018 and FY2019 and seeks to manage, coordinate and effectively utilize Geographic Information System (GIS) technologies to support transportation planning. This may include development, research, training, technical support and software and data maintenance. Anticipated products include:
• GIS dataset and resource management and organization;
• GIS training;
• Map design and creation; and
• GIS analysis services.
### E. Funding Summary

<table>
<thead>
<tr>
<th>Subtask</th>
<th>TPF¹</th>
<th>Additional Funding</th>
<th>Total</th>
</tr>
</thead>
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<tr>
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<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td><strong>Amount</strong></td>
<td><strong>Source</strong></td>
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<td>1.01</td>
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<td>1.02</td>
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<td>Local</td>
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<td></td>
<td></td>
<td>$125,800</td>
<td>NCTCOG Local</td>
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<td></td>
<td></td>
<td>$293,500</td>
<td>STBG</td>
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<tr>
<td><strong>Subtotal</strong></td>
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<td></td>
<td>$1,191,500</td>
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<tr>
<td>1.03</td>
<td>$50,000</td>
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<td></td>
<td></td>
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<td>RTR</td>
</tr>
<tr>
<td></td>
<td></td>
<td>$255,800</td>
<td>STBG</td>
</tr>
<tr>
<td><strong>Subtotal</strong></td>
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<td></td>
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<tr>
<td>1.04</td>
<td>$1,119,800</td>
<td>$690,040</td>
<td>STBG</td>
</tr>
<tr>
<td></td>
<td></td>
<td>$173,760</td>
<td>TXDOT</td>
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<tr>
<td><strong>Subtotal</strong></td>
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<td></td>
<td>$1,983,600</td>
</tr>
<tr>
<td><strong>Total</strong></td>
<td>$4,790,200</td>
<td>$1,932,600</td>
<td>$6,722,800</td>
</tr>
</tbody>
</table>

¹ Transportation Planning Funds (TPF) includes both FHWA PL-112 and FTA 5303 funds. TxDOT will apply transportation development credits sufficient to provide the match for FHWA PL-112 and FTA Section 5303 programs. As the credits reflect neither cash nor person-hours, they are not reflected in the funding tables.
III. Task 2 – Transportation Data Development and Maintenance

A. Objective

The objective of this task is to produce analytical tools to support transportation planning, air quality conformity, congestion management, and transportation project studies, and to provide technical assistance to local governments for demographic and travel forecasting. The activities in this task also intend to make the analytical tools available to wider groups of potential users such as the general public and other local entities.

Analytical tools include forecasting models and the compilation of data from different sources. These data sources are associated to a wide variety of aspects that include transportation demand, infrastructure, land use, population, and employment, among others. The tasks performed include development of simulation tools used in forecasting and the dissemination of results and data. The results from forecast models are used in the decision-making process associated to current and future investments. These models are built based on the data sources and are sensitive to the planning policies under consideration.

The data sources cover a wide range of system and user data. The system data has two components: 1) data collected about usage of the transportation system such as traffic counts, delay, congestion, location of signals, transit boarding, high-occupancy vehicles (HOVs), travel time, and truck volumes and 2) geographically referenced information such as physical and political boundaries, roadway network, census data, and aerial photography. The user data encompasses items that are associated with the demand for the existing transportation system which are often obtained through interviews and surveys. These surveys intend to capture the following aspects: travel pattern of the residents, mode of travel in the region, time of travel, travel demand for businesses, and truck demand by establishment type. The data inventory for both of these components is a major part of this task.
There are two major sets of forecasting models as part of this task. The first set corresponds to transportation models that encompass the majority of the modeling activities which are mainly associated to long-range planning, but that can also be useful in some short-range planning practices, detailed analysis and operational studies.

The second set of models is those related to the demographic forecasting process. The main output of these models is the geographically referenced demographic forecast that is used in long-range planning and air quality conformity. These models can also provide intermediate and short-range demographic data for staging the long-range plan and for the determination of air quality emission budgets.

Other activities in this task also cover the maintenance, training, dissemination of data and model products for application by specific analyses that include programming, website creation, and database implementation; the required management and maintenance of these products is also considered.

B. Expected Products

The products of this task include a set of computer application programs, training material, databases, reports, and websites that enable the NCTCOG staff, member agencies, local governments, consultants and the general public to review transportation studies. To provide meaningful information for the public, the websites are designed to be intuitive and simple to use, allowing access to large and detailed datasets. Specific products from each subtask are provided in the following descriptions.
C. Previous Work

Routine Work Efforts – The collection and preparation of data, development of analysis tools, tool and program training, and database maintenance are ongoing activities in Task 2. These efforts will continue in FY2018 and FY2019. The regional travel demand model served as a resource for numerous activities conducted by staff and by partner agencies, including the Metropolitan Transportation Plan (MTP), the Transportation Improvement Program, and transit agency planning, among others. The model was maintained operationally, and technical support was provided for users. Maintenance and technical support of databases for performance measures, traffic counts and speed data continued. The NCTCOG website was used to deliver this data to local partners and the public. Geographic Information System-based roadway and transit networks were developed and maintained for forecasting purposes in air quality analysis, the MTP, and corridor studies. Notable elements and surveys for Travel Forecasting Support are listed in the table below. Development of a forecast for 2045 was completed in preparation for development of Mobility 2045.

Non-Routine Work Efforts:

The status of significant or one-time work efforts contained in Task 2 is provided in the table below:

<table>
<thead>
<tr>
<th>PROJECT</th>
<th>ACCOMPLISHMENTS TO DATE</th>
<th>REASON FOR CARRYOVER TO FY2018</th>
<th>ANTICIPIATED COMPLETION</th>
</tr>
</thead>
<tbody>
<tr>
<td>Documentation of the Model Needs and Development Process</td>
<td>Draft documentation of the new model was created for approximately one third of the model parts.</td>
<td>Work is continuing on this multi-year project</td>
<td>FY2018</td>
</tr>
<tr>
<td>Household Travel Survey</td>
<td>Meeting and technical presentations facilitated coordination with TxDOT and federal partners.</td>
<td>This project is a multi-year project and a new phase will begin in FY2018</td>
<td>FY2019</td>
</tr>
<tr>
<td>Airport Passenger Survey</td>
<td>Surveys completed for DFWIA and Dallas Love Field. Final report prepared and project completed in FY2016.</td>
<td>n/a</td>
<td>n/a</td>
</tr>
<tr>
<td>Transit Travel Survey</td>
<td>Project completed in FY2016. The final database and an online visualization website were made</td>
<td>n/a</td>
<td>n/a</td>
</tr>
</tbody>
</table>
### III. Task 2 – Transportation Data Development and Maintenance

#### PROJECT

<table>
<thead>
<tr>
<th>PROJECT</th>
<th>ACCOMPLISHMENTS TO DATE</th>
<th>REASON FOR CARRYOVER TO FY2018</th>
<th>ANTICIPATED COMPLETION</th>
</tr>
</thead>
<tbody>
<tr>
<td>Data-supported Transportation Operations and Planning Center Partnership (Note: funding source is local funds)</td>
<td>available to NCTCOG staff and regional transportation authorities.</td>
<td>This project is in the second phase of a multi-year project.</td>
<td>FY2018</td>
</tr>
</tbody>
</table>

#### D. Subtasks

2.01 Travel Forecasting Support

The purpose of this subtask is to provide analytical tools for travel forecasting within the Metropolitan Planning Area (MPA). The forecasting tool set includes various arrays of data, mathematical models, computer programs, and information system products. These tools are used in essential functions of the Metropolitan Planning Organization. These functions include the long-range metropolitan transportation plan, transportation improvement program, congestion management process, safety and security program, air quality conformity analysis, roadway and transit alternative analyses, subarea studies, thoroughfare planning, environmental statements, and technical assistance to local public agencies. This subtask is closely complemented by subtasks 2.02 and 2.03, which are related to data management and demographic forecasting, respectively. The components of this subtask are described below.

Regional Travel Model - Maintenance

*Transportation Planning Funds*

This component covers activities related to the maintenance of the existing regional travel model (RTM), which is the main tool in the analytical tool set of the subtask. The existing RTM is a collection of computer program software applications, training materials, and documents used by transportation analysts for planning the projects and policies in the region. The regional travel model includes Hill County in addition to the 12 counties that comprise the Metropolitan Planning Area (MPA) due to the fact that the southern split of IH 35 is located within the boundary of this county and because of the impact that this facility has on transportation planning within the MPA. The tasks in this component are divided into two sections: the existing RTM, and the information system for transportation supply system. One University Partnership Program project is also included in this component to support the tasks.

The existing RTM is called the Dallas-Fort Worth Regional Travel Model for the Expanded Area (DFX). The tasks related to the DFX are grouped into maintenance and operation (M&O) of the DFX, and ongoing training and documentation of the changes to the DFX. Maintenance and operation activities include technical support, software updates, version maintenance, file backup and archiving, incorporation of updates, and providing services to the Texas Department of Transportation (TxDOT) and member local governments. The technical support may include...
enabling the local governments or agencies to have access to DFX. Training and documentation includes training model users and updating documents to reflect the latest changes. The documentation may include creation of validation reports to benchmark the performance of the model.

The activities related to the transportation supply system are categorized into development of transit networks, development of roadway networks, and software and hardware design. Transit networks represent fixed routes of public transit in the region obtained from three local transportation agencies. The roadway network is a geographic information system of all roadways except local access roads. These networks are maintained in an information system that is supported by a software application and special hardware.

The University Partnership Program (UPP) projects will study managed lanes in travel modeling. The North Texas region has several managed lanes that serve travelers with reliable travel times. The Managed Lanes UPP project will enhance NCTCOG’s travel model forecasting capabilities with regard to managed lanes. The study will involve the inclusion of travel time reliability on managed lanes, as well as determine the value of time to the users of these facilities. Travel time reliability measures the probability of on-time arrival of the trips experienced by travelers due to uncertainties present in the roadway network. Project results will be used to help guide long-term transportation planning decisions.

The existing RTM components and sub-components are ongoing throughout FY2018 and FY2019. Anticipated products include:

- model software application;
- training material, documentation, and reports;
- technical services;
- transit and roadway networks; and

Regional Travel Model – Next Generation

Other Funding Sources

This component covers activities related to the next generation regional travel model (RTM), which is the main tool in the analytical tool set of the subtask. The next generation RTM is a collection of computer program software applications, training materials, and documents used by transportation analysts for planning the projects and policies in the region. The next generation RTM encompasses model development, software and hardware design, and documentation. The model development portion includes conversion of data from travel surveys into estimation data sets, and calibration of the various sub-models of the next generation RTM. The software and hardware activities include software design and implementation of the application software, and development specifications of the hardware on which the next generation RTM will run. The documentation explains the development process and the performance of the developed model.

A University Partnership Program (UPP) project on the Behavioral Estimation of Origin-Destination (OD) Trip Tables is also included in this component. The purpose of this project is to create a method of estimating travel demand based on trip generation/distribution and traffic counts. The challenge of the traditional method is that the estimation of travel demand is based
III. Task 2 – Transportation Data Development and Maintenance

on traffic counts, and the connection between trip generation/distribution is lost. This initiative will
develop and implement a method that can change trip generation/distribution parameters to result in
a traffic assignment that matches traffic counts.

Additionally, this subtask provides for technical communication and participation at the state and
national levels to ensure the travel models are developed in a coordinated manner according to
future needs and expectations.

Surface Transportation Block Grant Program funds, as well as Transportation Development
Credits will be utilized to support work efforts in FY2019. Anticipated products include:

- model software application;
- documentation, and
- reports.

Alternative Transit Ridership Models

Transportation Planning Funds

This component encompasses the development or adoption of simplified transit ridership models
that can produce quicker results than the regional travel model. The purpose of these models is
to provide a faster alternative method for preliminary analysis of transit lines in short-range time
horizons. This work will be done in coordination with the Federal Transit Administration and other
planning and transit agencies. It is anticipated that Dallas Area Rapid Transit (DART), the Fort
Worth Transportation Authority (FWTA, also known as Trinity Metro), and the Denton County
Transportation Authority (DCTA) will use the products of this effort for transit planning and
enhancement of modeling tools for transit studies. This component will begin in FY2018 and
conclude in FY2019. Anticipated products include:

- A simplified direct model for estimation of ridership.

Documentation of the Model Needs and Development Process

Other Funding Sources

Activities in this element will document the thought process and significant decision-making
challenges that are encountered through development of the intermediate-range plan for travel
data and models. The goal of this project is to produce presentable material for the Federal
Highway Administration (FHWA) to be shared with other planning agencies as an example of
good practice. Work efforts are funded through a grant from FHWA and Transportation
Development Credits. This component will be ongoing throughout FY2018. Anticipated products
include three main categories of material:

- Document describing the expectations from the travel demand model in practical
  applications, defining a framework for long-range activities;
- Several documents and material describing the calibration and validation process for each
  model component; and
• Presentation material for the FHWA Travel Model Improvement Program in various subjects of the model system developments.

Development of a Regional Dynamic Traffic Assignment Model

Other Funding Sources

Dynamic Traffic Assignment (DTA) represents a further improvement upon the existing time-of-day static assignment as it seeks to provide a more detailed means to represent the interaction between travel choices, traffic flows, and time and cost measures in a temporally coherent manner. Specifically, dynamic traffic assignment models aim to describe such time-varying network and demand interaction using a behaviorally sound approach. The foundations for a DTA will be set and its implementation will start using available software applications in the industry. This activity will include the collection of detailed operational data, such as traffic counts by time of day. This component will be an ongoing activity in FY2018 and FY2019. Surface Transportation Block Grant Program funds, local funds, and Transportation Development Credits will be utilized to support work activities. Anticipated products include:

• A DTA model and software integrated in the regional travel model.

Regional Travel Data Collection

Other Funding Sources

This element includes traffic and travel data collection and surveys. Specific survey initiatives include household, toll road user, transit, and external surveys. These efforts will result in the creation of several travel databases that will be used in the development of new travel forecasting tools. Major projects in this area are described below:

Household Travel Survey – NCTCOG, in collaboration with TxDOT, has joined the FHWA-managed National Household Travel Survey (NHTS) 2016 project, which utilizes consultant assistance. The estimated overall household samples in the 12-county Metropolitan Planning Area are expected to be approximately 8,500. The final survey results will be available in FY2018. NCTCOG staff will continue to analyze and summarize NHTS 2016, as well as previous household surveys during FY2019. Surface Transportation Block Grant Program and local funds, as well as Transportation Development Credits will be utilized to support work efforts. Anticipated products during FY2018 and FY2019 include:

• Travel survey documentation; and
• Travel survey databases.

Transit Travel Survey – NCTCOG, in coordination with DART, DCTA, and FWTA, will prepare to conduct a regional transit onboard survey beginning in FY2019. This survey will be heavily used in updating the travel demand model. In addition, in FY2018 an Automatic Traffic Count Validation study will be conducted for the Fort Worth Transportation Authority. This study involves a comparison of automatic passenger counters (APCs) against observed passenger
counts to validate the accuracy of the APC devices. Consultant assistance will be utilized. Surface Transportation Block Grant Program funds and local funds will be utilized to support work efforts. Anticipated products include:

- Report on the APC count comparison for FWTA;
- Scope of work for the regional transit onboard survey; and
- Interagency agreements.

**External Travel Survey** – In cooperation with TxDOT and the Texas Transportation Institute, an external travel survey began in FY2016. This survey includes innovative approaches in data collection, such as cellphone location data, Global Positioning System data, and the deployment of Bluetooth reader devices in the region. Staff activities for FY2018 will include coordination of the technical process, analysis of data, and analyzing the data products. The project will be completed in FY2018 when final survey results are expected. Work efforts will be supported through Surface Transportation Block Grant Program and local funds, and Transportation Development Credits. Anticipated products during FY2018 include:

- Intermediate progress reports; and
- Databases for external-external and external-internal trips.

**Toll Road User Survey** – In cooperation with the North Texas Tollway Authority, NCTCOG will conduct a survey of toll and non-toll users in several corridors related to the socio-economic characteristics of the travelers and to their trip behavior, and their willingness to pay for use of the tolled facilities. This study will also be used in an evaluation of environmental justice related to building the tolled facilities. Final survey results are expected in FY2019. Consultant assistance will be utilized. Work efforts will be supported through Surface Transportation Block Grant Program funds and Transportation Development Credits. Anticipated products during FY2018 and FY2019 include:

- Intermediate progress reports; and
- Toll road user travel database.

**Travel Model Network Development and Maintenance**

*Transportation Planning Funds*

Included in this element are the development and maintenance of geographic electronic roadway and transit network files used in travel demand modeling. Staff will monitor local and regional transportation improvements in order to develop and maintain a current-year network and various forecasted networks. Activities will be ongoing throughout FY2018 and FY2019. Anticipated products include:

- Current-year transportation network;
III. Task 2 – Transportation Data Development and Maintenance

- Roadway and transit networks for the Metropolitan Transportation Plan and Air Quality Conformity analysis;
- Roadway and transit networks for specific roadway and transit corridor studies;
- Network Development and Maintenance Program that is administered to continually evaluate network quality control through the review of existing and proposed transportation networks; and
- GIS-based roadway and transit networks for use in roadway corridor, transit corridor, and thoroughfare studies and as a response to technical assistance requests.

2.02 Transportation Data Management

This subtask complements the analytical tool sets of Subtask 2.01 and provides data products for virtually all planning activities in the department. The components of this subtask are related to data collection, organization and management, and dissemination of information in the forms of services and websites. Coordination with internal and external entities plays an important role in efficiency of data products and activities. Therefore, one important component of this section focuses on this area of work.

Coordination with Data Providers

Transportation Planning Funds

The activities considered in this component focus on establishing communication and collaboration agreements with agencies and cities that regularly collect transportation performance data. The goal of these activities is to obtain the most recent and accurate data from these agencies so that it can be used in the transportation planning process. These data include, among others, the following items: traffic counts, transit ridership, travel times, speeds, lane occupancy, vehicle occupancy on special purpose lanes, airport movements, toll transactions, vehicle registrations, inventories, and vehicle miles traveled. This component also considers building consensus among stakeholders, participating in decision making and setting guidelines for the collection, integration, and analysis of transportation data. A privacy protocol for data maintenance will be created to ensure privacy protection of public participants in NCTCOG surveys and data collection programs. It will provide assurance for data providers that their data will not be shared with competitors without permission. This component will be an ongoing activity in FY2018 and FY2019. Anticipated products include:

- Datasets from the Texas Department of Transportation (TxDOT), North Texas Tollway Authority (NTTA), Federal Highway Administration (FHWA), Dallas Area Rapid Transit (DART), Fort Worth Transportation Authority (FWTA), Denton County Transportation Authority (DCTA), Dallas Fort Worth International Airport (DFWIA), and other agencies and cities;
- Database with contact information;
- Privacy guidelines for data security; and
- Agreements with agencies.
Integration of Data

*Transportation Planning Funds*

This component encompasses the development of methods and computer tools to facilitate and optimize the integration of the data collected by NCTCOG or provided by participating agencies. The purpose of this effort is to provide better access to the transportation data by staff, stakeholders, and the public. The datasets assembled by NCTCOG from participating agencies and cities will be transferred from their original files into spatial SQL Server databases and GIS layers. Examples of these datasets are the traffic count files from TxDOT; the travel time data that FHWA delivers as part of the National Performance Management Research Dataset (NPMRDS); and the ridership statistics, routes, and schedules compiled by regional transportation agencies. Consultant assistance will be utilized. This component will be an ongoing activity in FY2018 and FY2019. Anticipated products include:

- Database for traffic counts;
- Database for speed and travel-time data;
- Geographic databases of transportation inventories;
- Databases for several transportation performance measures; and
- Web-based traffic count reporting (software request inventoried in Subtask 1.04).

Dissemination of Data

*Transportation Planning Funds*

This element focuses on building graphic user interfaces that allow the public to generate reports, maps and summaries of assembled transportation data. Activities involve the development and maintenance of websites that allow users to see relevant and detailed data. This component will be an ongoing activity in FY2018 and FY2019. Anticipated products include:

- Website for traffic counts;
- Website for speed and travel-time data; and
- Website for transportation performance measures.

Analysis of Data

*Transportation Planning Funds*

This item refers to the support of staff and stakeholders for specific analyses of the integrated transportation data. Analyses of transportation data related to air quality, traffic accidents, vehicle detectors, travel times, historical transportation-related measures and gasoline consumption and correlations with the Census and American Community Survey. This element is ongoing throughout FY2018 and FY2019. Anticipated products include:
• Summaries and reports;
• Performance charts; and
• Static and animated maps.

**Transit Fare Box Data Analysis**

**Other Funding Sources**

DART and FWTA transit networks are equipped with electronic fare collection systems. These systems produce a large amount of data about the travel patterns of transit users, but has not been fully analyzed yet. This element includes the comprehensive analysis of this dataset that will contribute to the improvement of the transit assignment model and assist the transit agencies in better understanding the system through accessing boarding counts. Consultant assistance may be utilized. Federal Transit Administration funds, Regional Transportation Council Local funds will be used to conduct this planning study scheduled to begin in FY2018. Anticipated products include:

• Various databases;
• Intermediate progress reports; and
• Software programs.

**Data-Supported Transportation Operations and Planning (D-STOP) in the Dallas-Fort Worth Area**

**Other Funding Sources**

Through the University Partnership Program, NCTCOG will participate in D-STOP research activities that focus on harnessing innovative technologies and data sources to develop architectures and systems for data collection and analysis. Some of these can be directly applied today in the operation or long-range planning of transportation systems and some will support next-generation methods for operations and planning. These methods will be useful for evaluating proposed solutions with a broad range of metrics (e.g., reflecting multimodal or equity issues), with greater accuracy and precision than before and for allocating scarce funding in a way that maximizes the potential for equitable economic growth. Regional Transportation Council Local funds will be utilized. Anticipated products include:

• Reports that provide guidance and methods for using data from emerging transportation technologies such as automated vehicles in modeling, forecasting and planning;
• Scenarios and probability ranges relating to emerging transportation technologies and business models (e.g., shared mobility) on key elements going into transportation modeling and planning;
• Reports and guidance on the nature and pace of the adoption of emerging transportation technologies and business practices;
• Analyses of consumer and market responses to emerging transportation technologies and business practices; and
• Analyses of the impact of emerging transportation technologies and business practices on infrastructure and vehicular elements relating to transportation.

2.03 Demographic Data and Forecasts

The purpose of this subtask is to create data products and models related to land use and demographic data in the region. These products will be used for planning and transportation projects. The subtask is closely associated with Subtask 2.01 for compatibility of data. The activities related to this subtask are grouped into inventory of land-use and demographic data, creation of demographic forecast, and defining census statistical geographies.

Inventory of Land-Use and Demographic Data

Transportation Planning Funds

The purpose of this item is to create an inventory of land-use and demographic data through communications with local agencies and government entities, and to conduct independent analysis. This item includes development of up-to-date city boundaries; compilation of land-use inventories in the region into a single information system; refinement of Census 2010 and American Community Survey databases; identification and tracking of developments with at least 80,000 square feet, 80 housing units, or 80 employees on site; estimation of the employment demographic data for sub-county areas; and technical support. Data acquisition and purchases may be needed for this item. Ongoing throughout FY2018 and FY2019, anticipated products include:

• Geographic Information System Layer file of updated city boundaries;
• An information system of the inventory of land, based on uses such as residential, commercial, and industrial;
• Processed decennial US Census data and American Community Survey data;
• An information system of the monitored large developments in the region (development monitoring);
• Small-area estimates of population and jobs by industry sector for sub-county areas like Census tracts; and
• Technical assistance in response to a variety of inquiries by phone or email.

Development of Regional Demographic Forecasts

Transportation Planning Funds

This item includes improvement and support of the regional demographic/land-use model, generation of project-based demographic datasets, and evaluation of other possible methodologies for the demographic forecasting process. Activities will be ongoing throughout FY2018 and FY2019. Anticipated products include:
• Project-based demographic forecasts; and
• Advances in the development of a new demographic forecast model.

Participant Statistical Area Program

Transportation Planning Funds

As part of Census 2020 preparation, in FY2019 NCTCOG will lead a coordination effort in the NCTCOG region for defining census statistical geographies. This project includes coordinating and assisting local governments and member agencies to delineate boundaries of statistical areas such as Census Tract and Block Groups. The work also includes use of GIS software to identify the high growth areas to be redrawn and communicated back to the Census Bureau. Anticipated products include:

• Census Tract Geography file to be used for Census 2020; and
• Census Block Group Geography file to be used for Census 2020.
### E. Funding Summary

<table>
<thead>
<tr>
<th>Subtask</th>
<th>TPF</th>
<th>Additional Funding</th>
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<td>$3,379,541</td>
<td>$6,930,441</td>
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Transportation Planning Funds (TPF) includes both FHWA PL-112 and FTA 5303 funds. TxDOT will apply transportation development credits sufficient to provide the match for FHWA PL-112 and FTA Section 5303 programs. As the credits reflect neither cash nor man-hours, they are not reflected in the funding tables.
IV. Task 3 – Short-range Planning and Programming, and Air Quality and Transit Operations

A. Objective

The current transportation funding bill, Fixing America’s Surface Transportation (FAST) Act, reaffirmed the role of the Metropolitan Planning Organization (MPO) prescribed in Moving Ahead for Progress in the 21st Century. The MPO continues to serve as a cooperative partner with the Texas Department of Transportation (TxDOT), local governments, North Texas Tollway Authority (NTTA), Collin County Toll Road Authority (CCTRA), and transportation providers to identify, evaluate, select, and prioritize transportation projects to be included in the Transportation Improvement Program (TIP). The Regional Transportation Council (RTC) and the North Central Texas Council of Governments (NCTCOG) staff will be involved in the creation, modification, monitoring and implementation of the TIP, as well as in funding initiatives in which Surface Transportation Block Grant Program (STBG) and Congestion Mitigation and Air Quality Improvement Program (CMAQ) funds will be programmed. In addition, the MPO coordinates the selection of projects funded with Metro Corridor and Texas Mobility Funds, along with the proceeds of public-private toll projects (Regional Toll Revenue funds). An anticipated element will be the further refinement and monitoring of projects funded through these programs.

The Clean Air Act Amendments of 1990 and federal surface transportation legislation integrate transportation and air quality planning activities at local, state, and federal levels. Effective July 20, 2012, the Environmental Protection Agency (EPA) designated ten counties in North Central Texas as “moderate” nonattainment for the pollutant ozone, and therefore, requires a favorable transportation conformity determination for implementation of transportation projects and programs utilizing federal funds. Transportation Control Measures (TCMs) that are contained in the State Implementation Plan (SIP) must be evaluated for timeliness through transportation conformity. Monitoring and reporting systems will be employed to ensure air quality objectives.
are met. Programs addressing the demand for mobility, the transportation supply, and the importance of new technology are included as part of a coordinated and comprehensive planning approach to the region’s air quality problem. In addition to Federal Highway Administration (FHWA) and Federal Transit Administration (FTA) support, funding from the Texas Commission on Environmental Quality (TCEQ) is also provided to support air quality planning.

In addition, a significant portion of the FY2018 and FY2019 UPWP is dedicated to providing continued support for planning associated with improving and expanding public transportation in the Dallas-Fort Worth area. These efforts include projects in support of Dallas Area Rapid Transit (DART), the Fort Worth Transportation Authority (FWTA, also known as Trinity Metro), and the Denton County Transportation Authority (DCTA), as well as planning initiatives directed toward new transit services in the region.

Although not a requirement in the Unified Planning Work Program document, this Task also includes management and operations projects that are being carried out by MPO staff in addition to the planning activities. These projects are included in order to provide a more complete inventory of staff activities. Several of these implementation initiatives are aimed at helping the region reach attainment of the 8-hour ozone standard and are primarily funded through STBG and CMAQ funds authorized by the Regional Transportation Council. US Department of Energy, Environmental Protection Agency, TCEQ, and local funds are also used in attainment initiatives. In addition to air quality initiatives, implementation activities funded primarily by the Federal Transit Administration to support enhanced transit service in the region are also included.

B. Expected Products

Products of Task 3, Short-range Planning and Programming, and Air Quality and Transit Operations are the result of ongoing transportation planning, air quality planning, and
transportation improvement programming activities, such as the preparation of the Transportation Improvement Program, transportation conformity analysis and emission inventories, and support of various air quality improvement initiatives. Detailed products from the subtasks are included in each of the following subtask descriptions

C. Previous Work

Routine Work Efforts – Activities in support of the Transportation Improvement Program (TIP); air quality planning, operations, and marketing; and transit planning and operations are ongoing and continued throughout FY2016 and FY2017. In FY2016, 319 quarterly Transportation Improvement Program (TIP) modifications were completed in line with Statewide Transportation Improvement Program revision cycles, and a financially constrained FY2017-2020 TIP document with over 875 active projects and 71 implementing agencies was produced. A special report that details the obligation of federal funds to individual projects was completed for FHWA, FTA, and TXDOT. Annual project listings and changes in Regional Toll Revenue were reported to the Texas Department of Transportation. Two modules of the data management system for monitoring, tracking, and assessing RTR projects were complete, while three more modules are in development, including one module to incorporate GIS mapping into the database.

NCTCOG staff conducted the 2016 Transportation Conformity analysis for Mobility 2040: The Metropolitan Transportation Plan for North Central Texas and the 2015-2018 Transportation Improvement Program. Emission inventories were also conducted, and a database of transportation projects and programs included in the State Implementation Plan was maintained. Staff sought and received funding to advance efforts to reduce mobile emissions around the region. Implementation efforts began for vehicle replacement activities awarded under the Clean Fleets North Texas 2015 Call for Projects, while staff continued to raise awareness of the AirCheckTexas Drive a Clean Machine Program. Phase 2 of the On-Road Heavy-Duty Emissions
Measurement System project was completed. Coordination, education, technical training, outreach, and website updates were conducted to increase awareness about activities and new technologies available to improve air quality.

Planning and technical assistance was provided to public transportation providers under Task 3, along with implementing strategies to reduce barriers to travel around the region, particularly for low-income workers and individuals with disabilities. Planning activities for transit continued and a successful Triennial Review was completed in 2016. Throughout FY2016 and FY2017, FTA grant oversight activities and vehicle procurements were conducted on behalf of subgrantees. Interim transit service for clients in Collin County was provided.

**Non-routine Work Efforts** – The status of significant or one-time work efforts contained in Task 3 is provided in the table below:

<table>
<thead>
<tr>
<th>PROJECT NAME</th>
<th>ACCOMPLISHMENTS TO DATE</th>
<th>REASON FOR CARRYOVER TO FY2018</th>
<th>COMPLETION</th>
</tr>
</thead>
<tbody>
<tr>
<td>FWTA Transit System Plan</td>
<td>A final recommendation report was completed and adopted. Ten public outreach events and activities were held. Project was completed.</td>
<td>n/a</td>
<td>n/a</td>
</tr>
<tr>
<td>JARC Streamlined Project Implementation Partnership</td>
<td>All mobility management projects were completed and payments finalized. Project was completed.</td>
<td>n/a</td>
<td>n/a</td>
</tr>
</tbody>
</table>

**D. Subtasks**

**3.01 Transportation Project Programming**

The Dallas-Fort Worth Metropolitan Planning Organization (MPO) coordinates with the Texas Department of Transportation (TxDOT), transit providers, local governments, and other transportation partners to prioritize and select projects for inclusion in the Transportation Improvement Program (TIP). The Regional Transportation Council (RTC) and North Central Texas Council of Governments (NCTCOG) continue to monitor and implement projects in the TIP.
Transportation Improvement Program

Transportation Planning Funds

The Transportation Improvement Program (TIP) is a staged, multi-year program of projects approved for funding by federal, State, and local sources within the Dallas-Fort Worth area. Before transportation projects are selected and listed in the TIP, they are evaluated to ensure consistency with the current Metropolitan Transportation Plan and Air Quality Conformity Determination. These steps ensure that projects improve regional safety and mobility without detrimentally impacting air quality within the Dallas-Fort Worth area. In addition, the TIP has been analyzed to ensure that project listings are fiscally constrained to available resources, meaning that projects can only be included if federal, State, local or other funds are available to cover project costs. Every two years a new TIP document is developed to which updates are made on a quarterly basis.

As funds are made available, the Regional Transportation Council issues funding initiatives or calls for projects to local governments and transportation agencies. It is anticipated that new projects will be selected in the FY2018 and FY2019 timeframe using federal, State, and local funding. As new funding sources or additional funding allocations arise, staff will implement appropriate project selection processes.

MPO staff will also provide general assistance to implementing agencies, elected officials, and the public regarding funded transportation projects, including the development and implementation of transportation solutions. In addition, MPO staff will track and monitor projects to ensure timely completion. This subtask is supported with Transportation Planning Funds. Anticipated products in FY2018 and FY2019 include:

- A financially constrained 2019-2022 TIP document in FY2018;
- Quarterly TIP modifications in alignment with the Statewide Transportation Improvement Program (STIP) revision cycles;
- Calls for projects and funding initiatives as funding becomes available; and
- A report to the Federal Highway Administration (FHWA), Federal Transit Administration (FTA), and TxDOT that details the obligation of federal funds to individual projects at the end of each calendar year.

Regional Project Tracking, Monitoring, Assessment, and Software Development Project

Other Funding Sources

A series of improvements to the transportation project information system (TIP database) will continue. The goal of this project is to enable the tracking of projects by individual phase including the cost, funding, start date, and completion date of each project phase. This project was originally created in response to the federally mandated year of expenditure/total project cost requirements, as well as the increased complexity involved with funding, tracking, and monitoring transportation projects. Expansion of this data management system will reduce administrative project review time and increase the availability of timely project information. This project is funded with Surface Transportation Block Grant Program funds, Regional Toll Revenue funds, and Transportation...
Development Credits. Anticipated products include work on the interactive, web-based interfaces noted below:

- Deployment of the re-designed TIP modification editing module at the Control Section Job (CSJ) level and enhancements to the TIP modification editing interface expected in FY2018; and
- Deployment of additional TIP database modules including: TIP development, transit project tracking, project status tracking, additional Geographic Information Systems (GIS) mapping tools, and obligations tracking; significant progress anticipated in FY2018 and FY2019.

Regional Toll Revenue Fund Management and Project Tracking Implementation

Other Funding Sources

Since 2007, MPO staff has tracked Regional Toll Revenue funds and projects, and efforts to monitor selected projects will continue. Regional Toll Revenue (RTR) funds will continue to support these activities. Anticipated products in FY2018 and FY2019 include:

- An up-to-date RTR-funded project list and account balances;
- Standard operating procedures to maintain data integrity;
- Coordination with TxDOT and NCTCOG Administration Department on RTR fund and expenditure discrepancies;
- Tracking the status of environmental clearance for RTR-funded projects;
- Quarterly submission of RTR project changes to TxDOT for inclusion in the Texas Transportation Commission (TTC) Minute Order for authorization; and
- Communication with local agencies to provide close-out information for completed RTR-funded projects.

3.02 Regional Air Quality Planning

Since 1991, the North Central Texas region has been in nonattainment for the National Ambient Air Quality Standard (NAAQS) for ozone. As a result of this designation, federal and State procedures are required in order for projects identified in multimodal transportation plans to proceed to implementation. In response, a variety of air quality planning occurs to ensure these requirements are met.
Air Quality Planning

Transportation Planning Funds

The Dallas-Fort Worth State Implementation Plan (SIP) is a legal and federally enforceable plan mandated by the Clean Air Act (CAA). This plan identifies how nonattainment areas will reduce emissions from stationary, area, and mobile sources to demonstrate attainment and/or maintenance of air quality standards. In nonattainment areas, the CAA mandates federally funded and regionally significant transportation activities must conform to the SIP. Under this requirement, the Regional Transportation Council, the transportation policy body for the Metropolitan Planning Organization, is required to make an initial local-level transportation conformity determination on the Metropolitan Transportation Plan (MTP) and Transportation Improvement Program (TIP) before submitting recommendations to the US Department of Transportation for independent review and a final federal-level conformity determination. The conformity determination is a method to ensure federal funding and federal approval is given to transportation projects, programs, and policies consistent with regional air quality goals. This element is ongoing throughout FY2018 and FY2019. Anticipated products include:

- Development, analysis, and monitoring of elements contained in and required of the SIP, as necessary, to meet air quality requirements;
- Assistance with addressing specific data and technical requests;
- Tracking and responding accordingly to statewide and national rules and guidance affecting the nonattainment area and surrounding counties, such as the eight-hour NAAQS for ozone and other primary or secondary pollutants;
- Annual report of pollutant levels at monitoring stations located throughout the region;
- A successful regional air quality conformity analysis incorporating new or updated projects proposed for inclusion in the MTP and TIP;
- Monitoring of the timely implementation of Transportation Control Measures;
- Monitoring, collecting, and updating of Mobile Source Emission Reduction Strategies commitments for annual reporting requirements of emission reductions projects;
- Guidance, rules, and proposals that incorporate NCTCOG direction/expertise and/or experience related to NAAQS and mobile-source issues;
- Evaluation of technical models used in regional air quality planning, with feedback to agency developing the model(s) and, as appropriate, creation of in-house applications to successfully run models;
- Presentations for workshops, technical committees, student chapters, and training sessions; and
- Update of the NCTCOG website with the latest air quality information.
Emission inventories estimate emission amounts from specific sources within a specified area and time interval. Transportation emission budgets used in transportation conformities are developed based upon emission inventories used in development of the SIP and the impact of control measures included within that SIP. Emissions are greatly impacted by regionally specific data, so updated regional inventories analysis is necessary to better predict future-case emission impacts from control strategies, vehicle miles traveled, vehicle activity from outside the nonattainment area, and evaporative emissions. This work element will be supported through Texas Commission on Environmental Quality funds. This element is ongoing throughout FY2018 and FY2019. Anticipated products include:

- A variety of emission inventories for federal, state, or local requirements; and
- Mobile source technical analysis performed to enhance state of the practice.

### 3.03 Air Quality Management and Operations

Ten counties in the North Central Texas Council of Governments (NCTCOG) service area have been designated as nonattainment for the pollutant ozone. As the majority of ozone-forming emissions are attributable to mobile sources and other transportation-related activities, numerous strategies are being implemented to reduce emissions and air quality impacts. This is accomplished through a variety of programs aimed at reducing nitrogen oxides, volatile organic compounds, and other criteria pollutant emissions by expediting the use of advanced technologies as well as implementing demonstration programs to study the feasibility of control measures for possible region-wide deployment. NCTCOG staff also recommends policies, participates in partnerships, and provides support for other stakeholders who are implementing emission-reducing activities. All efforts are undertaken with the goal of working toward attainment of the federal ozone standards and improving overall ambient air quality. Work also supports and complements objectives of the Dallas-Fort Worth Clean Cities Program.

### Technology Improvements

Other Funding Sources

Technology improvements are achieved through programs, often implemented through regional funding opportunities, which enhance the use of cleaner, sustainable, more fuel-efficient vehicles, equipment, and technologies. Activities may be comprised of accelerated fleet replacement; vehicle emissions repairs; engine repowers, upgrades, and retrofits; alternative fuels and vehicles; advanced truck technologies; idle-reduction technologies; and other low-energy-use
technologies. Staff efforts under this element include not only award of funds, but also monitoring of grant-funded activities ensuring adherence to reporting and project fulfillment.

Work also includes promotion of relevant funding initiatives available from other agencies who offer funding programs, such as the US Environmental Protection Agency or the Texas Commission on Environmental Quality. In this case, staff works to improve awareness of such programs among local vehicle or equipment owners to ensure that the region is competitive in seeking and receiving funds. This work element will be supported through Congestion Mitigation and Air Quality Improvement Program funds, Surface Transportation Block Grant Program funds, Environmental Protection Agency funds, Texas Commission on Environmental Quality funds, Regional Transportation Council local funds, other local funds, Transportation Development Credits, and private funding sources. Consultant assistance may be used. NCTCOG may seek assistance from universities through the University Partnership Program for data collection and/or analysis to optimize use of funded improvements. This element is ongoing throughout FY2018 and FY2019. Anticipated products include:

- Competitive grant applications to seek additional funds to further leverage Calls for Projects (CFPs) and technology implementation efforts;
- Open competitive CFPs to select eligible technology projects for implementation, which may include vehicle or equipment repair, replacement, repower, retrofit, idle reduction technologies, refueling infrastructure, or other emissions reduction technologies;
- Development and implementation of a revolving loan program to fund emission-reduction strategies;
- Executed subgrantee agreements and documentation of subgrantee compliance to grant requirements through monitoring and on-site inspections;
- Implemented technology projects, including, but not limited to, installation of electrified parking space technology, light-duty vehicle replacements, diesel truck or bus replacements, and replacement of diesel airport ground support equipment;
- Technology project reimbursements;

IV. Task 3 – Short-range Planning and Programming, and Air Quality and Transit Operations
• Reports on funded grant activities, including an assessment of how to optimize utilization of electrified parking space technology; and
• Resources to assist vehicle/equipment owners in identifying potential technology improvements and related financial assistance.

Demonstration Programs

Other Funding Sources

These types of programs investigate methods to reduce fuel use and emissions not only through emissions testing, but also through activity and behavior modifications. Typically, these programs seek to demonstrate the benefit and feasibility of potential or conceptual measures for greater implementation. Projects may include both light- and heavy-duty vehicles, non-road equipment, and energy conservation techniques. NCTCOG may seek assistance from consultants, or universities through the University Partnership Program for data collection and/or analysis. This work element will be supported through Surface Transportation Block Grant Program funds, Congestion Mitigation and Air Quality Improvement Program funds, and Transportation Development Credits. This element is ongoing throughout FY2018 and FY2019. Anticipated products include:

• Feasibility studies on existing or new programs;
• Vehicle deployment pilot program to encourage the purchase and use of low-emitting vehicles through partnerships and opportunities for individuals to experience Alternative Fuel Vehicles (AFV) first-hand, including through a loaner program opportunity under the Alternative Fuel Vehicle Deployment Initiatives Project;
• Educational campaign to reduce idling at school campuses through the Idle Free School Zones Project, including before and after studies utilizing remote sensing technology;
• Evaluation of oversize/overweight heavy-duty vehicles and emissions impacts on air quality;
• Executed consultant agreement(s); and
• Reports including outcomes and follow-up related to various pilot programs or demonstration projects and technology improvement programs targeting diesel vehicles.
Partnerships and Collaborations

Other Funding Sources

This element includes participation in collaborative efforts on the local, State, and federal levels to promote or implement projects or programs that help improve air quality. New innovative partnerships may also be sought with local governments, and private and non-profit stakeholders with key connections or interest in air quality or promoting “green” initiatives, such as hospitals, hotels, utility companies, or private developers. Collaborations may also be established with entities having connections to vehicles/equipment/technologies. Staff may also provide technical assistance and develop resources to facilitate involvement and aid decision making among local governments, industry, and the public. This work element will be supported through Congestion Mitigation and Air Quality Improvement Program funds, Surface Transportation Block Grant Program funds, US Department of Energy funds, Regional Transportation Council Local funds, local funds, and Transportation Development Credits. NCTCOG may seek assistance from universities through the University Partnership Program for data collection and/or analysis to optimize use of funded improvements. This element is ongoing throughout FY2018 and FY2019. Anticipated products include:

- Continued partnerships with federal, State, and regional/local partners including, but not limited to, the National Association of Regional Councils (NARC) and DOE;
- Continued membership in and support of formal partnership arrangements, including the North Central Texas Stewardship Forum and EPA SmartWay Transport Partnership;
- Administration of a cooperative purchasing initiative to reduce alternative fuel vehicle costs, in conjunction with local fleets and the NARC through the Fleets for the Future project;
- Administration of the Freight Efficiency Outreach Program or similar program, in collaboration with local trucking industry representatives and other entities;
- Comments drafted and submitted on air quality regulations, projects, programs, or studies by federal, State, local, or private entities, as requested and appropriate;
- Periodic meetings and conference calls regarding various air quality initiatives;
- Innovative new partnerships with key stakeholder organizations, such as vehicle auctioneers, charities and non-profits who accept donated vehicles, hospitals and universities, vehicle rental companies, and major employers in the region;
- A website that serves as a “clearinghouse” of information regarding energy efficiency and conservation associated with air quality, transportation, and related issues;
- A report evaluating the effectiveness of various funding programs;
- Continued implementation of DFW Clean Cities Coalition activities including, but not limited to, collaboration with stakeholders to identify strategies to increase use of Clean Cities approaches with regard to resiliency and emergency response efforts, hosting of meetings/trainings/workshops/webinars focused on Clean Cities initiatives (including maintenance of the DFW Clean Cities website as noted in Exhibit II-2 of Subtask 1.04),
recognition and highlights of local fleet efforts, collection/submittal of data regarding alternative fuel use in the North Central Texas region, coordination of alternative fuel and electric vehicle activities including with implementation of facilitating coordination of associated with implementation of the Volkswagen Settlement activities and other state incentives, facilitation of alternative fuel infrastructure planning activities and alternative fuel corridor development, collaboration regarding designation of alternative fuel corridors under Section 1413 of the FAST Act, and fuel and/or technology demonstration and stakeholder listening events collection/submittal of data regarding alternative fuel use in the North Central Texas region; and

- Technical assistance to local governments to help improve energy management efforts, including the monitoring of project impacts and submittal of reports, in collaboration with the NCTCOG Environment and Development Department.

Regional Policies and Best Practices

Other Funding Sources

These policies provide guidance on best practices to minimize the emissions impact of individual entities’ activities and may consider acquisition, operation, and/or maintenance behaviors. Information sharing can reduce the magnitude of resources needed to implement best practices and can offer insight into ways to reduce barriers to adoption of emission-reducing activities. Staff will work with regional stakeholders, including local governments and relevant private-sector entities, to evaluate opportunities where policies might best be suited to facilitate emissions reductions and develop such policies where appropriate. Implementation assistance will also be provided by staff to adopting entities throughout the region. This work element will be supported through Surface Transportation Block Grant Program funds, Regional Transportation Council Local funds, US Department of Energy funds, and Transportation Development Credits. This element is ongoing throughout FY2018 and FY2019. Anticipated products include:

- Locally Enforced Idling Restrictions and Clean Fleet Policy adoption by additional local governments;
- Opportunities to streamline regulations and/or permitting practices that impact use of technologies that help reduce emissions, including but not limited to, AFVs, electric recharging equipment, and alternative energy sources;
- Identification and distribution of best practices for AFV procurement for local fleets, including resources developed under the Fleets for the Future project;
- Equitable, favorable options for capturing revenues from vehicles that do not pay traditional gasoline tax;
- A revised Public Works Construction Standards – North Central Texas document containing Clean Construction Specification elements (in coordination with the NCTCOG Environment and Development Department); and
• Identification and development of additional RTC policy positions that encourage actions to help reduce mobile and other transportation sector air emissions.

**Enforcement Activities**

**Other Funding Sources**

Enforcement is a critical component to ensuring adherence to established policies. Various initiatives are designed to specifically target vehicles producing excessive emissions and not in compliance with automobile emissions standards. Through these efforts, counties will continue to be encouraged to enhance Regional Emissions Enforcement Programs by including other enforcement-related projects, including truck-lane restrictions and idling restrictions. In addition, staff will continue to expand and improve various information systems, and continue to provide training and support to local law enforcement agencies.

Staff will also continue administering the Regional Smoking Vehicle Program (RSVP) and facilitating events corresponding with National Car Care Month. Enforcement efforts will be supported by Congestion Mitigation and Air Quality Improvement Program funds, Surface Transportation Block Grant Program funds, and Transportation Development Credits. This element is ongoing throughout FY2018 and FY2019. Anticipated products include:

- Emissions enforcement database enhancements;
- Continued partnerships with law enforcement, State and federal agencies, and other inspection/maintenance interested parties;
- Periodic meetings and training classes regarding emissions enforcement issues;
- Education and training for law enforcement regarding temporary tag fraud resulting from the elimination of the windshield inspection sticker in Texas;
- RSVP process improvements;
- Correspondence and follow-up with vehicle owners regarding RSVP; and
- Local car clinics focused on vehicle emissions maintenance during National Car Care Month each April.

**3.04 Transportation and Air Quality Communications**

As policies, projects, and programs are implemented to fulfill obligations required under federal and State transportation and air quality regulations, communication efforts are strategically created and implemented to educate and inform the region on current and new transportation and air quality programs and/or policies.
Transportation and Air Quality Marketing, Education, and Engagement

Other Funding Sources

The North Central Texas Council of Governments (NCTCOG) will continue to implement strategically created communications efforts to educate and inform the region on transportation- and air quality-related issues, including strategies for improvement, funding opportunities, training initiatives, and new programs/policies. Major efforts will focus on Transportation and Air Quality Marketing, Education, and Engagement Programs, and Clean Vehicle Technologies Programs. This work element will be supported through Congestion Mitigation and Air Quality Improvement Program funds, Surface Transportation Block Grant Program funds, US Department of Energy funds, Transportation Development Credits, and other funding sources. Paid media will be utilized when needed. This element is ongoing throughout FY2018 and FY2019. Anticipated products include:

- Regional air quality and transportation campaigns (including Air North Texas, AirCheckTexas Drive a Clean Machine, Car Care Clinics, Electric Vehicles North Texas, Engine Off North Texas, and other efforts that support transportation and air quality improvement strategies), utilizing communication strategies including, but not limited to, web site/web pages (as noted in Exhibit II-2 of Subtask 1.04), paid advertising and media, social and electronic media, videos, email and blog updates, air pollution alerts, flyers, brochures, and outreach and associated displays;

- Integrated campaign resources for use by local governments, the business community, education institutions, and other stakeholders/interested parties;

- Communication and marketing services for local governments, as well as other NCTCOG Transportation Department programs/campaigns;

- Procurement, inventory, and distribution of educational items;

- Performance measure strategies for transportation and air quality communication initiatives;

- Purchase of electronic equipment, devices (e.g., counters, outreach wheels), online services, and computers for the purpose of outreach, technical guidance, photography and video production (as noted in Exhibit II-2 of Subtask 1.04);

- Regional growth of overall efforts through regular meetings and conference calls with the Air North Texas Coalition, stakeholder groups, and other partners including State, federal, and local interest groups about the campaign and other air quality education initiatives;

- New partners recruitment for transportation and air quality campaigns; and

- Partner recognition for work on programs, such as Air North Texas.
3.05 Public Transportation Planning and Management Studies

This work program subtask provides funding to assist local governments and transportation providers with public transportation funding, operational, and planning activities that focus on identifying opportunities for increased service in the region, as well as improving the efficiency and effectiveness of current systems.

Public Transportation Funding and Operations

Transportation Planning Funds

This planning activity is ongoing throughout both FY2018 and FY2019, supporting the efforts of metropolitan, urban and rural transit providers in the North Central Texas region. General responsibilities include monitoring transit appropriations, grant activities and funding issues; identifying and monitoring transit-related issues of local, regional, and national interest; and responding to citizen, consultant, State, and federal requests for data, information, or assistance. Additional responsibilities include providing technical assistance to providers by coordinating the dissemination of technical information, federal regulations, and grant requirements. Anticipated products include:

- Planning for financial needs in coordination with local public transit providers; and
- Assistance to transit providers in the development of the annual program of projects and coordination of the programming of funds in an approved Statewide Transportation Improvement Program (STIP).

Regional Public Transportation Coordination and Planning

Transportation Planning Funds

This planning activity is ongoing throughout both FY2018 and FY2019, supporting activities that further a coordinated and seamless public transportation system. This activity includes the Access North Texas Plan, which outlines coordination goals, policies and strategies to move the North Central Texas region toward more coordinated, efficient and seamless transportation services. Regional coordination activities will primarily focus on the 12 counties that comprise the Metropolitan Planning Area. Coordination with surrounding areas will be included based on the impact that public transportation connections have within the planning area boundary. Carrying over from FY2017, University Partnership Program (UPP) assistance will be utilized in planning for access to opportunity and community transit viability. This activity also includes technical assistance and general planning support to the transportation authorities in the region, as well as smaller transit agencies.

- An adopted update to the Access North Texas plan;
- Implemented coordination strategies identified in the Access North Texas Plan;
- Planning for the transportation needs of the disadvantaged, including low income, seniors, and individuals with disabilities, in an effort to increase opportunities and access to public transportation;
IV. Task 3 – Short-range Planning and Programming, and Air Quality and Transit Operations

- Assistance to transit agencies including travel demand model data, ridership projections, financial modeling, planning studies, and technical assistance;
- Support for transit system improvements resulting in seamless regional connectivity;
- Facilitation of improved efficiency in the use of transit capital resources in the region, resulting from pursuing opportunities for vehicle sharing, retired vehicle or community vehicle programs;
- UPP report on access to opportunity, including an opportunity score or index for the Metropolitan Planning Area and a menu of investments or other interventions that could positively influence scores; and
- UPP report on community transit viability.

Planning Assistance to Small Operators

Other Funding Sources

This planning activity is ongoing throughout both FY2018 and FY2019, supporting initiatives that encourage short- and long-term operational planning by local transit providers. Activities include providing assistance to subgrantees as they implement identified strategies and recommendations. Federal Transit Administration and local funds, and Transportation Development Credits will support these activities. Anticipated products include:

- Planning conducted on behalf of Urbanized Area Formula Program subgrantees based on identified needs.

Regional Transit Planning Assistance

Other Funding Sources

Efforts will begin in FY2019 to support activities that encourage short- and long-term transit implementation planning for local governments. Activities include providing technical assistance and general planning support to local governments with transit implementation options including internal and regional connections, focus on strategic implementation, near-term implementation, increased transportation options, funding options, and private-sector involvement. Federal Transit Administration, and Surface Transportation Block Grant Program, and Regional Toll Revenue funds, as well as Transportation Development Credits will support these activities. Consultant assistance may be used. Anticipated products include:

- Planning and implementation assistance to local governments based on requested and identified needs;
- Procurement and executed agreements for consultant assistance; and
- A report on transit implementation options in identified subregions.
3.06 Transit Operations

This work program subtask provides funding primarily for the implementation of projects that focus on eliminating gaps in services, reducing duplication of services, enhancing coordination, and improving the efficiency and effectiveness of the region’s existing services.

FTA Urban Funding Grant Administration

Other Funding Sources

This implementation activity is ongoing throughout FY2018 and FY2019, supporting all responsibilities NCTCOG assumes as the designated recipient for Federal Transit Administration (FTA) grant funds received for urbanized areas in the region. General responsibilities include program administration, project implementation, grant management and program oversight for all subgrantees who receive funds through the Bus and Bus Facilities Program, Congestion Mitigation and Air Quality Improvement Program, Enhanced Mobility of Seniors and Individuals with Disabilities Program, Job Access/Reverse Commute Program, New Freedom Program and the Urbanized Area Formula Program. Federal Transit Administration funds, Regional Transportation Council (RTC) Local funds, subgrantee local funds, and Transportation Development Credits will support these activities. Consultant assistance may be used. Anticipated products include:

- FY2018 and FY2019 funding allocations;
- Calls for Projects;
- Grant and agreement management;
- Application of oversight and compliance initiatives;
- Funding disbursement of reimbursable project expenses to subgrantees;
- Administration of a vehicle lease program;
- Submittal of coordinated reports on behalf of subgrantees; and
- Procurements for services and equipment, including buses, on behalf of subgrantees.

Sustainability for Transit

Other Funding Sources

This implementation activity is ongoing throughout both FY2018 and FY2019, supporting coordination and implementation of transit sustainability initiatives. The Program supports Chapter 461 of the Texas Transportation Code that focuses on maximizing the benefits of the State’s investment in public transit through the coordination of services. Regional Toll Revenue funds will support these activities. Anticipated products include:

- Short- and long-range solutions that move the region toward more comprehensive, coordinated, accessible, efficient, and effective public transit services; and
- Policies, programs and projects that support and encourage sustainable transportation options around the region while elevating customer service and air quality.
E. Funding Summary

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E. Funding Summary

![Task 3.0 Funding Summary]

- TPF: 23%
- CMAQ: 8%
- Local: 13%
- EPA: 6%
- DOE: 2%
- STBG: 6%
- FTA: 1%
- RTR: 1%
- TCEQ: 39%
- Other: 5%
V. Task 4 – Metropolitan Transportation Plan

A. Objective

Since the early 1970s, Metropolitan Planning Organizations have had the responsibility of developing and maintaining a Metropolitan Transportation Plan (MTP). With the passage of the Intermodal Surface Transportation Efficiency Act of 1991 (ISTEA), the role of the Metropolitan Transportation Plan in the overall transportation planning process was greatly advanced. The current funding bill, the Fixing America’s Surface Transportation (FAST) Act, continued the role of the plan as a central mechanism for the decision-making process regarding investments to develop the metropolitan transportation system. Federal transportation legislation requires transportation plans within metropolitan areas greater than 200,000 in population and in nonattainment areas to be reviewed every four years.

The Mobility 2040 Plan was developed and approved by the Regional Transportation Council in March 2016. The Plan serves as the defining vision for transportation systems and services in the Dallas-Fort Worth Metropolitan Area and incorporates updated corridor recommendations, addresses regional financial shortfall concerns, and includes new innovative funding and project implementation strategies. It was developed to fully meet MAP-21 and FAST ACT planning requirements as provided by the Federal Transit and Federal Highway Administrations. Efforts in FY2018 and FY2019 will focus on development and monitoring of a new Plan, Mobility 2045. The new Plan will incorporate FAST Act performance measures and include emphasis on emerging transportation technologies and trends.
The Mobility Plan identifies projects, policies, and programs to be implemented and carried out by the Metropolitan Planning Organization (MPO) in conjunction with the transportation providers, local governments, and state and federal agencies. In addition, elements in this Work Program task also contain funding to evaluate policies and strategies directed at reducing congestion and improving air quality, to link the transportation and environmental planning processes, and to ensure compliance in the planning process with federal regulations under Title VI of the 1964 Civil Rights Act and Executive Order 12898, Federal Actions to Address Environmental Justice in Minority Populations and Low-Income Populations. Facilitating implementation of the Plan, such as increasing funds for transportation through new or cooperative multiagency funding strategies, will also be an area of focus.

B. Expected Products

Products from Task 4, Metropolitan Transportation Plan, will include public meetings and public outreach activities, committee briefings, the screening and evaluation of system alternatives, travel forecasts, updating and reviewing financial forecasts, and transportation system performance summaries. Numerous presentations to local elected officials, transportation interest groups, and participating agencies will be conducted, and written materials documenting the Plan’s analysis and recommendations will be prepared. Specific products for each subtask are included in each subtask description.

C. Previous Work

Routine Work Efforts – The major focus of Task 4 is the ongoing development and maintenance of the Metropolitan Transportation Plan (MTP). Work on the MTP in FY2016 focused on finalizing the recommendations of Mobility 2040 and preparing for policy committee adoption, including coordination with federal and State air quality conformity partners. During FY2016 and per
requirements of House Bill 20, adopted by the Texas State Legislature in 2015, a prioritized list of roadway projects was developed for the first ten years of the MTP. In FY2017, efforts were initialized for Mobility 2045. These efforts comprised preparing the travel demand model, developing 2045 demographic information, coordinating with State and local transportation partners, public outreach, and coordinating with federal and state air quality conformity partners.

In support of the MTP, work was also executed on long-range financial forecasting and the pursuit of innovative funding strategies. This work included financial reviews of forecasts and trends that impact funding availability, which resulted in the development of a long-range financial plan for the MTP. Staff also reviewed statutory rules and recently enacted State law changes related to funding structures for transportation. Work was carried out in coordination with the Texas Department of Transportation, the North Texas Tollway Authority, and the Regional Transportation Council on toll services agreements and toll tag usage rates.

Work in this Task also centered around the integration of environmental and sustainable practices into the transportation planning process. Research was conducted on environmental scoring alternatives for the MTP, and staff continued to hold regular meetings and workshops on Planning and Environmental Linkages. NCTCOG, through its partnership with the U.S. Army Corp of Engineers, carried out activities in support of expedited environmental permitting for regionally significant transportation projects. A program to encourage public and private environmental stewardship and efforts to quantify the benefits of environmental stewardship were initiated. The Shared Value Mitigation Program effort was merged into this broader effort.

Finally, activities in Task 4 related to Title VI and Environmental Justice (EJ) continued. Staff submitted the agency’s Title VI Program to FTA, completed an EJ Biennial Report, and provided training and program review to NCTCOG constituents.
Non-routine Work Efforts – The status of significant or one-time work efforts contained in Task 4 is provided in the table below:

<table>
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<tr>
<th>PROJECT</th>
<th>ACCOMPLISHMENTS TO DATE</th>
<th>REASON FOR CARRYOVER TO FY2018</th>
<th>ANTICIPATED COMPLETION</th>
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<tr>
<td>INVEST Implementation Program</td>
<td>The process to evaluate Mobility 2040 using the INVEST sustainability tool was documented, and a final report was submitted to FHWA. This project was completed.</td>
<td>n/a</td>
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<tr>
<td>SHRP2 Implementation Assistance</td>
<td>The publicly available Regional Ecosystem Framework website was developed, and stakeholder meetings and presentations were conducted for the Wetland and Stream Mitigation Assessment. The project was completed.</td>
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<tr>
<td>SHRP2 Implementation Assistance (PlanWorks)</td>
<td>The PlanWorks toll was used to guide scenario planning and incorporate performance targets into the Metropolitan Transportation Planning process. The project was completed.</td>
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<tr>
<td>INVEST Evaluation of Sustainability in Denton Greenbelt Corridor</td>
<td>Incorporated into the UPWP during FY2017, the work scope and budget for the project were revised and submitted to FHWA. A kick-off webinar and conference call was also held. This project is ongoing and work will continue.</td>
<td>This project is ongoing and work will continue.</td>
<td>FY2018</td>
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D. Subtasks

The following subtasks address the Metropolitan Transportation Plan:

4.01 Metropolitan Transportation Planning

This subtask encompasses the development of the metropolitan area’s long-range transportation plan and related documentation of the region’s roadway system. As corridor studies contained in the Metropolitan Transportation Plan advance to final recommendations, periodic amendments and updates to this Plan may be required. Additionally, the arterials contained in the Plan fall into a number of categories detailed below, which are monitored and amended as necessary to meet air quality conformity and funding requirements.

Metropolitan Transportation Plan Development and Monitoring

Transportation Planning Funds

This subtask is ongoing throughout FY2018 and FY2019. The Metropolitan Transportation Plan (MTP) provides a blueprint for a multimodal transportation system and responds to broad transportation-oriented goals for the region. These goals include enhancing mobility, improving access, and reducing congestion; quality-of-life goals such as encouraging balanced land use, promoting orderly economic development, and improving air quality; and financial goals such as identifying and pursuing long-term stable sources of funding. The MTP must also meet financial constraint goals where project costs must not exceed anticipated revenue.

At any given time, the MTP is being monitored, developed, or modified. Staff will work in cooperation with the Texas Department of Transportation (TxDOT), Dallas Area Rapid Transit (DART), Fort Worth Transportation Authority (FWTA, also known as Trinity Metro), the Denton County Transportation Authority (DCTA), the North Texas Tollway Authority (NTTA), the Collin County Toll Road Authority (CCTRA), local governments, and other public agencies as needed to monitor programs and projects recommended in the current MTP, Mobility 2040, to ensure that they reflect the latest planning assumptions, allowing those projects to proceed through the planning and environmental stages of project development.

Staff will coordinate efforts with transportation partners and the public during the development of Mobility 2045, which is a new planning effort that will factor in a planning horizon year of 2045, new demographics, financial assumptions, and planning requirements. Mobility 2045 will be developed in accordance with the rules outlining the contents of the MTP under the policy direction of the Regional Transportation Council, technical guidance of NCTCOG’s technical committees, and public involvement efforts.

Staff will develop the MTP based on data collected during monitoring and development efforts. The recommendations will include a revised analysis of the projects and programs identified in the existing fiscally constrained MTP. Additionally, an air quality conformity determination will be needed to satisfy federal regulations for the MTP. Changes to the MTP will be made in coordination with local transportation providers and partners. During development of the MTP, preliminary evaluations will occur for corridor studies requested by local governments.
Moving Ahead for Progress in the 21st Century (MAP-21) introduced a new requirement to incorporate a performance-based approach in the transportation planning process. In response to this requirement, staff will coordinate with TxDOT to establish regional transportation system performance measures and targets once federal guidance is released on the FAST Act. Performance measure development will occur in coordination with the INVEST Implementation project, as noted in Subtask 4.02.

Anticipated products of this subtask include:

- Documentation of the MTP;
- Executive Summary of the MTP;
- Presentations utilizing MTP data and information;
- Maps;
- Collection and transmittal of travel model networks, GIS shapefiles, and performance reports as model outputs;
- Periodic reports to the Regional Transportation Council and the Surface Transportation Technical Committee documenting status of MTP implementation; and
- Coordination meetings to monitor and ensure the continued progress of project recommendations.

Regional Thoroughfare Planning Inventory (RTPI)

*Transportation Planning Funds*

In conjunction with the continual development of the Metropolitan Transportation Plan, NCTCOG staff will collect, translate, and inventory local government thoroughfare plans and provide planning support from a regional perspective. Once the thoroughfare plans are combined and compared, some instances will require resolution of boundary disputes to ensure a high degree of consistency and continuity between local government planning efforts and regional planning efforts. Activities will be ongoing throughout FY2018 and FY2019. Anticipated products include:

- Documented inventory of thoroughfare plans that were collected and included in transportation networks; and
- GIS-based regional arterial system map.

Regionally Significant Arterials (RSA)

*Transportation Planning Funds*

NCTCOG staff will continue to work in cooperation with the Federal Highway Administration, the Texas Department of Transportation, and all local governments to maintain, monitor, and amend, as needed, the RSA system for the Dallas-Fort Worth Metropolitan Area. Activities will be ongoing throughout FY2018 and FY2019. Anticipated products include:

- RSA database in both ArcGIS and TransCAD environments;
• Coordination with local governments in the planning and staging of transportation improvements; and
• A listing of existing and planned RSAs to be included in the Metropolitan Transportation Plan and air quality conformity analysis.

**Federal Functional Classification System (FFCS)**

**Transportation Planning Funds**

Staff will continue to work in cooperation with federal partners and the local TxDOT districts to maintain the FFCS for the Dallas-Fort Worth Metropolitan Area. This element includes monitoring roadway system function to determine the necessary mid-cycle amendments, as needed, to the FFCS. Activities will be ongoing throughout FY2018 and FY2019. Anticipated products include:

- Electronic transportation network of FFCS roadways;
- Coordination with local governments in the planning and staging of transportation improvements;
- Amendments, as needed, to the roadway system to correct, remove, or add roadways;
- Maps; and
- Presentations demonstrating location, function, and justification for amendments.

**Strategic Highway Research Program 2 (SHRP2) Performance Target Setting Collaboration**

**Other Funding Sources**

Building on previous work performed under this grant, during FY2018 and FY2019 this project will document the collaborative efforts between the Texas Department of Transportation (TxDOT) and NCTCOG in developing and reaching consensus on performance targets for federally required performance measures. Technical and policy committees will be engaged to review performance measure data and potential target setting processes. Using the Federal Highway Administration (FHWA) developed PlanWorks resource tool, NCTCOG will document which specific elements within PlanWorks were used to foster collaboration with TxDOT. Federal Highway Administration funds will be utilized for this project. Anticipated products include:

- Report documenting the agreed-upon targets; and
- Documentation of the collaborative process undertaken.

**4.02 Coordination of Transportation and Environmental Planning Processes**

Linking transportation planning and environmental planning represents a collaborative and integrated approach to transportation decision making. The following elements link development of data, processes and frameworks, and mitigation outcomes to enhance and support metropolitan transportation planning and project development activities.
Planning and Environment Linkages (PEL)

Transportation Planning Funds

This element is ongoing throughout FY2018 and FY2019 and will develop a framework to consider environmental, community, and economic goals early in the transportation planning stage, then carry them through the corridor and project development phases into construction and mitigation efforts. Anticipated products include:

- Metropolitan Transportation Plan environmental scoring and mitigation documentation;
- Partnerships and agreements to expand or improve regional data needs and other partner agreements;
- Documentation and presentation material for coordination meetings, workshops, and training sessions; and
- Technical papers, as needed.

Army Corps of Engineers Section 404 and 408 Permitting

Other Funding Sources

In FY2018 and FY2019, staff will continue activities associated with the Water Resources Development Act Section 214 Memorandum of Agreement between the United States Army Corps of Engineers (USACE) and NCTCOG. This agreement was formed to expedite the evaluation of Section 404 permits for regional priority transportation projects. Staff will monitor the progress of permitting for specific projects identified by transportation partners. The performance and the cost-effectiveness of the USACE under this agreement will be evaluated by using specific performance measures identified by staff. Regional Toll Revenue funds and local funds will support Section 404 activities.

Additionally, staff will continue to monitor and provide assistance of Section 408 permitting activities for major transportation projects. This effort could include attendance at meetings and coordination with resource agencies. Regional Toll Revenue funds will be utilized and other funds may be sought to support this initiative. This effort will include the following products:

- USACE-reported performance metrics;
- Presentations, meetings, and quarterly reports; and
- Clean Water Act Section 404 and 408 finalized permit decisions.
Environmental Stewardship Program

Other Funding Sources

The Environmental Stewardship Program will fund engineering studies for constructed wetlands and will fund a mobile-friendly Tree Tracker website. Consultants may be procured for these efforts. Staff will educate the private sector about mitigation needs in the region. Regional Toll Revenue funding will enable the procurement of trees to be planted to help mitigate the urban heat island effect. This element is ongoing throughout FY2018 and FY2019. Anticipated products include:

- Agreements with external partners;
- Webinar for mitigation bankers;
- Outreach with stakeholders;
- Meeting summaries and presentations; and
- Mobile-friendly Tree Tracker website.

Quantifying Benefits of Environmental Stewardship Efforts

Transportation Planning Funds

NCTCOG Transportation staff will work with NCTCOG Environment and Development staff and a consultant in FY2018 to develop a decision-making tool to plan for potential mitigation activities and locations. These mitigation activities and locations may restore and maintain environmental functions that could be affected by recommendations made during the metropolitan transportation planning process. The tool will quantify the environmental and cost benefits, including economic return-on-investment, of potential mitigation associated with transportation projects and programs. The tool also will help plan which mitigation activities are appropriate for the scope and scale of future transportation projects, including transportation-related stormwater projects. Finally, the tool will enable those who make decisions about transportation investments or policy to make better planning decisions about potential mitigation activities and locations that may protect and enhance the environment. Anticipated products include:

- Description of mitigation needs generated by transportation projects, including transportation-related stormwater projects in the region;
- Outreach with stakeholders, community leaders, and members of the public;
- Meeting summaries and presentations;
- Decision-making tool; and
- Final report.
INVEST Evaluation of Sustainability in Denton Greenbelt Corridor

Other Funding Sources

During FY2018, the 2011 Regional Outer Loop Corridor Feasibility Study will be updated to apply sustainability best practices identified by the Federal Highway Administration’s Infrastructure Voluntary Evaluation Sustainability Tool (INVEST). The update will focus on the Denton County and western Collin County portion of the formerly proposed Regional Outer Loop. Environmental data will be updated for the new feasibility study. Stakeholder and community outreach will take place to encourage sustainability and environmental stewardship in the portion of the corridor that travels through the Denton Greenbelt area. Federal Highway Administration and Regional Transportation Council Local funds will support work activities. Anticipated products include:

- Stakeholder and community outreach;
- Meeting summaries and presentations;
- Updates to environmental maps and charts;
- Updated feasibility study covering the Denton County and western Collin County portion of the proposed Regional Outer Loop; and
- INVEST final report.

Blue-Green-Grey Silo-Busting Initiatives

Other Funding Sources

In many cases, traditional transportation planning has resulted in “silos” that cause projects to be disjointed due to lack of communication or coordination amongst planners or project champions in various disciplines. To combat this challenge, NCTCOG solicited project ideas through a “Blue-Green-Grey” initiative to identify “silo-busting” projects that focus on three elements – blue (water), green (environment), and grey (transportation infrastructure). Selected projects are expected to help develop new ideas that engage multiple disciplines and implement projects that could be further developed and replicated regionwide. Through the 2017 solicitation, three projects were selected for funding: the City of Southlake Burney Lane Biofiltration System, the City of Farmers Branch Green Bus Stop Design Guidelines, and the Dallas Area Rapid Transit Community Gardens Hatcher Station Pilot. Through the 2018 solicitation, three projects were selected for funding: Hightower Drive Biofiltration Rain Gardens, Retrofitting Neighborhood Commercial Green Bicycle Park, and Micro-Detention Storage System. This initiative is supported through RTC Local funds. Work will be completed during FY2018 and FY2019. Anticipated products include:

- Installation of a biofiltration system as a part of the City of Southlake Burney Lane repaving project;
- Completion of a Green Bus Stop Guidelines document for the City of Farmers Branch, along with a study of, and design for, ten existing bus stops;
- Completion of a community garden in a vacant parcel near the DART Hatcher Station;
• Implementation of an eco-friendly bike parking design in the Bishop Arts District in the City of Dallas;
• Installation of a biofiltration system at the City of Watauga’s Hightower Drive storm drain inlets;
• Development of concept-level design details for implementation of a micro-detention storage system; and
• Final reports/case studies summarizing impacts, lessons learned, and any future plans.

4.03 Ensuring Nondiscrimination and Environmental Justice in MPO Planning/Program Activities

As a recipient of federal funds, NCTCOG is required to ensure nondiscrimination under Title VI of the 1964 Civil Rights Act. Under Title VI and related statutes, each federal agency is required to ensure that no person is excluded from participation in, denied the benefit of, or subjected to discrimination under any program or activity receiving federal financial assistance on the basis of race, color, national origin, age, sex, disability, or religion. The Civil Rights Restoration Act of 1987 clarified the intent of Title VI to include all programs and activities of federal-aid recipients, subrecipients, and contractors whether those programs and activities are federally funded or not. Executive Order 12898, Federal Actions to Address Environmental Justice in Minority Populations and Low-Income Populations (1994), stated that, “each federal agency shall make achieving environmental justice (EJ) 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.” As an MPO, NCTCOG strives to ensure that nondiscrimination and the principles of environmental justice are incorporated in its transportation plans, programs, policies, and activities.

To ensure nondiscrimination and environmental justice in its transportation planning activities, staff will work to enhance Title VI, Environmental Justice, and Limited English Proficiency considerations and inclusion in the planning process and ensure compliance with all federally and state-mandated requirements.

This Work Program subtask supports the following continued initiatives:

Compliance with Federal and State Laws and Regulations

Transportation Planning Funds

This element is ongoing throughout FY2018 and FY2019. Staff will hold meetings, workshops, and forums, as well as advise other department staff regarding appropriate ways to ensure consistency with applicable laws and regulations within their program areas. Anticipated products include:

• Redesigned promotional brochure in English and Spanish; and
• Compliance audit reports.
Collection and Analysis of Data

*Transportation Planning Funds*

This element is ongoing throughout FY2018 and FY2019. Work will include the collection and analysis of available demographic data, as well as research and review of similar processes across the country for applicability. In addition, University Partnership Program assistance initiated in FY2017 will identify transportation gaps and the effect they have on the quality of life among low-income (i.e., individuals living in households at or below the Department of Health and Human Services poverty line), transportation-disadvantaged older adults (i.e., individuals age 65 and above) in a low-density urban environment. Anticipated products include:

- Biennial report documenting NCTCOG programs or projects that incorporate environmental justice considerations;
- Presentations to department staff on regional demographic trends;
- Metropolitan Transportation Plan Environmental Justice analysis; and
- UPP report assessing mobility gaps faced by low-income, transportation-disadvantaged older adults living in a low-density urban environment.

Public Outreach and Title VI Resource

*Transportation Planning Funds*

This element is ongoing throughout FY2018 and FY2019. Work will include researching and integrating public engagement efforts to ensure protected populations are involved in the transportation planning process. Staff will hold meetings with program area environmental justice liaisons and review staff activities to advise regarding appropriate ways to incorporate Title VI and environmental justice into their program areas. Staff will also continue to serve as a Title VI/environmental justice resource for transportation committee members, local government members, and subrecipients. Anticipated products include:

- Title VI/environmental justice website updates;
- Presentations and documents necessary to support Title VI and environmental justice training activities; and
- Technical support for partners.

4.04 Performance-Based Planning and Coordination

*Transportation Planning Funds*

Recent federal and state regulations call for increased emphasis on performance-based planning to ensure the most beneficial transportation projects and programs are implemented. While data-driven decision making has been a cornerstone of the region’s planning processes, this subtask will provide for the coordination of this commitment and ensure that the federal initiative is fully integrated into NCTCOG’s planning process. Work efforts will support both short- and long-range
transportation planning efforts. The focus of this subtask will be the continued coordination of data-driven planning activities between staff, regional transportation partners, elected officials, and the public. Activities will include review of evolving rules and regulations related to performance-based planning, as well as oversight of data collection, analysis, and processes to support performance-based planning efforts in the metropolitan transportation planning process. Anticipated products include:

- Documentation and presentation materials for stakeholder meetings;
- Maps and databases;
- Documentation of analysis methodologies; and
- Documentation of decision-making processes.
**E. Funding Summary**

<table>
<thead>
<tr>
<th>Subtask</th>
<th>TPF¹</th>
<th>Additional Funding</th>
<th>Total</th>
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<td></td>
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<td></td>
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¹ Transportation Planning Funds (TPF) includes both FHWA PL-112 and FTA 5303 funds. TxDOT will apply transportation development credits sufficient to provide the match for FHWA PL-112 and FTA Section 5303 programs. As the credits reflect neither cash nor man-hours, they are not reflected in the funding tables.
VI. Task 5 – Special Studies

A. Objective

The North Central Texas Council of Governments’ (NCTCOG) Transportation Department frequently serves as an added resource to the various cities, counties, transportation authorities, and the Texas Department of Transportation (TxDOT) by conducting and/or participating in a wide range of various travel forecasting, planning, and technical projects referred to as Special Studies. Projects range from local traffic impact analyses to detailed technical support and evaluations for corridors to meet the requirements of the National Environmental Policy Act (NEPA). Providing regional support to transportation providers is critical in the planning, operation, and maintenance of a comprehensive regional transportation system.

A continuing emphasis of NCTCOG’s Unified Planning Work Program (UPWP) will be to provide continued technical support to the TxDOT Dallas and TxDOT Fort Worth District Offices, Dallas Area Rapid Transit (DART), the Fort Worth Transportation Authority (FWTA, also known as Trinity Metro), the Denton County Transportation Authority (DCTA), the North Texas Tollway Authority (NTTA), the Collin County Toll Road Authority (CCTRA) and other public agencies as needed in carrying out detailed corridor studies. Included in these evaluations will be the completion of ongoing corridor studies and assistance with Environmental Assessments (EA) and Environmental Impact Statements (EIS) consistent with the NEPA process and as outlined in the Metropolitan Planning Rules, as well as procedures developed in Subtask 4.02. Efforts will also be directed at improving levels of transportation decision making by expanding efforts to include a greater emphasis on incorporating the appropriate level of quantitative and qualitative environmental justice analysis procedures as developed in Subtask 4.03 into planning documents, policies, and activities. It is a goal of this enhanced effort to include a greater emphasis on environmental justice analyses, such as enhanced analytical capabilities and the identification of benefits and burdens on protected classes of the population into planning
activities. Coordination with the public involvement/outreach process will also play a primary role in ensuring the success of this program. A greater focus on environmental justice serves to not only meet the expectations of legislation, but strives to continually improve the transportation planning and decision-making process to ensure that the movement of goods and people is affordable, efficient, safe, and impartial for all patrons.

Emphasis will continue to be placed on providing technical assistance to local governments in transportation subarea studies and comprehensive/thoroughfare planning. NCTCOG serves as an extension of the staff of local governments and is available to provide technical support to maintain and improve transportation planning and to process critical day-to-day information often not available at the local level. Technical support also extends to private-sector enterprises under certain circumstances. Staff will assist with corridor-specific requests for travel data used in private-sector initiated project development through potential Comprehensive Development Agreements. As these initiatives move forward, staff will work to include these efforts in the metropolitan planning process. Exhibit I-8 of this document outlines the Unified Planning Work Program Policies that will be used to guide the allocation of NCTCOG resources in providing technical assistance.

Planning efforts related to the Land-use/Transportation interface reflect the connections among bicycle and pedestrian mobility, low vehicle miles of travel, and automobile parking. The objective of this effort is to encourage the deployment of transportation facilities and land uses that reduce the average vehicle miles traveled in the region.

The current transportation legislation, Fixing America’s Surface Transportation (FAST) Act, approves funding for surface transportation projects and continues the surface transportation investment made by the US Congress. While FAST authorizes funding for many transportation
funding categories and specific projects, it also continues the concepts identified in previous legislation, Moving Ahead for Progress in the 21st Century (MAP-21), regarding the cooperative, continuing, and comprehensive regional planning process. The FAST Act requires all Transportation Management Areas (metropolitan areas with populations greater than 200,000) to address congestion management through a process that provides for safe and effective integrated management and operation of the multimodal transportation system. Congestion management is an integral element of the region’s transportation planning and programming process. It serves as a guide for implementing both near-term and long-term regional transportation improvements.

Also addressed in Task 5 will be the impact of truck traffic, rail freight, and other goods movement in and through the region; support for ongoing local, State, and federal initiatives to address transportation system security; the development of policies, programs, and projects to improve transportation safety; data collection and planning efforts to assess the impact of aviation activity on surface access to aviation facilities and associated improvement needs; regional aviation system planning; and the streamlining and coordination of the planning and environmental review processes to expedite project delivery.

Although not a requirement in the Unified Planning Work Program, management and operations projects that are being managed or carried out by MPO staff are included in the document in addition to planning activities. These projects are included in order to provide a more complete inventory of staff activities and are identified in Tasks 1, 3 and 5. These implementation projects or programs are aimed at reducing congestion and improving air quality in the Dallas-Fort Worth Metropolitan Area.
B. Expected Products

Expected products include a wide variety of technical reports and documentation summarizing the findings of various travel forecasting and transportation planning efforts conducted as part of this task. Detailed descriptions of the likely products from each subtask are included in each subtask description.

C. Previous Work

Routine Work Efforts

In pursuit of a comprehensive, safe, and modern regional transportation system, Task 5 work efforts run a gamut from technical assistance and local traffic impact analyses to environmental impact support, goods movement, airport ground access and low-level airspace studies to sustainable development planning and implementation efforts. Routine endeavors for Task 5 concentrated on using the Dallas-Fort Worth (DFW) travel model for corridor refinement recommendations, and Mobile Source Air Toxics and Environmental Justice data. (Specific, non-routine regional corridor studies are listed in greater detail in the table below.) Task 5 work also addressed thoroughfare and subarea studies, alternative travel demand modeling and model validation checks. Work group meetings ensured coordination both internally and externally.

A program of Asset Management Data Collection and Analysis was begun for the purpose of initiating pilot projects for asset management. Pilot projects were begun; roadway performance criteria, evaluation apparatus and a project prioritization process were developed in accordance with State rules; and the Metropolitan Planning Organization (MPO) participated in federal rulemaking for establishing a statewide Transportation Asset Management Plan. Continuous monitoring of Congestion Management Process Project Implementation and Corridor Analysis occurred, along with reporting of Congestion Management Process (CMP) data and safety data for use in updating multiple Metropolitan Transportation Plan (MTP). Transportation Improvement
Program (TIP)/Statewide Transportation Improvement Program (STIP), Unified Transportation Program (UTP), and CMP databases and analyses. These efforts were coordinated among local governments and the Texas Department of Transportation (TxDOT), along with Integrated Corridor Management practices. An update of the Regional Intelligent Transportation System (ITS) Architecture was completed. Travel Demand Management (TDM) strategies identified in the CMP were addressed through a number of work efforts such as the development of survey questions for Mobility 2040 policy bundles, workshops to educate consultants on CMP project implementation, transit coordination meetings, a Single Occupancy Vehicle analysis, and the promotion of other TDM strategies. Operationally, congestion management programs such as the Regional Traffic Signal Retiming Project continued, and are expected to carry over into FY2018. Efforts were begun on activities designed to increase TollTag penetration, and planning and development/deployment programs to address the advent of automated vehicles were initiated. Freeway Incident Management and Photogrammetry courses were held for first responders and managers at the local-government level, along with continuing oversight of the Mobility Assistance Patrol Program. A number of programs aimed at travel demand reduction were coordinated and overseen by staff; they include a vanpool program, park-and-ride, and a Regional Trip Reduction Program (Try Parking It). These programs will all continue into FY2018 and FY2019.

Land-use and transportation initiatives are also ongoing elements of Task 5. Bicycle and pedestrian planning took place, comprised of collection and development of base Geographic Information System (GIS) data for updating the Regional Veloweb and collection of access-to-rail data in and around transit stations. Staff supported a bicycle and pedestrian advisory committee, researched best practices, and hosted training and other education events. Technical assistance was provided to local communities, not only for bicycle and pedestrian planning, but for sustainable development projects, as well. School siting and other land-use issues were
addressed relative to the impacts of transportation. These aforementioned activities are ongoing and will carry forward into fiscal years 2018 and 2019. Non-routine work efforts for Bicycle and Pedestrian and Sustainable Development Infrastructure projects are addressed in the table below.

Regional freight planning and support of the Regional Freight Advisory Committee continued through fiscal years 2016 and 2017, including monitoring the implementation of truck-lane restriction corridors, outreach, education and follow-up studies identified in Freight North Texas Regional Freight System Inventory. Staff addressed transportation system safety and security through a variety of activities, including support and assistance to agency and regional partners. This support was comprised of regional committee meetings, collection and analysis of technical transportation data, and planning services relative to transportation security. Support for the Air Transportation Advisory Committee continued, as did airport system and surface access to aviation planning. Projects related to implementation activities identified in Planning for Livable Military Communities continued, and a region-wide joint land-use study was conducted.

Throughout FY2016 and FY2017, certain regional projects were identified as critical transportation needs, requiring advanced efforts to bring them to implementation faster, thereby reducing inflation, meeting air quality goals, and alleviating congestion earlier. These projects addressed all surface modes. Streamlined development took place via technical and planning assistance, environmental coordination, and rail and roadway studies. Numerous projects were addressed during the reporting period. This work will continue in FY2018 and FY2019. Finally, the effort begun to create and implement transportation related jobs secured placements for over 100 program participants.
<table>
<thead>
<tr>
<th>PROJECT NAME</th>
<th>ACCOMPLISHERMENTS TO DATE</th>
<th>REASON FOR CARRYOVER TO FY2018</th>
<th>ANTICIPATED COMPLETION</th>
</tr>
</thead>
<tbody>
<tr>
<td>SH 183 Corridor Study – SH 199 to White Settlement Road (Phase 1) and White Settlement Road to IH 30 (Phase 2)</td>
<td>Work on the Phase 1 project was completed.</td>
<td>Phase 2 work is ongoing.</td>
<td>FY2018</td>
</tr>
<tr>
<td>SH 199 Corridor Study – IH 820 to Fort Worth Central Business District</td>
<td>Data collection and the evaluation of existing conditions took place, followed by the development of preliminary recommendations for the corridor. The Master Plan for development will be completed in FY2017. Technical assistance may be provided to TxDOT on the corridor under Subtask 5.01, Strategic Corridor Initiatives.</td>
<td>n/a</td>
<td>n/a</td>
</tr>
<tr>
<td>Dallas Streetcar</td>
<td>With the starter line in place, surplus Regional Toll Revenue (RTR) and Texas Mobility Funds (TMF) from the “starter” line were used to fund construction of a 0.85-mile Phase Two extension from Methodist Hospital – Oak Cliff to the Bishop Arts District, which was opened for public service on August 29, 2016</td>
<td>This is a multi-year project and work is ongoing.</td>
<td>FY2018</td>
</tr>
<tr>
<td>High-Speed Rail-Three Corridors</td>
<td>Through a participation agreement with the TxDOT Rail Division, NCTCOG staff provided technical support for the Houston-to-Dallas-Fort Worth corridor in the areas of alternative technology and preliminary alternative analysis. NCTCOG staff also led various analyses for the portion of the corridor through the Dallas-Fort Worth region. Staff attended various stakeholder and scoping meetings for the projects. NCTCOG staff provided support for the Dallas-Fort Worth High Speed Rail Commission including technical assistance and meeting support.</td>
<td>This is a multi-year project and work is ongoing.</td>
<td>FY2019</td>
</tr>
<tr>
<td>Regional People Mover Initiative</td>
<td>NCTCOG staff provided technical support and attended various stakeholder meetings intended to advance the Regional People Mover Initiative.</td>
<td>This is a multi-year project and work is ongoing.</td>
<td>FY2019</td>
</tr>
<tr>
<td>Cotton Belt iFi</td>
<td>NCTCOG staff participated in regularly scheduled meetings with transportation agency staff and local government staff. Staff continued to assist with the Federal Transit Administration (FTA) required annual reports and analyses pertaining to the TEX Rail project, including data collection and data analyses. Negotiations with local government officials concerning financial participation in the project were also conducted. Staff prepared and delivered presentations to the Regional Transportation Council and other groups concerning the project.</td>
<td>This is a multi-year project and work is ongoing.</td>
<td>FY2020</td>
</tr>
<tr>
<td>PROJECT NAME</td>
<td>ACCOMPLISHMENTS TO DATE</td>
<td>REASON FOR CARRYOVER TO FY2018</td>
<td>ANTICIPATED COMPLETION</td>
</tr>
<tr>
<td>--------------------------------------------------------</td>
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<td>-------------------------------------------------------------------------------------------------------------</td>
<td>------------------------</td>
</tr>
<tr>
<td>BNSF Irving/Frisco Corridor iFi</td>
<td>NCTCOG staff continued to attend corridor stakeholder meetings to discuss project process and status.</td>
<td>This is a multi-year project and work is ongoing.</td>
<td>FY2019</td>
</tr>
<tr>
<td>Hood County Transportation Plan (including Chisolm Trail Parkway Extension)</td>
<td>Staff conducted and completed a preliminary analysis of a proposed Chisolm Trail Parkway Extension, delivered the results to Hood County in FY2017, and met with officials from TxDOT and NTTA. Coordination with Hood County officials is ongoing in regards to the larger Hood County Transportation Plan, with a FY2018 kickoff anticipated.</td>
<td>This project is ongoing and work will continue</td>
<td>FY2019</td>
</tr>
<tr>
<td>Wise County Transportation Plan</td>
<td>This project officially began in Spring 2016. A policy committee of technical staff and elected officials was formed, and staff collected data, identified issues, and conducted a county-wide needs assessment. Results and recommendations were presented to the policy committee in the Spring 2017, and a final report is currently being drafted.</td>
<td>This project is ongoing and work will continue</td>
<td>FY2018</td>
</tr>
<tr>
<td>SH 174/Eastern Parkway Corridor Study</td>
<td>Staff completed an analysis on the feasibility of a loop around the southern and eastern portions of Cleburne, delivered the results to technical staff and elected officials in FY2017, and began the transition of the project to one focused on truck/freight bypass options on existing roadways. Any future work will be done as a component of freight planning.</td>
<td>n/a</td>
<td>n/a</td>
</tr>
<tr>
<td>Collin County Outer Loop</td>
<td>Two environmental documents for Segment 3a (DNT to SH 289) and the interchange at US 75 were completed and approved.</td>
<td>This is a multi-year project and work is ongoing.</td>
<td>FY2020</td>
</tr>
<tr>
<td>Bicycle/Pedestrian Infrastructure Projects</td>
<td>The Richardson Sidewalks to DART Rail Stations and the Plano Park Boulevard Pedestrian Bridge/Trail were completed.</td>
<td>n/a</td>
<td>n/a</td>
</tr>
<tr>
<td>Sustainable Development Infrastructure Projects</td>
<td>Seven Sustainable Development infrastructure projects were completed and closed out. Three Notices to Proceed were issued for other projects.</td>
<td>This is a multi-year initiative and work is ongoing on other projects.</td>
<td>FY2021</td>
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<tr>
<td>Sustainable Development Planning Projects</td>
<td>The SH 183 and Northwest Highway/Preston Center Studies, and the Fort Worth Texas Christian University/Berry Station Area Transit-Oriented Development Plan were completed.</td>
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<td>n/a</td>
</tr>
<tr>
<td>Value Pricing Pilot Program</td>
<td>Finalized Traffic Thermostat Tool. Implemented and tracked incentive program to alter commuter behavior. Project completion is expected in FY2017.</td>
<td>n/a</td>
<td>n/a</td>
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</table>
D. Subtasks

The following subtasks address Special Studies:

5.01 Regional Transportation Studies

This subtask provides support in the development and refinement of major regional corridor studies. For corridors identified for improvement in the financially constrained Metropolitan Transportation Plan (MTP), as well as other potential facilities being considered for inclusion in future MTPs, a comprehensive, detailed, and environmentally focused study must be performed at the corridor level.

Corridor Studies/Environmental Studies Support

Transportation Planning Funds

This subtask is ongoing throughout both FY2018 and FY2019, providing support in the development of corridor studies. For corridors identified for improvement in the Metropolitan Transportation Plan (MTP), both in the financially constrained and the illustrative list of projects, as well as other potential facilities being considered for inclusion in future MTPs, a comprehensive, detailed, and environmentally focused study must be performed at the corridor level. These corridor studies are funded by Transportation Planning Funds, unless otherwise noted, and may require environmental analysis, evaluation of existing and/or future infrastructure conditions, or other feasibility assistance. These studies are required by federal regulation and serve as a bridge between the regional planning process and the more detailed environmental analysis and corridor design and engineering phases conducted with partner agencies including Dallas Area Rapid Transit (DART), the Denton County Transportation Authority (DCTA), the Fort Worth Transportation Authority (FWTA), the North Texas Tollway Authority (NTTA), and the Texas Department of Transportation (TxDOT).

Where transportation-ended investments are contemplated, reasonable alternative strategies for addressing the transportation demands and congestion at a corridor or subarea level of the Metropolitan Planning Area are identified and evaluated in these studies. The corridor study process provides information to elected officials, technical staff, the business community, nearby property owners, and the general public on the costs, benefits, and impacts of these alternatives so that an informed decision can be made for a corridor improvement strategy. The study process also presents the opportunity to promote a balanced and multimodal transportation network to improve system interoperability and efficiency, and support the goals of the Metropolitan Transportation Plan, along with sustainability, livability, and community land-use objectives. Funding assistance may be requested from the participating agencies and potential private concessionaires involved in Comprehensive Development Agreement (CDA) efforts.

In addition, this Work Program subtask includes technical assistance enabling NCTCOG to respond to ad hoc requests for information and assistance from local governments, transportation authorities, public agencies, Transportation Management Associations, and private interest groups. TxDOT technical assistance requests, such as on- or off-system arterial corridor analysis projects that help determine pavement design and turning lane storage, are similarly included in this element. Tasks performed as technical assistance usually involve special computer
VI. Task 5 – Special Studies

processing and rerunning portions of the travel forecast model to determine travel conditions and assumptions as specified in each individual request. This work is often done for local governments in conjunction with consultants retained by the local government to complete a study or project. Anticipated products of this subtask include:

- Travel demand modeling forecasts for study corridor alternatives and alignment analysis;
- Specialized model runs such as select-link analyses and alternative demographic modeling;
- Report of daily volumes, peak-hour volumes, level of service, vehicle miles traveled, ridership totals, boarding and alighting figures, and other travel model data for studies;
- Travel demand modeling forecasts and forecast results reports with supporting tabulations as required for New Starts applications;
- Travel model networks, Geographic Information System (GIS) shape files, and performance reports as model outputs;
- Coordination meetings that monitor and ensure the continued progress of environmental document completion;
- Corridor-level mobile source air toxics analyses;
- Collection and transmittal of travel model data for potential CDA proposals;
- Environmental study and project updates on the NCTCOG website;
- Feedback to sponsoring agencies on review of document recommendations and design schematics prior to federal action;
- Update to the regional tolling analysis that evaluates potential environmental justice impacts;
- Analysis that quantifies potential environmental justice impacts at the corridor level;
- Written statements of support at public meetings and hearings for corridors;
- Assistance to local toll project entities on feasibility studies for potential toll roads;
- Review of feasibility and corridor study components;
- Evaluation of institutional structures necessary to implement proposed toll roads;
- Public involvement activities;
- Coordination of planning activities with regional transportation partners including TxDOT and NTTA;
- Corridor recommendations consistent with the Metropolitan Transportation Plan, the Transportation Improvement Program, and Regional Transportation Council policies; and
- Documentation to guide incorporation of asset management principles, performance measures, and pilot project recommendations in the preparatory, analysis, and decision-making efforts for updates to the Metropolitan Transportation Plan, Congestion Management Process, and the Transportation Improvement Program.
The following is a list of roadway and rail corridor studies in the Dallas-Fort Worth area that may require environmental analysis or other feasibility assistance and would be funded with Transportation Planning Funds. These studies will be conducted based on regional priorities, schedules of partner transportation agencies, and staff and funding availability. This list is not exhaustive of all potential corridor studies, but is included as a guide for projects on which assistance is currently ongoing or is anticipated.

- IH 35/IH 35W – Denton County
- IH 35W – Tarrant/Johnson County
- IH 30 – Tarrant County
- SH 121 – Tarrant County
- IH 820/IH 20/US 287 - Tarrant County (Southeast Connector)
- SH 170
- SH 161/SH 360 Toll Connector

Other Funding Sources

The following projects will be completed using Texas Department of Transportation funds:

- US 75 – Dallas/Collin County
- US 80/IH 30 (Dallas/Rockwall/Kaufman/Hunt Counties)
- US 380 – Collin County
- IH 635 East
- City Map (Downtown Dallas Freeway Coordination Study)
- SH 190 East Branch

North Texas Tollway Authority Feasibility Studies

Other Funding Sources

During both FY2018 and FY2019, NCTCOG will assist NTTA in providing travel demand modeling for current and future corridor feasibility studies, environmental documents, air quality impact analyses, and traffic and revenue forecasts. NTTA funds have been provided through an inter-local agreement between the two agencies to support this element for corridors listed in the Metropolitan Transportation Plan, as well as other potential NTTA corridors being considered for inclusion in future MTPs. NCTCOG will employ the Dallas-Fort Worth Regional Travel Model to provide technical data to NTTA in the analysis of new toll or managed facilities, operational enhancements, capacity improvements, or reconstruction of existing toll roads. Anticipated products of this subtask include:
• Technical data from the travel model including daily volumes, peak-hour volumes, levels of service, and vehicle miles traveled for use in the refinement of corridor recommendations; and

• Corridor-level mobile source air toxics analyses.

The following is a list of ongoing and potential feasibility or traffic and revenue studies for NTTA:

• DNT Extension (US 380 to Grayson County)
• SH 190 East Branch (IH 30 to IH 20)
• President George Bush Turnpike (Multiple Segments)

This list is not exhaustive of all potential toll facilities or toll-related roadway improvements. The list is also not presented in any sort of order of priority or importance. It is included as a guide for possible projects for which assistance may be requested. Project list revisions, as required, may be made by mutual agreement by NTTA and NCTCOG.

Strategic Corridor Initiatives

Other Funding Sources

Under this initiative, NCTCOG staff will continue to provide technical, planning, and environmental assistance to transportation agencies and the Regional Transportation Council to help advance critical regional projects through development, approval, and implementation as soon as possible. The goal of this program is to help reduce cost escalation due to inflation, alleviate congestion faster, and assist in meeting air quality goals. As regional roadway and freight/passenger rail projects continue to increase in complexity, scope, and impacts, the NCTCOG Transportation Department has identified a need to expand its involvement beyond its current planning and programming functions to improve project implementation in the Dallas-Fort Worth region.

Throughout FY2018 and FY2019, the program activities will provide assistance to advance all surface modes of transportation including passenger rail, freight rail, and roadway improvements, particularly on those projects that deal with multiple transportation modes. Surface Transportation Block Grant Program funds, Regional Toll Revenue funds, Texas Department of Transportation funds, and Transportation Development Credits will support this effort. Work products will vary depending on the work performed and could include:

• Meeting summaries;
• Comment review; and
• Technical memorandums.

The following is a list of roadway corridors that may be studied in this element:

• IH 35E - Dallas County
• IH 820/IH 20/US 287 – Tarrant County (Southeast Connector)
• IH 820/SH 121
• SH 183
• IH 635 East
• SH 199
• IH 30 –Tarrant County
• US 75 - Dallas/Collin County
• SH 190 East Branch
• Loop 9
• SH 161
• Denton County Outer Loop/Greenbelt Parkway

Collin County Strategic Transportation Initiative

Other Funding Sources

Carrying over into FY2018 and FY2019, work efforts on this initiative include identifying recommended changes to the Hunt County Transportation Plan regarding access to Collin County; identifying potential improvements to the IH 30, US 380, and SH 66 corridors; and developing a multimodal Collin County plan with emphasis on north-south capacity and east-west connections to Hunt County.  Surface Transportation Block Grant Program funds and Transportation Development Credits will be utilized to support this effort.  Anticipated deliverables include:

• Travel demand modeling;
• Report of daily volumes, peak-hour volumes, levels of service, vehicle miles traveled, and other travel demand model data;
• Presentation of results to local government officials; and
• Draft technical memorandum detailing methodology and results of analysis.

Harry Hines Boulevard Corridor Study from Loop 12 to Downtown Dallas

Transportation Planning Funds

Under this FY 2018 and FY 2019 initiative, NCTCOG staff will develop conceptual alternatives to test the travel demand for the Harry Hines corridor.  The purpose of this initiative is to evaluate potential solutions to provide multi-modal transportation and technology options in the corridor.  Anticipated products include:

• Conceptual alternatives and alignments;
• Travel demand modeling for study corridor alternatives and alignment analyses; and
• Technical memorandum documenting the findings for inclusion in future studies.

Other Funding Sources
In FY2019, NCTCOG will develop a corridor plan for Harry Hines Boulevard from Loop 12 to Downtown Dallas. The purpose of this study is to develop a context sensitive design with modern engineering concepts to provide multi-modal transportation options and to increase the sustainability/livability in the corridor. Work efforts will be supported through Surface Transportation Block Grant Program funds **and** Transportation Development Credits. Consultant services may be used to support this study. Anticipated products include:

• A corridor plan for Harry Hines with an emphasis on sustainable development and providing multi-modal transportation and technology options.

IH 35E (IH 635 to US 380)

Other Funding Sources
In addition to support activities on this corridor as noted above, during FY2018 and FY2019 staff will also provide support to TxDOT and local partners to help facilitate environmental, design, and funding reviews and approvals with appropriate agencies, as well as fulfillment of Senate Bill 1420 objectives and procurement requirements. Staff will work with TxDOT and the project contractor(s) to monitor, evaluate, and modify ongoing corridor traffic management programs or products during construction, if warranted. Regional Toll Revenue funds will be utilized to support this effort and anticipated products include:

• Construction progress reports;
• Presentations and briefings on access management;
• Detour routing; and
• Other construction-related design activities.
High-Speed Passenger Technology

**Other Funding Sources**

NCTCOG staff will provide leadership and/or support for work activities related to high- and higher-speed passenger technology within the Dallas-Fort Worth Planning Area Boundary and those areas outside the Planning Area Boundary that impact travel within the Boundary. NCTCOG work activities will be supported with Surface Transportation Block Grant Program funds, Regional Toll Revenue funds, Regional Transportation Council Local funds, and Transportation Development Credits. Efforts may include all activities associated with planning and implementation of high- or higher-speed passenger technology (i.e., rail, next-generation magnetic levitation) in the Dallas-Fort Worth region, as well as activities related to connecting the Dallas-Fort Worth region to other metropolitan areas. Consultant assistance may be used for this initiative. RTC Local funds will also be used to support project-related travel expenses associated with the Dallas to Fort Worth corridor.

The following products will be delivered during FY2018 and FY2019 as the result of work done on this project:

- Various maps identifying alternatives and Regional Transportation Council policies;
- Development of ridership modeling analyses for various high-speed passenger technology alignments and station locations; and
- Recommended station locations, alignments and technology.

High-Speed Passenger Technology Core Express Service

**Other Funding Sources**

The Regional Transportation Council has secured Surface Transportation Block Grant Program funding, to be matched with Transportation Development Credits, to support the development of high-speed passenger technology between Dallas and Fort Worth. These dollars and credits will be utilized by NCTCOG to lead the initiative to complete the Environmental Impact Statement on the Core Express Service project. Consultant assistance will be utilized. Anticipated products include:

- Final Environmental Impact Statement; and
- Record of Decision.

Regional People Mover Initiative

**Other Funding Sources**
Throughout the Dallas-Fort Worth region, many opportunities exist for an appropriate technology to serve as a “last mile” connection or distribution system within a mixed-use activity center area. During FY2018 and FY2019, NCTCOG staff, working in collaboration with the many project opportunity owners, stakeholders, and local government and transportation authority partners, will identify the merits of alternative people mover technologies available; assess each regional project opportunity for unique needs, including similarities and synergies; and evaluate the potential for cost efficiencies and savings provided by a single people mover technology and provider. Consultant assistance will be utilized for this initiative. Surface Transportation Block Grant Program funds and Transportation Development Credits will be used. The following products will be delivered as the result of work done on this project:

- Technical memorandums covering evaluation of alternative people mover technologies;
- Technical memorandums evaluating the needs of the various regional people mover project opportunities.

**Dallas Streetcar System**

*Other Funding Sources*

Working in partnership with the City of Dallas and DART, NCTCOG will provide funding and technical assistance, including planning, engineering, and design efforts, in coordination with local, regional, state, and federal agencies for Dallas Streetcar starter system extensions. Assistance may also include efforts as needed leading to project implementation and Federal Transit Administration requirements for Satisfactory Continuing Control of original TIGER project. Consultant assistance may be utilized for this initiative. Funding sources include Surface Transportation Block Grant Program and Regional Toll Revenue funds, and Transportation Development Credits. Anticipated products include:

- Grant applications;
- Ridership estimates;
- Environmental analysis; and
- Technical reports.

**M-Line Extension Feasibility Study**

*Other Funding Sources*

During FY2018 and FY2019 and in coordination with the McKinney Avenue Transit Authority, the City of Dallas, Dallas Area Rapid Transit (DART), and other stakeholders in the area, NCTCOG will conduct a feasibility study for an extension of the M-Line Trolley to connect Uptown with the Knox-Henderson neighborhood. The feasibility study will recommend alignments and stops; evaluate the cost of implementation, operation and maintenance; identify potential funding sources; and develop a preliminary implementation schedule. Consultant assistance may be used for this initiative. Funding source is Surface Transportation Block Grant Program funds and Transportation Development Credits. Anticipated products include:
• Ridership estimates;
• Preliminary environmental analysis; and
• Technical reports.

**Regional Passenger Rail Innovative Finance Initiative**

**Other Funding Sources**

During FY2018 and FY2019, NCTCOG staff will further investigate innovative funding opportunities to generate revenue for capital and operating cost needs for regional passenger rail systems. NCTCOG staff will coordinate efforts with DART, DCTA, and FWTA, as well as representatives from local government, state and federal agencies; property owners and developers to investigate the possible funding methods. NCTCOG, working with stakeholders, will explore options under State and local laws for project implementation, and financial and governance structures to advance all regional passenger rail projects. Efforts will include, but are not limited to, the Cotton Belt and the Frisco passenger rail corridors. Consultant assistance may be utilized for this initiative, and Regional Toll Revenue funds will be used. The following products will be delivered as the result of work done on this project:

• Technical memorandums documenting analysis related to project implementation, and financial and governance structure options; and
• Mapping of potential alignment alternatives.

**5.02 Subarea Studies and Local Government Assistance**

This subtask provides assistance to local governments, including thoroughfare planning support, comprehensive studies, and technical assistance. This includes coordinating with local, regional, state, and federal agencies and assisting in the preparation of environmental and planning documents, as well as working with local governments in developing the transportation component of a city’s comprehensive plan or county-wide transportation plan.

**Comprehensive Transportation Planning Studies and Technical Support**

**Transportation Planning Funds**

This subtask is ongoing throughout FY2018 and FY2019, providing an evaluation of multimodal transportation needs within a specific geographic area or along an arterial or transit corridor. Subarea studies are designed to study a specific issue and allow for a comprehensive assessment of general transportation needs within an area prior to examining system alternatives. A portion of this subtask is dedicated to assisting local governments in developing the transportation component of a city’s comprehensive plan or in the development of citywide transportation plans through the delivery of travel forecasts and technical support for these efforts. This subtask includes technical assistance enabling NCTCOG to respond to ad hoc requests for information and assistance from local governments, transportation authorities, public agencies,
Transportation Management Associations, and private interests. Due to the large number of similar requests, NCTCOG will prepare countywide subarea forecasts that can be used to assist local governments with thoroughfare planning needs and to answer many technical assistance questions. Additionally, this subtask allows for coordinated planning efforts that provide travel demand model ridership data and technical analysis to local transit agencies.

Specific projects in this work subtask are listed below. The list is not all inclusive, as additional requests may be considered pending staff and resource availability. The timing in which local governments are ready to begin studies and the availability of NCTCOG staff and consultant assistance drive the scheduling of these efforts. Consultant assistance may be utilized to support these studies, and local governments may be responsible for consultant assistance funding. The policies set forth to guide the activity in this Work Program element are contained in Exhibit I-5.

This Work Program subtask also provides traffic forecasting and technical support for subtasks conducted by other program areas within the department.

Anticipated products include:

- Countywide subarea forecasts and identification of recommendations;
- Thoroughfare planning guidelines;
- Travel demand modeling for study corridor alternatives and alignment analyses;
- Report of daily volumes, peak-hour volumes, levels of service, vehicle miles traveled, ridership totals, boarding and alighting figures, and other travel model data for studies;
- Collection and transmittal of travel model networks, GIS shape files, and performance reports as model outputs;
- Project updates on NCTCOG website; and
- Incorporation of recommendations into the next Metropolitan Transportation Plan.

Provided below is a list of ongoing and candidate projects in the Dallas-Fort Worth area which will be conducted or supported based on regional priorities, schedules of partner transportation agencies, and staff and funding availability. This list is divided into three categories that provide a scaled level of NCTCOG staff involvement: Category 1 – NCTCOG is conducting the study; Category 2 – NCTCOG is providing limited analysis and data to support an external study; and Category 3 – NCTCOG is responding to small, ad hoc requests for technical assistance.

Roadway

Category 1

- **Hood County Transportation Plan (including Chisholm Trail Parkway Extension)**
  A countywide plan will be developed that incorporates land-use planning, traffic count and accident data, demographic projections, travel demand modeling, local government committee assistance, and public involvement.

- **Wise County Transportation Plan**
  Nearing completion, this study focuses on producing a countywide vision and roadway recommendations beyond the year 2040. Tasks include issue
identification, data collection, technical analysis, and presentations of results and recommendations to the project policy committee. It is anticipated that a final report will be provided to the County in FY2018.

- **Northwest Tarrant County Transportation Subarea Study**
  This study will focus on an assessment of transportation needs in northwest Tarrant County. This effort will include a review of current and future traffic volumes, with attention given primarily to the regional arterial system in regards to connectivity and capacity needs.

**Category 2**
- City of Cleburne Thoroughfare Plan
- Dallas County Major Capital Improvement Program (MCIP)
- City of Dallas Comprehensive Thoroughfare Plan Update
- Tarrant County (Mansfield/Kennedale) Business 287/Kennedale Pkwy. Corridor Study
- Dallas County Thoroughfare Plan Update
- Fort Worth Subarea Transportation Plan
- Western Tarrant County Transportation Initiative
- Hunt County Thoroughfare Plan
- East-West Connector for Dallas Fort Worth International Airport
- City of Grapevine Thoroughfare Plan Update
- City of Balch Springs Master Thoroughfare Plan Update
- City of Dallas Bishop Arts Transportation Plan
- City of Wylie Collin College Regional Transportation Study
- City of Lake Worth Thoroughfare Planning Assistance
- City of White Settlement Thoroughfare Planning Assistance
- Ellis County Thoroughfare Plan

**Category 3**
- Technical Assistance

**Transit**

**Category 1**
- No projects at this time

**Category 2**
- No projects at this time

**Category 3**
- Technical Assistance
Collin County Outer Loop

Other Funding Sources

Ongoing throughout FY2018 and FY2019, NCTCOG will continue to assist Collin County with the development and implementation of the proposed Collin County Outer Loop. This includes coordinating with local, regional, State, and federal agencies and assisting in the preparation of environmental and planning documents. RTR funds will be utilized to support this effort, and consultant assistance will be utilized. Anticipated projects include:

- Local environmental documents working in collaboration with Collin County staff and consultants.

Dallas Strategic Mobility Plan

Other Funding Sources

During FY2019, efforts will begin to develop a Strategic Mobility Plan for the City of Dallas designed to coordinate and integrate existing and previous plans into one cohesive and strategic vision for the City. The Plan, led by the City, will address connectivity and accessibility, safety and reliability of systems, integration of mobility plans and tools, alignment with community characters and land uses, collaboration and partnerships, environmental stewardship, and the timely implementation of goals and objectives. Regional Toll Revenue funds and local funds will support this effort. Consultant assistance will be utilized. Anticipated products include:

- Community engagement;
- Inventory of existing plans and infrastructure;
- Performance measures to track progress;
- Guiding principles and policies; and
- Short- and long-term recommendations.

5.03 Land-use/Transportation Initiatives

This subtask is ongoing throughout both FY2018 and FY2019. Work will include various elements, including Sustainable Development Initiatives, Transit-Oriented Development, and Bicycle/Pedestrian Planning, Safety, and Engineering Initiatives.
Sustainable Development Initiatives

Transportation Planning Funds

This subtask includes regional, subarea, corridor, and district-level planning along with technical assistance focused on the interface between transportation and land use, including assistance with school siting. Staff will continue work on the development and implementation of tools related to land use planning principles such as sustainable zoning practices and others, and will host training sessions and develop educational information. Staff will continue to pursue funding opportunities to expand or enhance activities. Anticipated products include:

- Technical assistance to local governments on implementing sustainable development programs and projects such as the development of unified corridor plans, land use analysis, data collection, parking technology and management education and training, form-based code review, 3D visualization services, financing strategies and tools for economic development, zoning and special district analysis, and planning to promote infill and mixed-use developments;

- Online information, training, and education on topics related to Green Infrastructure, Sustainable Resource Efficiency, sustainable zoning, and other such topics to assist in growth management and land-use planning; and

- Coordination between Independent School Districts and other stakeholders in FY2019 to engage in regional issues related to school siting, safe routes to school, and policy and transportation issues.

Other Funding Sources

Utilizing Regional Transportation Council (RTC) Local funds, staff will continue developing and tracking regional performance measures related to land-use and transportation projects and will develop future funding programs for implementation. Utilizing Federal Highway Administration (FHWA) Transportation Investment Generating Economic Recovery funds and RTC Local funds, staff will support efforts related to school siting and technical assistance. Anticipated products include:

- Funding programs and coordination on regional sustainability/livability grant initiatives;

- Development and implementation of land-use supported funding programs;

- Data collection and performance measure tracking;

- Coordination between Independent School Districts and other stakeholders to engage in regional issues related to school siting, safe routes to school, and various policy and transportation issues;

- Establishment of a regional working group;
• Coordination on growth and demographics;
• Technical assistance and best practices related to school siting, land banking, and transportation connections to schools;
• Development of Safe Routes to School plans;
• Safety and education information; and
• Training opportunities for various stakeholders.

The Regional Transportation Council selected a series of infrastructure/construction, planning, and land banking projects during three Sustainable Development Calls for Projects (SDCFP) in 2001, 2005-2006, and 2009-2010. Efforts in overseeing pass-through construction dollars will be conducted in conjunction with local governments to better coordinate transportation investments and land use. This program of projects was originally funded by Surface Transportation Program–Metropolitan Mobility funds, (now known as Surface Transportation Block Grant Program [STBG] funds), and Congestion Mitigation and Air Quality Improvement Program (CMAQ) funds and was established in 2001 when the RTC selected the first Land-use/Transportation Joint Venture projects. Additional RTC Local funds were programmed to fund these projects through the 2005-2006 SDCFP. Regional Toll Revenue (RTR), STBG, and local funds were allocated to the program with the 2009-2010 Sustainable Development Call for Projects.

Exhibit VI-1 contains the listing of the sustainable development projects still underway, as well as other studies led by NCTCOG. The funds are used to provide:

• Infrastructure projects such as road construction, sidewalks, pedestrian amenities, bike trails, etc.;
• Planning reports developed by consultants; and
• Land purchases.

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**EXHIBIT VI-1**

**SUSTAINABLE DEVELOPMENT PROJECTS**

<table>
<thead>
<tr>
<th>Project Name</th>
<th>Type</th>
<th>Funding Source</th>
</tr>
</thead>
<tbody>
<tr>
<td>Plano Transit Village</td>
<td>Infrastructure</td>
<td>STBG/CMAQ/RTC Local/TDCs</td>
</tr>
<tr>
<td>Fort Worth Ridglea Village (Westridge)</td>
<td>Infrastructure</td>
<td>CMAQ/RTC Local</td>
</tr>
<tr>
<td>Irving Northwest Corridor</td>
<td>Infrastructure</td>
<td>CMAQ/RTC Local</td>
</tr>
<tr>
<td>Fort Worth West Rosedale Improvements-Magnolia Green</td>
<td>Infrastructure</td>
<td>RTC Local</td>
</tr>
<tr>
<td>Dallas Mockingbird Plaza &amp; Midtown/Central/University</td>
<td>Infrastructure</td>
<td>RTC Local</td>
</tr>
<tr>
<td>Dallas Routh Street Underpass</td>
<td>Infrastructure</td>
<td>RTR/STBG/TDCs</td>
</tr>
<tr>
<td>Dallas Zang Triangle</td>
<td>Infrastructure</td>
<td>RTR/STBG/TDCs</td>
</tr>
<tr>
<td>Dallas Project Paseo</td>
<td>Infrastructure</td>
<td>RTR/STBG/TDCs</td>
</tr>
</tbody>
</table>
The 2001 projects are coordinated directly between the implementing agencies and the Texas Department of Transportation. Utilizing RTC Local funds, NCTCOG staff will provide oversight for the implementation of the 2005-2006 infrastructure, landbanking, and planning studies. Utilizing STBG funds and TDCs, staff will oversee the implementation of the 2009-2010 infrastructure and planning projects and other planning projects that may be assigned that are project/corridor specific.

For the additional work done on parking, a combination of Surface Transportation Block Grant Program funds, RTC Local funds, other local funds, and Transportation Development Credits will be used to support activities in this area. Consultant assistance will also be utilized. Anticipated products include:

- Implementation and tracking of infrastructure projects;
- Project tracking and technical assistance to local governments developing sustainable development projects;
- An approved acquisition plan for funded Sustainable Development Landbanking Projects which involve parcel assembly for redevelopment and future use;
- Work scopes for plan procurements;
- Consultant selection;
• Parking analysis of garage and transportation interfaces at various locations;
• A Curb Lane Management Study in the City of Dallas that is expected to be used as a pilot for the region to evaluate and recommend curb space facilities to coincide with existing and future development needs;
• Creation of a mobile application mapping system that provides real-time information regarding City of Dallas-owned parking facilities to include availability, rates, and access to payment, as well as access to multimodal trip planning. This application is expected to be used as a pilot for the region; and
• Continued partnership for the IH 30 Ballpark Park-N-Ride lot to remain open for daily commuters.

Transit-Oriented Development

Other Funding Sources

The Transit-Oriented Development (TOD) Implementation Group was created through the 2005-2006 Sustainable Development Call for Projects and is funded by STBG funds and TDCs. The TOD Implementation Group was established to provide education, planning, data collection, and research assistance to TOD projects. Under this element, staff will coordinate with public-sector sponsors to evaluate specific needs for the successful implementation of TOD. Additional work will also be conducted to promote TOD in the region and to develop funding strategies and programs. Staff will work on developing job-housing balance strategies and identify and develop best practices for development around various transit modes. A regional TOD overall strategy will also be developed with local government participation. Anticipated products include:

• Data collection intended to document existing conditions, develop performance measures for long-term transportation and land-use planning for areas surrounding rail stations and other transit-supportive modes;
• Meetings of the regional TOD Working Group to facilitate TOD education/training events and implementation strategies among the cities connected by rail transit and transit agencies;
• Research, education, and planning assistance on criteria-related issues such as the impact of the passenger light rail system on property values in areas near existing rail stations and other transit modes, parking, job-housing balance, typologies, codes, performance measures, and analysis of options for density and design/form-based code zoning;
• Technical assistance to develop market assessments and station area plans to promote TOD in the region; and
• A regional TOD strategy.
DART Red and Blue Lines TOD Planning Study

Other Funding Sources

The Transit-Oriented Development (TOD) Planning Pilot Grant was awarded to NCTCOG in October 2016 to support TOD planning around 28 Dallas Area Rapid Transit (DART) Red and Blue Line Light Rail Stations. The planning work will be coordinated with DART and the Cities of Dallas, Garland, Plano, and Richardson, with NCTCOG administering the grant and leading planning activities. Staff will coordinate with these project partners by hosting meetings, preparing draft scopes of work, and taking part in planning work and data collection as needed. The planning work has three elements: a pedestrian and bicycle last-mile infrastructure study, a parking utilization study, and a survey of TOD residents and employers. Federal Transit Administration, RTC Local, and other local funds will be used to support work activities. Consultant assistance will be utilized. Anticipated products include:

- An implementation plan for prioritizing and understanding cost to improve last-mile pedestrian and bicycle connections to these rail stations;
- Data collection of parking utilization at specific sites around a sample of the 28 stations and comprehensive policy recommendation related to analysis of that data;
- Survey data collection and analysis of residents and/or employers in the station areas focused on their travel behavior, demographics, and preferences related to TOD; and
- Strategic recommendations for policy adjustment based on data collected and a process for replicating similar data collection and study across the region.

Bicycle and Pedestrian Planning

Other Funding Sources

The focus of this element is to assist in developing, educating on, and promoting bicycle and pedestrian mobility and safety throughout the region. Utilizing STBG funds, FHWA Enhancement Program funds, RTC Local funds, other local funds and TDCs, staff will plan facilities for active transportation modes; support and provide technical assistance to local governments and the Bicycle and Pedestrian Advisory Committee (BPAC); and advance general data collection, mapping, and a regional bicycle and pedestrian count program (including automated bicycle and pedestrian count equipment as noted in Exhibit II-2 of Subtask 1.04). Consultant assistance may be utilized. Staff will also develop and provide public education and information related to safety, accessibility, design, and economic impacts of bicycle and pedestrian facilities. Anticipated products include:

- Update of the Active Transportation Planning element for Mobility 2040, including the Regional Veloweb;
- Implementation of a bicycle and pedestrian monitoring and data collection program in the region and coordination with local governments on initiatives;
- Bicycle and pedestrian facility plans associated with transit-oriented development areas, bicycle and pedestrian transportation districts, and corridor-area plans;
• Design guidelines and best practices for on-street and off-street bicycle facilities and shared-use paths, including policies related to context-sensitive solutions for multimodal accommodations within street rights-of-way;

• Healthy initiatives and air quality coordination data;

• Regional pedestrian and bicycle plans;

• Active transportation funding programs;

• Bicycle and Pedestrian Advisory Committee meetings;

• Bicycle and pedestrian public education, research, and information programs;

• Federal and State Active Transportation Programs which may include Transportation Alternatives Programs such as Transportation Enhancement, Safe Routes to Schools, and Urban Thoroughfares;

• Grant proposals to secure additional program funds or to support regional applications; and

• Technical assistance to cities, towns, and counties including policy guidance, planning studies, data, mapping, technical guidance, and GIS support.

Staff will also oversee the implementation of the Regional Bicycle/Pedestrian Sustainable Development Initiatives projects which utilize pass-through CMAQ funds and TDCs available to local governments for the implementation of various bicycle and pedestrian projects. These projects may include, but are not limited to: spot improvements, safety countermeasures, innovative facilities, street reconstruction and rehabilitation as part of bicycle and pedestrian accommodation projects, multi-use trails, signage, pavement markings, traffic signals, and other supportive infrastructure. Staff oversight activities will be supported by STBG and local funds, and TDCs. Anticipated products include:

• Identification of funding needs and project scopes.

Downtown Wylie Pedestrian Access and Streetscape Plan

During FY2018 and FY2019, staff will lead a streetscape planning study for the City of Wylie. The study will engage the community and recommend multimodal transportation accommodations in context with the downtown area including facilities for pedestrian, bicycles, and motor vehicles supporting the community vision for a walkable destination place. Surface Transportation Block Grant Program funds and Transportation Development Credits will support work activities. Anticipated products include:

• Streetscape vision;

• Streetscape/roadway templates;

• Estimate of probable construction costs; and

• Implementation plan.
Fort Worth Active Transportation Plan

Other Funding Sources

Staff will oversee the development of a citywide Active Transportation Plan for the City of Fort Worth focused on a seamless network of on- and off-street bicycle and pedestrian facilities integrated with the public transportation and thoroughfare networks. The Plan will include stakeholder involvement and the analysis of the existing and planned walking/bicycling/public transportation infrastructure network, including gaps in the network, crash data, and technology options. RTC Local funds and other local funds will be used to support planning activities, and existing STBG funds will be used for staff oversight activities. Anticipated products include:

- Updated city-wide bicycle network plan;
- Network analysis including appropriate corridors in the city-wide network as low-stress routes for bicyclists of “All Ages and Abilities (AAA)”;
- Recommended policies and programs;
- Project prioritization, implementation plan, and funding strategies;
- Technology options for information sharing; and
- Performance measures.

Bicycle and Pedestrian Engineering

Other Funding Sources

Staff will oversee the preliminary engineering of the Midlothian-to-Waxahachie Regional Veloweb Shared-Use Path from the existing Waxahachie city trail in Getzendaner Park east of IH 35E to near downtown Midlothian. Coordination efforts will include the City of Midlothian, the City of Waxahachie, Ellis County, NCTCOG, TxDOT, and the Union Pacific Railroad. CMAQ funds and local funds will be used to support engineering activities, and STBG funds and TDCs will be used for staff oversight activities. Anticipated products include:

- Fifteen percent design development schematic;
- Environmental report;
- Estimate of probable construction cost; and
- Construction phasing plan by jurisdiction.

Additionally, staff will oversee the preliminary engineering of a Regional Veloweb Shared-Use Path from the existing trail at the Denton County Transportation Authority Hebron Station in Lewisville south to the Campion Trail in north Irving. The project would include connections to two DART stations in Carrollton and the existing Regional Veloweb North Levee trail along Denton Creek in Coppell. In addition to the seven agencies participating in the projects, coordination efforts will also include TxDOT, North Texas Tollway Authority, utility providers, and other public and private stakeholders in the area. CMAQ funds and local funds will be used to support
engineering activities, and STBG funds and TDCs will be used for staff oversight activities. Anticipated products include:

- Feasibility and alignment study with 10-15 percent design development schematic;
- Permitting review;
- Estimate of probable construction cost; and
- Construction phasing plan by jurisdiction.

Staff will oversee the preliminary engineering of the Bomber Spur Regional Veloweb Shared-Use Path in Fort Worth from the intersection of SH 183 and W. Vickery Boulevard on the south to the intersection of SH 183 and Calmont Avenue on the north. Coordination efforts will include the City of Fort Worth, TxDOT, Union Pacific Railroad, and Streams & Valleys Inc. Surface Transportation Block Grant Program (STBG) and local funds will be used to support engineering activities, and STBG funds and Transportation Development Credits (TDCs) will be used for staff oversight activities. Anticipated products include:

- Preliminary design development schematic;
- Environmental summary;
- Estimate of probable construction cost; and
- Construction phasing plan.

Staff will oversee the feasibility and alignment study of the Southern Dallas County Regional Veloweb Shared-Use Path from near the intersection of FM1382 and W. Pleasant Run Road in Cedar Hill to near the intersection of E. Pleasant Run Road and Lancaster Hutchins Road in Lancaster. Coordination efforts will include TxDOT, Dallas County, and the cities of Cedar Hill, DeSoto, Duncanville, and Lancaster. STBG and local funds will be used to support the study activities, and STBG funds and TDCs will be used for staff oversight activities. Anticipated products include:

- Preliminary design development schematic;
- Environmental summary;
- Estimate of probable construction cost by jurisdiction; and
- Construction phasing plan by jurisdiction.

Regional Pedestrian and Bicycle Safety Plan

Other Funding Sources

Staff will initiate and develop a regional pedestrian and bicycle safety plan to improve safety for the region’s pedestrian and bicycle transportation network. The plan will also serve as a template for the preparation and implementation of local agency pedestrian and bicycle safety plans. This
initiative will be funded by STBG funds and TDCs. Consultant assistance may be utilized. Anticipated products include:

- Analysis of crash data and the contributing factors for pedestrian and bicycle crashes/fatalities throughout the region;
- Recommended countermeasures to improve safety for the region’s pedestrian and bicycle transportation network;
- Recommended engineering, enforcement, education, and evaluation activities to implement across the region; and
- A framework for local agency pedestrian and bicycle safety plans.

**Regional Economic Development Initiatives**

*Transportation Planning Funds*

This element continues throughout FY2018 and FY2019, and will provide planning assistance and transportation demographic technical information and data to support economic development initiatives throughout the metropolitan area. Benefactors of this support may include the Office of the Governor; area chambers of commerce; economic development coalitions, authorities, and groups; and public-private sector partnerships when working to attract new business and large industries to the region. Transportation Planning Funds will be used to support these initiatives, as well as non-federal sources of funding as they become available. Anticipated products include:

- Maps;
- Travel times;
- Traffic counts and volumes; and
- Socio-economic information.

### 5.04 Capital and Operational Asset Management System

This subtask will manage coordination for the continued development, monitoring, and other technical assistance for an Asset Management System among the North Central Texas region’s transportation providers and local governments that will ultimately help maintain a successful balance between preserving and/or upgrading existing transportation assets and efficiently replacing assets of the greatest need.

**Asset Management Data Collection and Analysis (CAPMAIN):**

*Transportation Planning Funds*

This element will proceed with obtaining information about best asset management practices (applied through local governments, metropolitan planning organizations, and transportation
providers) and examining various tools for storing, analyzing, and applying asset data. Steps to determine asset data that is readily available from internal and external sources, prioritizing the asset data (asset types, attributes, etc.), and collecting and organizing the asset data will continue. Additional efforts will include evaluation of options for collecting additional data (which may include development of regional strategies); implementing techniques to increase awareness of the Asset Management System; reviewing and applying research on various engineering, economic, and environmental factors affecting asset condition/performance; examining utilization strategies to affect planning and deployment of corridor capacity maximization programs; and, identifying potential pilot projects to demonstrate system interoperability and effectiveness. Corridors to be evaluated throughout this period will be based on Metropolitan Transportation Plan (MTP) and Congestion Management Process (CMP) guidance and outputs. Information will be used to support various analysis efforts under Subtask 5.01 (Regional Transportation Corridor Studies) and Subtask 5.02 (Transportation Subarea Studies), including activities to assist transportation providers and local governments in environmental clearance, schematic/final design initiatives, and potential staging implementation. Corridors to be evaluated include:

- IH 20 – Dallas/Tarrant County
- IH 20/IH 30 – Parker/Tarrant County
- IH 30 – Rockwall/Hunt County
- IH 35E – Ellis County
- IH 820 West – Tarrant County
- SH 360 – Tarrant County
- US 175 – Dallas County
- US 380 – Collin/Denton County
- US 75 – Collin/Dallas County

Work will be ongoing throughout FY2018 and FY2019 and the following products will be delivered as the result of work done on this project:

- Maps, tables, reports, and presentations which will highlight asset management data analyses; and
- Documentation to guide incorporation of asset management principles, performance measures, factors affecting asset condition/performance and mitigation strategies, and pilot project recommendations in the preparatory, analysis, and decision-making efforts for updates to the MTP, CMP, the Transportation Improvement Program (TIP), and the Unified Transportation Program (UTP).
Other Funding Sources

This element will provide technical, planning, design review, and financial assistance to transportation agencies and the Regional Transportation Council to help advance various regional projects through post-environmental clearance development, permit approval, and implementation as soon as possible. This effort is part of a NCTCOG Transportation Department need to expand its involvement beyond its current planning and programming functions to improve project implementation in the Dallas-Fort Worth region. Throughout FY2018 and FY2019, Surface Transportation Block Grant Program funds, Regional Transportation Council (RTC) Local funds, Texas Department of Transportation (TxDOT) funds, and Transportation Development Credits will support work efforts for the following corridors:

- DFW Connector – FM 2499/IH 635/SH 114/SH 121/SH 360;
- IH 35E – Dallas/Denton County;
- Loop 12/Spur 408;
- SH 183; and
- Other existing corridors planned for truck-lane restrictions, additional critical freight mobility considerations, and/or managed lane improvements.

The following products will be delivered as the result of work done for this element:

- Meeting summaries;
- TIP/STIP and UTP incorporation efforts;
- Comment review; and
- Technical memorandums.

Transportation Asset Management Plan (TAMP) Documentation

Transportation Planning Funds

The Fixing America’s Surface Transportation (FAST) Act has authorized the Federal Highway Administration (FHWA) to require that states develop and implement risk-based transportation asset management plans for the National Highway System (NHS) to preserve or improve asset condition and system performance as part of the National Highway Performance Program (NHPP). State coordination with metropolitan planning organizations (MPOs) is critical to ensure collaborative efforts in defining asset management objectives and measures; preparing risk and performance gap analyses; identifying reasonable life-cycle planning assumptions with thorough incorporation of asset age, usage, composition, and environmental impedance factors; and certifying that financial plans and/or investment strategies are sufficient to meet or exceed various performance targets. To assist the State in the ongoing/regular development, monitoring, and reporting of TAMP parameters to FHWA, this element will provide technical, planning, and financial assistance to collect applicable performance data; determine and report performance targets for the metropolitan area; identify actual system performance; and evaluate potential performance gaps and factors.
Work will be ongoing throughout FY2018 and FY2019 and the following products will be delivered as the result of work done on this project:

- Maps, tables, reports, meeting summaries, and presentations which will highlight TAMP data collection, analyses, and reporting roles/responsibilities for MPOs; and
- Documentation to guide incorporation of TAMP needs and conclusions as they relate and/or link to the preparatory, analysis, and decision-making efforts for updates to the MTP, CMP, TIP, and UTP.

Project Evaluation/Selection Process for the UTP and the Ten-Year Plan (House Bill 20)

Transportation Planning Funds

Because asset management is one of several important determinants regarding project planning and prioritization (particularly as they may be affected by the TAMP), this element will also include technical assistance on a recurring basis in support of TxDOT as it develops the annual statewide UTP and Ten-Year Plan. As stipulated in House Bill 20 (passed by the State Legislature in 2015), TxDOT is required to develop a comprehensive performance-based apparatus in collaboration with MPOs, local governments, and other transportation partners/stakeholders to identify, analyze, select, and prioritize roadway projects in urban areas for inclusion in the UTP and the Ten-Year Plan. Annual work efforts within this task will help ensure that all potential projects will be evaluated using the most updated data in terms of various mobility/congestion, safety, system preservation, development/approval status, economic, and environmental parameters. Work efforts will also aid in certifying that the project selection process and implementation strategies are consistent with initiatives to establish and/or maintain various performance targets.

Work will be ongoing throughout FY2018 and FY2019 and the following products will be delivered as the result of work done on this project:

- Meeting summaries;
- Maps, tables, reports, and presentations which will highlight the project selection/prioritization process and help communicate various details to multiple audience types;
- Documentation to guide incorporation of any new data sources, expanded criteria, weight factors, visualization tools, and decision-making principles that will help to refine and/or expand the selection/prioritization process over time;
- Documentation describing ongoing TIP/STIP, CMP, and MTP incorporation efforts; and
- Technical memoranda.

5.05 Congestion Management Planning and Operations

The Regional Transportation Council (RTC) has selected the following congestion management planning efforts and operational strategies through a series of funding initiatives. The strategies listed below are congestion management directives and special projects that NCTCOG is responsible for implementing and/or administering. Efforts in this subtask will be conducted in
conjunction with local governments for better coordination of transportation operations and investments.

**Congestion Management Process**

*Transportation Planning Funds*

As required by the provisions of the management system regulation 23 CFR Parts 450 and 500, the Congestion Management Process (CMP) shall be part of the metropolitan transportation planning process required under provisions of 23 USC 134 and 49 USC 5303. CMP provides for the effective management of new and existing transportation facilities through development and implementation of travel demand and transportation system management strategies, and by providing information to decision makers on system performance and effectiveness of implemented strategies.

The maintenance of the CMP document for the Dallas-Fort Worth Metropolitan Area is a major component of this Work Program subtask. The CMP seeks a “management” solution to a growing traffic problem by targeting resources toward improved performance for infrastructure assets, operational enhancements, and travel demand reduction strategies. Although major capital investments are needed to meet the growing travel demand, the CMP also develops lower-cost strategies that complement major capital recommendations. The result is a more efficient and effective transportation system, increased mobility, and a leveraging of resources.

The CMP is fully integrated into the region’s transportation planning and programming process. With the identification and mitigation of current and future traffic congestion as the foundation of planning and programming decision making, strategies for congestion mitigation are developed, monitored, and updated on the system level (via the Metropolitan Transportation Plan), on the corridor level (via Project Implementation Process documentation incorporated within corridor studies and NEPA documents), and on the project level (via the Transportation Improvement Program). Anticipated FY2018 and FY2019 products include:

- Documentation of the CMP;
- Executive Summary of the CMP;
- Presentations utilizing CMP data and information;
- Maps;
- Project tracking and monitoring system (Project Implementation Process documentation);
- Periodic reports to RTC and Surface Transportation Technical Committee documenting status of CMP implementation;
- Coordination meetings to ensure the continued monitoring and progress of various project recommendations;
- Single-occupancy vehicle (SOV) analysis on non-regionally significant roadway projects; and
• Integration of project-specific CMP and asset management information for utilization and analysis within the Metropolitan Transportation Plan initiated through Subtask 4.01, and within corridor studies initiated through Subtask 5.01.

Transportation System Management and Operations

Transportation Planning Funds

This program is ongoing throughout both FY2018 and FY2019, supporting development of regional Transportation Systems Management and Operations (TSM&O) strategies. It includes strategies such as intersection and signalization improvements, grade separation, freeway bottleneck removal, and Intelligent Transportation Systems (ITS) which will be developed to reduce travel time and enhance system reliability. Anticipated products through the use of TPF dollars include:

• Monitoring, updating, and evaluation of regional TSM&O plans, policies and projects outlined in the Metropolitan Transportation Plan (MTP) and Congestion Management Process (CMP);
• Evaluation of TSM&O projects for inclusion in the Transportation Improvement Program (TIP) consistent with the Regional ITS Architecture;
• Participation in, and monitoring and coordination of Integrated Corridor Management activities to enable a multi-modal, cross-system performance comparison to generate common benchmarks and appropriate agency response options to incidents;
• Support and assistance to regional partners to plan strategies, and promote cooperation and participation in committee meetings;
• Development and monitoring of the implementation of ITS plans, policies, and projects in coordination with regional partner agencies; and
• Evaluation and implementation of vehicle and infrastructure technology.

Other Funding Sources

This program also uses Surface Transportation Block Grant (STBG) Program funds, Congestion Mitigation and Air Quality Improvement Program (CMAQ) funds, Regional Toll Revenue (RTR) funds, Regional Transportation Council (RTC) Local funds, Texas Department of Transportation funds, and Transportation Development Credits to support activities in this area. Consultant assistance will be utilized. Anticipated products through the use of these dollars include:

• Agreements for regional communication, infrastructure, and information sharing, including The Memorandum of Understanding (MOU) between the Dallas-Fort Worth Regional Intelligent Transportation System (ITS) partner agencies;
• Identification and documentation of standards for interagency communication of data and video, and the implementation of Center-to-Center-related software and requirements to facilitate information sharing between agencies;
• Update of the Regional ITS Architecture and development of associated plans and documents;
• Identification of needed ITS integration;
• Collection and verification of data, ensuring that devices and systems are operated and maintained at a level to detect and report accurate information (i.e., speeds, counts, and other data items);
• Evaluation, improvement, and implementation of the 511DFW System with outreach and communications planning, and advertising and marketing services to enhance public awareness and use of 511DFW;
• Review of statements of consistency with the Regional ITS Architecture;
• Staging of wreckers and other ancillary services for incident clearance and operational improvements; and
• Strategies to integrate operations and rapidly clear collisions and stalled vehicles to improve roadway efficiency.
• Accumulation of video footage of signage along the region’s limited access roadway facilities, and the evaluation of this footage to identify deficiencies and improve wayfinding.

Development of Regional and Corridor-Level TDM Strategies

Transportation Planning Funds

This element is ongoing throughout FY2018 and FY2019, providing for the planning and development of regional travel demand management (TDM) strategies including, but not limited to, employee trip reduction, carpools/vanpools, park-and-ride, and transportation management associations. This element also supports the development of regional TDM strategies in the Metropolitan Transportation Plan. Regional travel demand management strategies identified in the CMP will be applied on a regional level, and additional travel demand reduction strategies will then be evaluated for their application on the corridor and subarea levels. Additional TDM strategies will also be evaluated for their application. At the project implementation level, TDM projects are monitored so they can be added to the regional Transportation Improvement Program at the appropriate time with respect to the single-occupancy vehicle facility implementation. Anticipated products include:

• Monitoring of regional TDM goals and strategies outlined in the Metropolitan Transportation Plan and the Congestion Management Process document;
• Maintenance of and updates to the Regional Park-and-Ride Inventory database and map;
• Quarterly Regional Transit Coordination meetings with Dallas Area Rapid Transit, the Fort Worth Transportation Authority, and the Denton County Transportation Authority; and
• Monitoring and assessment of Metropolitan Transportation Plan Policy Bundle surveys for TDM-related survey components.
Special Events

Other Funding Sources

This program is ongoing throughout FY2018 and FY2019, providing planning and implementation activities for various transportation service needs for special events. NCTCOG continues coordination and technical support for local governments, transportation providers, and other key stakeholders in North Central Texas regarding the regional coordination of special event management plans and critical infrastructure needs to support these events. Surface Transportation Block Grant Program funds and Transportation Development Credits will support this initiative. NCTCOG staff will provide oversight of this program. Anticipated products include:

- An inventory of major special events in the region;
- Coordinated regional partner involvement;
- Implementation of coordinated congestion management strategies associated with special events;
- Funding sources or shared resources identified, and funding agreements executed with regional partners to implement projects; and
- Committee meetings.

Managed Lane Technology Assessment

Other Funding Sources

This element is ongoing throughout FY2018 and FY2019. To facilitate efficient operation and toll collection on the managed lanes, the region desires that a technology-based system be implemented to verify auto occupancy. The region plans to utilize advanced technology for vehicle occupancy detection and verification, as well as other equipment to improve the safety and operations of managed lanes. As part of this task, staff will provide public outreach and education regarding High Occupancy Vehicle (HOV)/managed lane pricing. Staff will also work with regional partners to develop approaches to address the implementation of occupancy-based tolling and dynamic pricing, and document lessons learned. This element also supports NCTCOG’s membership in, and support for research under, FHWA’s High Occupancy Vehicle/Managed Use Lane Pooled Fund Study. Congestion Mitigation and Air Quality Improvement Program (CMAQ) funds, Surface Transportation Block Grant Program funds, Texas Department of Transportation funds, and RTC Local funds will be used to support these activities. Anticipated products include:

- Coordination and meetings with partner agencies, as needed;
- Public outreach and education on HOV/managed lanes;
- Implementation and testing of pilot for technology to detect auto occupancy;
- Implementation and integration of technology to detect/verify auto occupancy on HOV/managed lane system; and
- Support for and participation in FHWA High Occupancy Vehicle/Managed Use Lane Pooled Fund Study.
Traffic Incident Management Training

Other Funding Sources

This program is ongoing throughout FY2018 and FY2019, providing training for agencies responsible for managing and clearing traffic incidents. This training has been demonstrated to improve responder and motorist safety, and to reduce significantly the length and size of roadway closures. The Dallas-Fort Worth area was the first area in the nation to formalize the training process to reach out to all responders and generate improvements in the management of traffic incidents. The goal of NCTCOG Traffic Incident Management (TIM) training is to initiate a common, coordinated response to traffic incidents that will build partnerships, enhance safety for emergency personnel, reduce upstream traffic accidents, improve the efficiency of the transportation system, and improve air quality in the Dallas-Fort Worth region. By implementing best practices techniques throughout the region, clearance times can be reduced by as much as 40 percent. Such an improvement will reduce the impact of congestion, improve regional air quality, and improve the safety and efficiency of travel for all residents and visitors in the area. CMAQ funds, RTC Local funds, local funds, and Transportation Development Credits support this program. Consultant services may be utilized. Anticipated products include:

- TIM First Responder and Manager’s Courses and TIM Executive Level Courses;
- Quick Clearance Crash Reconstruction Training workshops;
- Commercial Vehicle Enforcement Equipment Procurement Process and Training Program;
- Incident Management Equipment Purchase Call for Projects; and
- Support of general training and educational projects that promote the implementation of strategies that mitigate traffic incidents.

Mobility Assistance Patrol Program Administration

Other Funding Sources

This program is ongoing throughout FY2018 and FY2019, providing assistance to stalled or stranded motorists by helping them to move disabled vehicles from the main lanes of regional highway/freeway facilities and ultimately getting the vehicles operating or off the roadway completely. Provided to all motorists free of charge, this assistance includes minor mechanical and crash assistance, debris removal, and protection to first responders. Mobility assistance patrols are operated by the Dallas County and Tarrant County Sheriffs’ Offices. Activities are focused on congested roadway systems in Dallas and Tarrant Counties, but extend into portions of Collin and Denton Counties. Mobility Assistance Patrol Program (MAPP) coverage is also provided by the North Texas Tollway Authority on regional toll facilities and by private-sector partners on the LBJ
and North Tarrant Express Corridors. Surface Transportation Block Grant Program funds and Transportation Development Credits support this program. Consultant services may be utilized. NCTCOG staff will provide program oversight. Anticipated products include:

- Evaluation of potential MAPP sponsorship opportunities and innovative tracking technologies;
- Assessment of the current program to ensure that the program is operating efficiently; and
- Documentation and analysis of program performance measures.

**Regional Trip Reduction and Vanpool Programs**

**Other Funding Sources**

These programs are ongoing throughout FY2018 and FY2019. Both programs are designed to reduce employee commute vehicle trips. The Regional Trip Reduction Program (RTRP) is an educational commute options program aimed at educating large private and public employers in the region about available Travel Demand Management programs and strategies that reduce single-occupancy vehicle trips for work purposes. The strategies promoted under the RTRP include rideshare (carpool and vanpool) programs, telecommuting and flexible work-hour programs, transit pass program, walking, bicycling and similar strategies. The Try Parking It website, [www.tryparkingit.com](http://www.tryparkingit.com), the region’s ride-matching and commute tracking application is a major component of the RTRP. The DFW Connect-A-Ride website, [www.DFWConnectARide.com](http://www.DFWConnectARide.com), is the region’s first casual carpooling website and was developed as part of the Value Pricing Pilot Program along Interstate Highway 30.

The Regional Vanpool Program is one of the major rideshare programs for trip reduction, providing a “shared ride” alternative to single-occupancy vehicle travel for commuters traveling long distances or in areas with limited or no fixed-route service. The current Regional Vanpool Program is operated by Dallas Area Rapid Transit, the Fort Worth Transportation Authority, and the Denton County Transportation Authority.

Surface Transportation Block Grant Program funds, Regional Transportation Council Local funds, Transportation Development Credits, and local funds will be utilized for these programs. NCTCOG staff will provide management, oversight, and implementation of the programs. Consultant assistance will be utilized. Anticipated products include:
• Direct employer outreach to educate employers on available TDM strategies and assist them in establishing and/or strengthening alternate commute programs in the workplace;
• Maintenance of the RTRP performance database which includes monitoring and publication of ridership, VMT reduced, and emission reductions performance measures;
• Oversight of the Try Parking It website;
• Maintenance of the DFW Connect-A-Ride website;
• Promotion of NCTCOG’s Try Parking It website and DFW Connect-A-Ride website to increase the number of users in the programs;
• Coordination and oversight of regional vanpool program, including budget and invoice activities; and operational processes; and
• Management of the Vanpool Managed Lane Toll Reimbursement process.

Regional Traffic Signal Retiming and Minor Intersection Improvement Program

Other Funding Sources

This program is ongoing throughout FY2018 and FY2019 and targets the improvement of the arterial transportation system, including frontage roads, in the Dallas-Fort Worth region. Efforts will be conducted in conjunction with local governments to identify corridors or intersections to be included. The corridors or intersections will be selected based on several factors including, but not limited to, previously recommended low-cost program improvements, high volumes, regional distribution, previously funded and unfunded projects, and safety. Improvements include, but are not limited to, traffic signal cabinets, traffic signal controllers, battery backup, intersection cameras, vehicle detection equipment, communications equipment, and Global Positioning System clocks.

Congestion Mitigation and Air Quality Improvement Program funds, Regional Transportation Council Local funds, Texas Department of Transportation funds, other local funds, and Transportation Development Credits will support this program. Consultant services may be utilized. NCTCOG staff will provide oversight of this project. Anticipated products include:

• A baseline analysis;
• Recommendation and implementation of low-cost capital improvements;
• Implementation of signal retiming plans;
• Identification of and implementation support for major and minor improvements;
• An analysis of improved conditions;
• Traffic Signal equipment procurement;
• Monthly progress meetings with consultants and TxDOT, as well as meetings with cities and consultants as appropriate; and
• Review of corridor reports, project summary reports, consultant invoices and progress reports.
Congestion Management and Traffic Flow Improvements Projects

Other Funding Sources

This project is ongoing throughout FY2018 and FY2019, and is to administer, implement, and support one or more Call(s) for Projects to award funding for congestion and traffic flow improvements to local government agencies, Independent School Districts, and/or private-sector companies. Such efforts will generate nitrogen oxide and volatile organic compound emissions reductions to aid in future transportation conformity determinations. Congestion Mitigation and Air Quality Improvement Program (CMAQ) funds and Transportation Development Credits support this project. Anticipated products include:

- Call(s) for Projects process for review and approval;
- Subrecipient agreements for pre-approval;
- Executed subrecipient agreements; and
- Review of monthly progress reports.

Marketing Efforts for the DFW Connector Pilot Program

Other Funding Sources

The DFW Connector Pilot Program will be ongoing throughout FY2018 and will test strategies to increase TollTag usage in the DFW Connector corridor. Strategies will be tested independently to determine the relative success in increasing TollTag usage that can be applied to other corridors in the region. The strategies will be closely coordinated with the North Texas Tollway Authority, which will be responsible for implementing many of the strategies. Some strategies will be implemented only in targeted areas, which will be zip codes with a high number of ZipCash customers in low- to moderate-income areas. Strategies include TollPerks for new TollTag customers, prize giveaways, preloaded TollTags to targeted areas, TollTag sales at inspection stations in targeted areas, and TollTag sales at car dealerships in targeted areas. This project will utilize Regional Toll Revenue funds and possible contributions from the Texas Department of Transportation. Consultant assistance and paid media may be utilized when needed. Anticipated products include:

- Increased TollTag usage; and
- Report summarizing strategy results.

Video and Analytics Evaluating Lost Capacity Due to Technology-Related Behaviors

Other Funding Sources

University Partnership Program (UPP) assistance will be initiated to analyze delay on the transportation system associated with distracted drivers. This study will investigate the assumed driver delay versus actual driver time delayed due to distractions. A survey may be conducted to observe reaction time and analyze if idling, queuing and other reductions of capacity has increased since the onset of technology. The study will determine if different assumptions
used for modeling and operations need to be adjusted in order to more accurately reflect actual delay associated with new technology distractions. Surface Transportation Block Grant Program funds and Transportation Development Credits will be used to support this project. Anticipated products include:

- Meeting summaries;
- Comment review; and
- Technical memorandums.

5.06 Regional Freight Planning

Transportation Planning Funds

During FY2019, freight planning activities will be conducted based on truck, rail and air cargo movements throughout the region in support of city, county, state and federal agencies. Also, coordination between private-sector stakeholders and public-sector staff will be initiated through various initiatives and meetings. Anticipated products include:

- Quarterly Regional Freight Advisory Committee (RFAC) meetings;
- Regional Transportation Council Intermodal/Multimodal/High Speed Rail/Freight Subcommittee meetings, as needed; and
- Support to the USDOT Federal Highway Administration and Texas Department of Transportation for various projects as needed.

University Partnership Program (UPP) assistance was initiated in FY2017 to study the feasibility of underground short-haul freight pipelines. A case study for a Dallas Fort Worth Airport application was undertaken. Such a system could have the potential to reduce the number of trucks on urban roadways, thus enhancing both the roadway capacity and safety, as well as reducing adverse environmental impacts such as emissions and noise. This assistance should be completed in early FY2018. Anticipated products include:

- UPP final report on Feasibility of Underground Short-haul Freight Pipeline – Application to the DFW Airport.

Other Funding Sources

This subtask is ongoing throughout FY2018 and FY2019, assessing the impact of truck traffic, rail freight, and other freight movement issues within and through the DFW Region. This task includes the collection and analysis of data pertaining to freight mobility and safety. These tasks will include continued coordination with private-sector partners in the trucking, rail, and freight-forwarding businesses. Also, University Partnership Program (UPP) assistance will be utilized for supporting planning studies and analysis. Surface Transportation Block Grant Program (STBG) funds, Texas Department of Transportation, Regional Transportation Council
Local funds and Transportation Development Credits will be utilized to support this project. Consultant assistance will be used. Anticipated products include:

- Monitoring of truck-lane restriction corridor conditions;
- Various reports and studies regarding freight conditions in the DFW region, including a Regional Hazardous Materials Route Study, Economic Impact Analyses and a Freight and Passenger Rail Integration Study;
- Recommended follow-up studies identified in Freight North Texas: The North Central Texas Regional Freight System Inventory, including a Land-Use Compatibility Analysis and a Data Collection Program which could include traffic counts, classification counts and surveys for the Regional Freight Model;
- Freight Mobility Plan;
- Public outreach and educational programs; and
- UPP report on Automated Vehicles and Freight Transportation Analysis.

5.07 Transportation System Security and Emergency Preparedness

Transportation Planning Funds

This program is ongoing throughout FY2018 and FY2019, supporting ongoing local, State, and federal initiatives to address transportation system security and emergency preparedness planning. NCTCOG continues a dialogue among local governments and transportation providers in North Central Texas regarding the regional coordination of response plans, response capabilities, and emergency medical services in the event of a major incident. Staff also provides technical transportation data needed to support these planning efforts, as well as to facilitate the coordination of various transportation providers and planning agencies.

NCTCOG’s Transportation Department will continue to support the Emergency Preparedness Department in developing/enhancing regional emergency preparedness capacity as it relates to utilization of Intelligent Transportation Systems (ITS) or transportation management tools and infrastructure protection by developing a framework for response and contingency planning due to the unexpected loss or intentional removal of roadway capacity. Scenario modeling may identify the impact to parallel or complementary routes for strategic corridors in the region to help determine potential temporary or interim traffic management solutions. Anticipated products include:

- Support and assistance to agency and regional partners including monitoring of activities, promotion of regional coordination, and committee meetings;
- Interaction and cooperation between emergency responders and transportation staff;
- Technical transportation data, performance analyses, and planning services related to transportation security;
- Infrastructure protection (identifying transportation critical items or elements including recommending vulnerability analyses on regional facilities and services); and
• Transportation resource support for mass evacuation events.

5.08 Roadway and Railroad Safety

This subtask is ongoing throughout FY2018 and FY2019, supporting planning efforts to develop safety policies, programs, and projects.

Transportation Safety Planning

Transportation Planning Funds

Staff coordinates with the Regional Safety Advisory Committee, the Texas Department of Transportation (TxDOT), Texas Department of Public Safety, Federal Highway Administration, local governments, and other partners to develop strategies for regional safety planning efforts, data collection, and analysis. These partners also assist in developing policies, programs and projects to improve safety related to the transportation system. Anticipated products include:

• Collection, maintenance, and analysis of regional safety data including: crash data from TxDOT’s Crash Records Information System, fatality data from the National Highway Traffic Safety Administration Fatality Analysis Reporting System, and hazardous material spill data from the National Response Center;
• Regional Safety Information System implementation activities;
• Monitoring and promotion of the implementation of regional intersection improvements outlined in NCTCOG’s Intersection Safety Implementation Plan (ISIP) and the Texas ISIP;
• Annual Safety Program performance measures;
• Safety-related education and training courses for member agencies; and
• Analysis of crash data and recommendations of safety improvements at high-crash locations.

Other Funding Sources

Surface Transportation Block Grant Program funds, local funds, and Transportation Development Credits will also be utilized to support this program. Anticipated products include:

• Procurement of a Regional Safety Information System application tool;
• Driver safety public education, outreach, and information programs including a contributing factor marketing campaign;
• Regional roadway safety strategic plan development activities; and,
• Systemic safety improvement funding program activities.
Railroad Crossing Coordination

Other Funding Sources

This element is ongoing throughout FY2018 and FY2019 and includes the identification, planning, and implementation of rail crossing projects throughout the DFW region. Surface Transportation Block Grant Program funds, RTC Local funds, Texas Department of Transportation funds, and Transportation Development Credits will be utilized to support this project. Anticipated products include:

- Maintenance of the regional banking program;
- Analysis of rail safety data to identify target areas for educational efforts;
- Public outreach and education efforts in the region; and
- Enhanced regional partnerships.

5.09 Regional Aviation Planning and Education

This work program subtask includes planning for the regional aviation system and the surface transportation system that links aviation facilities to the region. In addition, efforts to enhance and expand education and outreach regarding careers in aviation are included.

Surface Access to Aviation

Transportation Planning Funds

This element is ongoing throughout FY2018 and FY2019. Work includes data collection and planning efforts to access infrastructure to aviation facilities and associated improvement needs. This item includes a review of travel-time contours, air cargo trends and connectivity, and land-use implications surrounding commercial and general aviation facilities. This project also includes input to the Regional Transportation Council and the Air Transportation Advisory Committee, as well as the Metropolitan Transportation Plan (MTP). Anticipated products include:

- Documentation of surface access to aviation impacts;
- Inventory and data collection of infrastructure improvements;
- Analysis and recommendations for infrastructure improvements affecting aviation;
- Travel-time contours for commercial and general aviation facilities;
- Inventory of surface transportation access to aviation facilities; and
- Monitoring and assessment of Metropolitan Transportation Plan Policy Bundles survey for aviation-related survey components.
Regional Aviation System Planning

Other Funding Sources

This element is ongoing throughout FY2018 and FY2019 and includes continuous system planning efforts and implementation of the Regional General Aviation and Heliport System Plan. Ongoing technical assistance to local governments and stakeholders for development recommendations and preservation of the North Central Texas regional aviation system is provided. Coordination with State and federal governments and aviation stakeholders will be completed to provide input to the National Plan of Integrated Airport Systems, the Texas Airport System Plan, and North Central Texas Council of Governments’ documents (such as the Metropolitan Transportation Plan). Airport system evaluation may include demand forecasting and capacity assessments. This project is funded through RTC Local funds. Anticipated products include:

- Air Transportation Advisory Committee meetings;
- Stakeholder meetings and associated outreach materials;
- Continued implementation of the Regional General Aviation and Heliport System Plan;
- Aviation system performance measures;
- Collection of geospatial data related to airport infrastructure;
- Geographical Information System (GIS) Web Interface;
- Monitoring of compatible development surrounding airports including obstructions;
- Aviation environmental planning tools such as noise modeling and wildlife tracking; and
- Monitoring, coordination and evaluation of the impacts of unmanned aircraft systems (UAS) on the regional aviation system.

Aviation Education Integration and Outreach

Other Funding Sources

This element is ongoing throughout FY2018 and FY2019 and describes implementation and outreach efforts associated with recommendations from the North Texas Aviation Education Initiative study completed in 2010. Facilitation for development of regional aviation programs, as well as a variety of outreach strategies to local students, will be conducted. These efforts are funded through a combination of grants, RTC Local funds, and industry partnerships. Anticipated products include:

- Participation in aviation advisory committees and presentations to school boards;
- Continued development of a Speakers Bureau;
- Creation of an aviation careers-based mentorship program;
- Enhancements to NCTAviationcareers.com;
- Program curriculum development and facilitation;
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- Regional workshops with educators, industry stakeholders, and policy officials; and
- Continued promotion of the aviation education gaming app, FLYBY.

5.10 Regional Military and Community Coordination

This Work Program subtask includes the planning and implementation of programs to support regional military and community coordination.

Naval Air Station Fort Worth, Joint Reserve Base Land Use and Community Outreach Implementation

Other Funding Sources

Participating local governments include, but are not limited to, Tarrant County and the cities of Benbrook, Fort Worth, Lake Worth, River Oaks, Sansom Park, Westworth Village, and White Settlement. The interjurisdictional partnership is based on the identification of actions that can be taken jointly by the community and the installation to promote compatible development, and address current and future encroachment as identified through the Joint Land Use Study. This element is ongoing throughout FY2018 and FY2019. Regional Transportation Council Local and other local funds will be utilized to support activities in this area. Anticipated products include:

- Community outreach meetings;
- Tracking of bills proposed in the state legislature;
- Regional Coordination Committee (RCC) Development Review Web tool project inventory and comments;
- At least four RCC meetings and RCC Officer meetings; and
- Documentation and presentation material for forums, workshops, and meetings.

Regional Joint Land-use Study

Other Funding Sources

The Department of Defense Office of Economic Adjustment (DOD OEA) funds planning studies to identify recommendations to maintain military operations and support compatible development surrounding military installations. NCTCOG received funding from the DOD OEA in FY2015 to conduct a Regional Joint Land-use Study (JLUS). The Regional JLUS will update the JLUS previously conducted for NAS Fort Worth, JRB, and analyze encroachment issues common to additional military facilities throughout the region. RTC Local funds will also be used for this project. Anticipated products include:
• Tool to track recommendations for each installation and progress made towards implementation;
• Outreach documents and presentations to stakeholder groups; and
• Grant management requirements.

5.11 Automated Vehicle Technology

Activities in Subtask 5.11 will plan for the arrival of automated vehicles, focusing on the implications that automated vehicles may have with regard to travel demand, land use, and congestion. Planning tools, including travel forecasting models, are going to need to be able to account for these vehicles in the system. Automated vehicles are no longer only being discussed in the context of automobile passenger travel, but also in freight, transit, and people mover/shuttle systems.

Automated Vehicles: Planning

Transportation Planning Funds

This program is ongoing throughout FY2018 and FY2019 providing planning for the arrival of automated vehicles and determining the impact of such vehicles on the transportation system. Strategies include analyzing the impact of automated vehicles and monitoring legal development relating to automated vehicles. Anticipated products include:

• Support for existing NCTCOG programs, including transportation planning and modeling;
• Monitoring of automated vehicle laws and policies;
• Establishment of information clearinghouse for region on automated vehicle issues;
• Planning and coordination of pilot programs advancing the deployment of automated vehicles; and
• Liaison on automated vehicle issues with public and private parties.

Automated Vehicles: Development and Deployment

Other Funding Sources

This program is ongoing throughout FY2018 and FY2019 providing for the development and deployment of automated vehicles and related technologies. Strategies include building an open data infrastructure to support safe deployment of automated vehicles, encouraging shared mobility transportation models to deliver more mobility to more people in the region more cost-effectively, building information tools for policy makers and the public, and examining direct employment-related impacts of automated vehicles. Consultant assistance may be utilized to support work activities. University Partnership Program (UPP) assistance will continue to be utilized to support work activities in the information tools and employment impact study. This program uses Surface Transportation Block Grant Program funds, Congestion Mitigation and Air Quality Improvement Program funds, Texas Department of Transportation funds, Regional
Transportation Council Local funds and Transportation Development Credits to support activities in this area. Anticipated products include:

- An open data infrastructure for use by automated vehicles;
- Support for shared mobility service delivery models, especially those that increase average vehicle occupancy;
- Development and deployment of automated vehicle technologies in the region;
- Advancing emerging cellular-V2X, DSRC and other communications technologies;
- Liaison to the Smart City/Smart State program;
- Information tools about automated vehicles; and
- Reports on direct employment-related impacts of automated vehicles.
## E. Funding Summary

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\(^1\) Transportation Planning Funds (TPF) includes both FHWA PL-112 and FTA 5303 funds. TxDOT will apply transportation development credits sufficient to provide the match for FHWA PL-112 and FTA Section 5303 programs. As the credits reflect neither cash nor man-hours, they are not reflected in the funding tables.
VII. Strategic Regional Initiatives

Staff has identified strategic regional initiatives directed toward innovative methods of funding and implementing transportation improvements in the North Central Texas region to offset the decline in federal and State gas tax revenues and help expedite project implementation. One of these non-traditional methods focuses on techniques to capture the increase in the value of real property brought about by the public-sector funding of highway and transit improvements. Staff will pursue funding for these efforts through various sources such as partnerships with transportation providers, as well as State and federal grant opportunities that may arise, which will be categorized as Revenue Center 6 funding when received. A second example is the sale or trade of Transportation Development Credits. Under State law, the Regional Transportation Council can sell Transportation Development Credits to other Metropolitan Planning Organizations in the state and the Texas Department of Transportation. Below is a summary of the strategic initiatives that will be pursued once available funding is identified.

Transportation Innovative Finance Initiative Opportunities – Building on the work conducted for the Cotton Belt Innovative Finance Initiative, this effort will continue to investigate revenue opportunities for various transportation corridors. This includes High Speed Rail between Dallas and Fort Worth. The Regional Transportation Council is ready to explore regional rail implementation in other corridors in North Central Texas.

The project will identify viable revenue sources appropriate for both capital and operation and maintenance costs for various proposed transportation infrastructure projects. Proposed transportation infrastructure projects include roadway, public transportation, and multimodal projects. The effort will: (1) analyze various revenue strategies; (2) coordinate with local governments and transportation partners through regularly scheduled meetings; (3) assess the existing conditions and potential opportunities for innovative funding opportunities; (4) evaluate capital and operation and maintenance costs for various projects; and (5) prepare a formal report identifying a recommended funding plan for various projects. The public-at-large will be involved in this process as well since Transportation Development Credits need to be presented to the public at major milestones. Consultant assistance is anticipated.
VIII. Overview of Work Program Funding

The work described in this document will be accomplished during the period October 1, 2017 to September 30, 2019. This work will be a cooperative effort between government agencies at four levels—local, regional, state, and federal—and will be funded in some manner by each of the participants. These activities will also involve private-sector groups including citizens, companies, interest groups, and various associations of these three. This Work Program is prepared with requests, guidance, and cooperation from the principal local agencies in the region.

The transportation planning process is a collection of resources that can be called upon by local governments to assist and supplement their capabilities whenever necessary to meet needs for solving increasingly more complex transportation problems. The FY2018 and FY2019 Unified Planning Work Program (UPWP) reflects the Metropolitan Planning Organization’s (MPO) goals to meet MPO planning requirements and guidelines reaffirmed by the Fixing America’s Surface Transportation (FAST) Act; to aid in the implementation of projects contained in the Metropolitan Transportation Plan through an efficient, cost-effective, and equitable system of project programming and prioritization in the Transportation Improvement Program; to develop and implement a regional congestion management process; to continue to support regional efforts to improve air quality; to coordinate regional aviation planning activities; and to assist local governments and transportation providers with various transportation planning activities. Efforts will continue on the monitoring and researching of new travel forecasting and transportation planning techniques to provide the most efficient and effective solutions available for meeting the region's transportation needs.

Disadvantaged Business Enterprises

Participation by Disadvantaged Business Enterprises (DBE) to plan and provide technical and transportation services is encouraged by the North Central Texas Council of Governments (NCTCOG). In this regard, NCTCOG has established a Transportation Department-wide overall
Disadvantaged Business Enterprise (DBE) goal of 25 percent of the final negotiated contract amount for participation on the part of socially and economically disadvantaged individuals in USDOT-assisted projects. NCTCOG will apply the principles of the DBE program for non-USDOT assisted contracting and service provision opportunities to the fullest extent possible. Specific DBE goals are established for each procurement, dependent upon the type of services being procured. Consultant firms are encouraged to provide their contact information, areas of expertise, and DBE certification information to the North Central Texas Council of Governments (NCTCOG) for Request for Proposal (RFP) notifications. In addition, a DBE list is maintained, based on information provided by firms, and provided as part of each RFP. Assurance is also given that, in accordance with Title VI of the Civil Rights Act of 1964, NCTCOG will not discriminate against any person on the grounds of race, color, age, sex, disability, or national origin.

**Proposed Budget**
This section summarizes the budget for the FY2018 and FY2019 Unified Planning Work Program. Financial support for Fiscal Years 2018 and 2019 will be provided from a number of sources including the Federal Highway Administration (FHWA), the Federal Transit Administration (FTA), the Texas Department of Transportation (TxDOT), the Texas Commission on Environmental Quality (TCEQ), Environmental Protection Agency (EPA), Department of Energy (DOE), and the North Texas Tollway Authority (NTTA). In addition, various local sources will be acquired to assist in the funding of this program.

The US Department of Transportation provides funds through programs of the Federal Highway Administration and the Federal Transit Administration. Both FHWA PL 112 and FTA 5303 funds are provided annually to Metropolitan Planning Organizations to support metropolitan regional transportation planning activities based on an 80 percent federal/20 percent local match requirement. TxDOT will provide the 20 percent match for the FHWA 112 and FTA 5303 funds for FY2018 and FY2019 to the MPO to carry out the UPWP in the form of transportation development.
credits. These transportation development credits are provided by metropolitan areas building toll roads and are used on a statewide basis to provide the match funds needed for all metropolitan planning organizations. The FY2018 and FY2019 FHWA and FTA funding levels reflected in this program are summarized in Exhibit VIII-1. The formula-based FHWA PL 112 allocation to the Unified Planning Work Program for the Dallas-Fort Worth Metropolitan Area is $7,589,902 in FY2018 and $7,455,075 in FY2019 for a two-year total of $15,044,977. The Federal Transit Administration 5303 funding is $2,774,086 in FY2018 and $2,825,868 in FY2019 for a two-year total of $5,599,954. An estimated balance of $6,372,719 in unexpended/unobligated FHWA PL 112 funding will be available from the FY2017 authorization. Each of these funding amounts is incorporated by source agency into the Work Program by task and subtask. Total FHWA PL 112 and FTA 5303 funding for the FY2018 and FY2019 UPWP is estimated at $27,017,650. Transportation Planning Funds in the amount of $23,362,000 have been programmed and allocated to each of the UPWP subtasks as shown in Exhibit VIII-2. These programmed funds include the FTA 5303 allocation of $5,599,954, the estimated FY2017 FHWA PL 112 fund balance of $6,372,719, and $11,389,327 of Fiscal Years 2018 and 2019 FHWA PL 112 funding. The remaining balance of Fiscal Years 2018 and 2019 FHWA PL 112 funds of $3,655,650 is anticipated to be carried over to Fiscal Year 2020.
EXHIBIT VIII-1

FY2018 AND FY2019 TPF PROGRAMMING SUMMARY

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<th>FY2019 Allocation</th>
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**Two-Year Totals**

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Summary of TPF 2018 Funding Levels

- **47%** Allocation from FHWA (PL-112)
- **38%** Allocation from Carryover
- **15%** Allocation from FTA (5303)
- **21%** Programmed from FHWA (PL-112)
- **57%** Programmed from Carryover
- **22%** Programmed from FTA (5303)

VII. Overview of Work Program Funding
VII. Overview of Work Program Funding

Summary of TPF 2019 Funding Levels

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## EXHIBIT VIII-2

**FY2018 AND FY2019 ALLOCATION OF TRANSPORTATION PLANNING FUNDS**

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VII. Overview of Work Program Funding

Transportation Planning Funds (TPF) Summary by Task

- Task 1: 25%
- Task 2: 21%
- Task 3: 26%
- Task 4: 15%
- Task 5: 13%
UPWP funding is composed of six main revenue centers. Revenue Center 1 consists of planning activities being conducted with formula planning funds and utilizes FHWA PL 112 and FTA 5303 funding for project support. Revenue Center 2 consists of planning activities being conducted with non-formula funds provided by various agencies such as the North Texas Tollway Authority, US Department of Energy, and the Texas Commission on Environmental Quality. Congestion Mitigation and Air Quality Improvement Program (CMAQ) and Surface Transportation Block Grant Program (STBG) (formerly known as the Surface Transportation Program – Metropolitan Mobility [STP-MM]) funding are also utilized under this revenue center. Revenue Center 3 consists of Management and Operations, or implementation projects, which are supported through non-formula implementation funds. These projects are funded primarily through CMAQ and STBG funds, as well as various local government funding. Revenue Center 4 consists of local air quality and sustainable development implementation and planning projects funded with Regional Transportation Council (RTC) Local funds. Revenue Center 5 consists of projects to be implemented with Regional Toll Revenue funding (e.g., proceeds from SH 121 up-front payment). Revenue Center 6 consists of non-formula implementation activities outlined in Chapter VII, Strategic Regional Initiatives, for which funding will be pursued from various sources such as partnerships with transportation providers, as well as State and federal grant opportunities.

The Texas Department of Transportation has approved an MPO Revolver Fund through a partnership with the North Central Texas Council of Governments, the Regional Transportation Council (RTC), Dallas County, and the City of Dallas. Federal programs administered by NCTCOG require that costs be incurred and paid prior to seeking reimbursements from TxDOT and/or the appropriate federal agency. The MPO Revolver fund will enable NCTCOG to cash flow the federal programs administered by NCTCOG.
The Unified Planning Work Program will be modified over the course of the fiscal year(s) as additional funds become available. Funding from each source is summarized by task in Exhibit VIII-3. FHWA and FTA funding is summarized under Transportation Planning Funds (TPF).

**Activity Schedule**

Work in the FY2018 and FY2019 Unified Planning Work Program will be ongoing and continuous throughout the two-year timeframe. Work Program tasks conducted for or in cooperation with local agencies are dependent upon their participation in the process and are scheduled accordingly. Some projects, such as preparing the Transportation Improvement Program, can be described as year-round activities when accounting for individual project revisions and their technical and local impact reviews. In addition, the performance of consultant studies for local transit operators and cities must be timed in accordance with locally determined priorities, which thus precludes setting a rigid advanced schedule.

Consequently, no specific schedule for work tasks has been provided in this Work Program. Instead, carryover work not completed from the FY2016 and FY2017 Work Program will be completed first, and new work will be started as soon as possible in accordance with local agency needs at the time. Task initiation will also depend on special needs or interests and resources available. Care will be exercised to start tasks of longer duration or those requiring significant lead time or down time as early in the two-year timeframe as possible in order to improve the chances of their being completed by the end of September 2019.
**EXHIBIT VIII-3**

**FY2018 AND FY2019 UPWP FUNDING SUMMARY**

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VIII. Overview of Work Program Funding

Summary of Funding by Task

Summary of Total Funding
APPENDIX A

POLICY COMMITTEE MEMBERSHIP
### NCTCOG Executive Board 2017-2018

**President**  
**Tom Lombard**  
Councilmember, City of North Richland Hills

**Vice President**  
**Kevin Strength**  
Mayor, City of Waxahachie

**Secretary-Treasurer**  
**J.D. Clark**  
County Judge, Wise County

**Past President**  
**Lissa Smith**  
Former Mayor Pro Tem, City of Plano

**Director**  
**Kelly Allen Gray**  
Councilmember, City of Fort Worth

**Director**  
**Douglas Athas**  
Mayor, City of Garland

**Director**  
**Clay Lewis Jenkins**  
County Judge, Dallas County

**Director**  
**Lee M. Kleinman**  
Councilmember, City of Dallas

**Director**  
**Curtistene McCowan**  
Mayor, City of Desoto

**Director**  
**Bobbie Mitchell**  
Commissioner, Denton County

**Director**  
**Nick Sanders**  
Mayor, Town of Trophy Club

**Director**  
**Keith Self**  
County Judge, Collin County

**Director**  
**Ray Smith**  
Mayor, Town of Prosper

**Director**  
**Paul Voelker**  
Mayor, City of Richardson

**Director**  
**B. Glen Whitley**  
County Judge, Tarrant County

**Director**  
**Kathryn Wilemon**  
Councilmember, City of Arlington

**Ex Officio, Non-Voting Member**  
**Ron Simmons**  
Texas House of Representatives

**Executive Director**  
**R. Michael Eastland**

---

### Regional Transportation Council 2017-2018

<table>
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<tr>
<td><strong>Rob Franke, P.E., Chair</strong></td>
<td>Mayor, City of Cedar Hill</td>
</tr>
<tr>
<td><strong>Gary Fickes, Vice Chair</strong></td>
<td>Commissioner, Tarrant County</td>
</tr>
<tr>
<td><strong>Andy Eads, Secretary</strong></td>
<td>Commissioner, Denton County</td>
</tr>
<tr>
<td><strong>Douglas Athas</strong></td>
<td>Mayor, City of Garland</td>
</tr>
<tr>
<td><strong>Sara Bagheri</strong></td>
<td>Mayor Pro Tem, City of Denton</td>
</tr>
<tr>
<td><strong>Carol Bush</strong></td>
<td>County Judge, Ellis County</td>
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<tr>
<td><strong>Loyl C. Bussell, P.E.</strong></td>
<td>Acting District Engineer, Texas Department of Transportation, Fort Worth District</td>
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<tr>
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<tr>
<td><strong>Jeff Cheney</strong></td>
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</tr>
<tr>
<td><strong>David L. Cook</strong></td>
<td>Mayor, City of Mansfield</td>
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<tr>
<td><strong>Rudy Durham</strong></td>
<td>Mayor, City of Lewisville</td>
</tr>
<tr>
<td><strong>Charles Emery</strong></td>
<td>Chairman, Denton County Transportation Authority</td>
</tr>
<tr>
<td><strong>Kevin Falconer</strong></td>
<td>Mayor, City of Carrollton</td>
</tr>
<tr>
<td><strong>George Fuller</strong></td>
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</tr>
<tr>
<td><strong>Sandy Greyson</strong></td>
<td>Councilmember, City of Dallas</td>
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**Mojy Haddad**  
Board Member, North Texas Tollway Authority

**Roger Harmon**  
County Judge, Johnson County

**Clay Lewis Jenkins**  
County Judge, Dallas County

**Ron Jensen**  
Mayor, City of Grand Prairie

**Jungus Jordan**  
Councilmember, City of Fort Worth

**Lee M. Kleinman**  
Councilmember, City of Dallas

**Harry LaRosiliere**  
Mayor, City of Plano

**David Magness**  
Commissioner, Rockwall County

**Scott Mahaffey**  
Chairman, Fort Worth Transportation Authority

**B. Adam McGough**  
Councilmember, City of Dallas

**William Meadows**  
Board Vice Chair, Dallas Fort Worth International Airport

**Steve Mitchell**  
Councilmember, City of Richardson

**Cary Moon**  
Councilmember, City of Fort Worth

**Stan Pickett**  
Mayor, City of Mesquite

**Mark Riley**  
County Judge, Parker County

**Kelly Selman, P.E.**  
District Engineer, Texas Department of Transportation, Dallas District

**Gary Slagel**  
Board Secretary, Dallas Area Rapid Transit

**Mike Taylor**  
Councilmember, City of Colleyville

**Stephen Terrell**  
Mayor, City of Allen

**T. Oscar Trevino, Jr., P.E.**  
Mayor, City of North Richland Hills

**William Tsao, P.E.**  
Citizen Representative, City of Dallas

**Oscar Ward**  
Councilmember, City of Irving

**Duncan Webb**  
Commissioner, Collin County

**B. Glen Whitley**  
County Judge, Tarrant County

**Kathryn Wilemon**  
Councilmember, City of Arlington

**W. Jeff Williams**  
Mayor, City of Arlington

**Ann Zadeh**  
Councilmember, City of Fort Worth

**Michael Morris, P.E.**  
Director of Transportation, NCTCOG

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### Surface Transportation Technical Committee

**Todd Plesko, Chair**  
Vice President of Planning and Development, Dallas Area Rapid Transit
APPENDIX C

DEBARMENT CERTIFICATION
APPENDIX C

DEBARMENT CERTIFICATION
(Negotiated Contracts)

(1) The MPO as CONTRACTOR certifies to the best of its knowledge and belief that it and its principals:

(a) Are not presently debarred, suspended, proposed for debarment, declared ineligible or voluntarily excluded from covered transactions by any federal department or agency;

(b) Have not within a three-year period preceding this proposal been convicted of or had a civil judgment rendered against them for commission of fraud or a criminal offense in connection with obtaining, attempting to obtain, or performing a public* transaction or contract under a public transaction; violation of federal or state antitrust statutes or commission of embezzlement, theft, forgery, bribery, falsification or destruction of records, making false statements, or receiving stolen property;

(c) Are not presently indicted for or otherwise criminally or civilly charged by a governmental entity* with commission of any of the offenses enumerated in paragraph (1)(b) of this certification; and

(d) Have not within a three-year period preceding this application/proposal had one or more public transactions* terminated for cause or default.

(2) Where the CONTRACTOR is unable to certify to any of the statements in this certification, such CONTRACTOR shall attach an explanation to this certification.

*Federal, state or local

Mike Eastland, Executive Director
North Central Texas Council of Governments

7/17/17 Date
APPENDIX D

LOBBYING CERTIFICATION
APPENDIX D

LOYING CERTIFICATION

CERTIFICATION FOR CONTRACTS, GRANTS,
LOANS AND COOPERATIVE AGREEMENTS

The undersigned certifies to the best of his or her knowledge and belief, that:

(1) No federal appropriated funds have been paid or will be paid by or on behalf of the undersigned, to any person for influencing or attempting to influence an officer or employee of any federal agency, a Member of Congress, an officer or employee of Congress, or an employee of a Member of Congress in connection with the awarding of any federal contract, the making of any federal grant, the making of any federal loan, the entering into of any cooperative agreement, and the extension, continuation, renewal, amendment, or modification of any federal contract, grant, loan, or cooperative agreement.

(2) If any funds other than federal appropriated funds have been paid or will be paid to any person for influencing or attempting to influence an officer or employee of any agency, a Member of Congress, an officer or employee of Congress, or an employee of a Member of Congress in connection with this federal contract, grant, loan, or cooperative agreement, the undersigned shall complete and submit Standard Form - LLL, “Disclosure Form to Report Lobbying,” in accordance with its instructions.

(3) The undersigned shall require that the language of this certification be included in the award documents for all subawards at all tiers (including subcontracts, subgrants, and contracts under grants, loans, and cooperative agreements) and that all subrecipients shall certify and disclose accordingly.

This certification is a material representation of fact upon which reliance was placed when this transaction was made or entered into. Submission of this certification is a prerequisite for making or entering into this transaction imposed by Section 1352, Title 31, U.S. Code. Any person who fails to file the required certification shall be subject to a civil penalty of not less than $10,000 and not more than $100,000 for each such failure.

Mike Eastland

Executive Director

Title

North Central Texas Council of Governments

Agency

Date 7/17/17
APPENDIX E

CERTIFICATION OF COMPLIANCE
APPENDIX E

CERTIFICATION OF COMPLIANCE

I, Mike Eastland, Executive Director

(Name and Position, Typed or Printed)

a duly authorized officer/representative of North Central Texas Council of Governments

(MPO)

do hereby certify that the contract and procurement procedures that are in effect and used by the forenamed MPO are in compliance with 2 CFR 200, "Uniform Administrative Requirements, Cost Principles, and Audit Requirements for Federal Awards," as it may be revised or superseded.

Date

[Signature]

Mike Eastland, Executive Director

Attest:

Michael Morris

Director of Transportation

Title
APPENDIX F

CERTIFICATION OF INTERNAL ETHICS AND COMPLIANCE PROGRAM
APPENDIX F

CERTIFICATION OF INTERNAL ETHICS AND COMPLIANCE PROGRAM

I, Mike Eastland, Executive Director

(Name and Position, Typed or Printed)

a duly authorized officer/representative of North Central Texas Council of Governments

(MPO)

do hereby certify that the forenamed MPO has adopted and does enforce an internal ethics and compliance program that is designed to detect and prevent violations of law, including regulations and ethical standards applicable to this entity or its officers or employees and that the internal ethics and compliance program satisfies the requirements of by 43 TAC § 31.39 “Required Internal Ethics and Compliance Program” and 43 TAC § 10.51 “Internal Ethics and Compliance Program” as may be revised or superseded.

Date  7/17/17

Mike Eastland, Executive Director

Attest:

Michael Morris

Director of Transportation

Title
APPENDIX G

PUBLIC PARTICIPATION PLAN
Public Participation Plan for the Dallas-Fort Worth Metropolitan Area

November 2018
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3. Public Participation Goals .......................................................................................... 8
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5. Public Participation Strategies ................................................................................... 21
6. Evaluation of Public Participation .............................................................................. 27

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1. About the Metropolitan Planning Organization

North Central Texas Council of Governments Transportation Department and Regional Transportation Council

As the federally designated Metropolitan Planning Organization (MPO) for the Dallas-Fort Worth area since 1974, the North Central Texas Council of Governments (NCTCOG) Transportation Department works in cooperation with the region’s transportation providers to address the complex transportation needs of the rapidly growing region. The 12-county region includes Collin, Dallas, Denton, Ellis, Hood, Hunt, Johnson, Kaufman, Parker, Rockwall, Tarrant and Wise counties. This area is urbanized or expected to be urbanized in the next 20 years. North Texas is one of the fastest-growing regions in the country, adding about 1 million people every 10 years. More than 7 million people live in the region today, and that is expected to increase to over 11 million by 2045. NCTCOG works with its transportation partners and all levels of government, as well as the public, to address traffic safety and congestion by developing a multimodal transportation system that includes highway, passenger rail, bus, and bicycle and pedestrian facilities.

In addition to serving as the MPO for the Dallas-Fort Worth area, NCTCOG also coordinates public transportation planning for the 12-county region and four additional counties: Erath, Navarro, Palo Pinto and Somervell.

The Regional Transportation Council (RTC), the independent policy body of the MPO, oversees the work of the MPO, establishes priorities and guides the development of multimodal transportation plans, programs and partnerships. The RTC consists primarily of local elected officials and representatives from the area’s transportation providers, and the RTC determines how to allocate federal, state and regional funds to transportation improvements. Committees and advisory groups lend expertise and develop recommendations for the RTC to consider.
2. Guiding Principles for Public Participation

This Public Participation Plan outlines the MPO’s responsibility to inform and involve individuals and communities and discusses the principles, goals and strategies it employs to broadly engage the diverse audiences living and working in North Texas.

NCTCOG adheres to federal requirements for public involvement and strives to go beyond these requirements by finding new ways to engage the public in the transportation planning and programming process. Appendix A outlines the laws and legislation relevant to public participation and how NCTCOG meets these standards.

Consistent and Comprehensive Communication
Transportation policies and programs affect every individual, group and community in North Texas; therefore, the MPO employs a collaborative public involvement process to identify transportation needs and solutions for the region. Clear and continuous communication with the public through multiple channels is the cornerstone for building a transportation system that helps preserve the region’s quality of life while moving people and goods safely, efficiently and reliably.

Additionally, the MPO must ensure regional transportation planning is consistent with federal goals to improve air quality because some counties in the Dallas-Fort Worth area do not meet the ozone standards set by the Environmental Protection Agency (EPA). Appendix B outlines the current county classifications under each ozone standard as of the date of this publication. Therefore, the MPO develops and implements programs to reduce ozone-causing emissions from transportation-related sources. To accomplish the mobility and air quality goals of the entire region, the MPO actively seeks to hear from people who live, work and travel in North Texas and have varying transportation needs and priorities.

Commitment to Diversity and Inclusiveness
NCTCOG values the full range of voices in North Texas and is committed to listening to and seeking input from the diverse individuals and many communities that reside in the Dallas-Fort Worth area. As such, NCTCOG seeks to both meet federal requirements for participation and actively increase the number and diversity of participants in the planning process.

Consistent with federal requirements outlined in Appendix A, NCTCOG is committed to incorporating Environmental Justice elements and Title VI considerations into its Public Participation Plan. During the public participation process, populations that have been traditionally underserved by existing transportation systems, including but not limited to low-income and minority households, are sought out and their needs considered.

NCTCOG addresses Environmental Justice concerns throughout the transportation planning process, and it is the responsibility of all staff to consider the needs of traditionally underserved communities during planning, project selection and project implementation. As the Public Participation Plan is implemented, special consideration is given to ensure all residents have reasonable access to information and opportunities to give input. Furthermore, demographic data is analyzed to identify areas having considerable numbers of protected populations. This information can be used to select locations for public meetings and outreach events as well as to identify opportunities to better target or diversify outreach efforts.
The Language Assistance Plan (LAP) in Appendix B outlines NCTCOG’s efforts to make information available to limited English proficient (LEP) persons. The LAP outlines demographic information, analysis of Department activities, language assistance provided and communication to LEP persons about the availability of language assistance.

Title VI states that no person is excluded from participation in, denied the benefit of, or subjected to discrimination under any program or activity receiving federal financial assistance on the basis of race, color, national origin, age, sex, disability, or religion. Title VI prohibits discrimination, whether intentional or where the unintended effect is unduly burdensome.

The Title VI Complaint Procedures in Appendix D outline the NCTCOG Title VI policy and explain the process by which complaints may be submitted by individuals, investigated and potentially resolved.

The Public Participation Plan outlines principles and strategies through which NCTCOG seeks to include all of the region’s communities in the planning process. In particular, the diversity of communities in North Texas means NCTCOG will work to establish and maintain relationships and channels of communication with individuals and organizations that serve traditionally underrepresented groups. By working with communities, NCTCOG will better reach individuals and understand their transportation needs, resulting in relationships that lead to consensus building.

Communication and outreach strategies that specifically aim to increase the number and diversity of people reached through the planning process include, but are not limited to:

- Media Outreach: Regularly research newspapers, online publications and blogs serving areas with considerable numbers of protected populations and update the media contact database as needed
- Paid Advertising: Continue to advertise public input opportunities in minority publications and through social media and identify opportunities to place paid advertisements in strategically selected media and organizational publications to encourage individuals to sign up for NCTCOG Transportation Department email updates
- Language Translation: Advertise public input opportunities in Spanish-language newspapers with instructions for requesting additional translation; translate key NCTCOG Transportation Department documents and work with program areas to identify opportunities for bilingual outreach in Spanish and other languages; provide translation into Spanish or other languages upon request
- Community Networks: Establish and facilitate a network of individuals and organizations who will share information and notices of input opportunities in their communities and through their own networks
- Business Outreach: Evaluate how to expand outreach to the business community, including minority chambers of commerce
- Nonprofit Coordination: Identify and develop opportunities to better coordinate with nonprofit organizations already effectively reaching segments of the North Texas population

**Collaboration with Audiences and Stakeholders**

Collaboration with the region’s diverse audiences and stakeholders helps build the consensus needed to develop transportation plans, policies and projects that accomplish the mobility, quality of life and air quality goals of the region. NCTCOG strongly encourages involvement and
input from individuals, groups and organizations who live, work or travel in North Texas and may be affected by transportation and air quality decisions. Individuals exist in communities, and often in networks of communities, both formal and informal, so listening to and informing individuals is an important way the NCTCOG Transportation Department implements its communications and outreach plans. Further developing connections in communities will expand the reach of NCTCOG information and involve more people in transportation decision-making.

In accordance with the federal laws and legislation in Appendix A, and using the communications and outreach strategies detailed in this plan, NCTCOG seeks to reasonably inform and involve the following parties in the planning process:

**Required for General Public Participation**
- Individuals
- Affected public agencies
- Representatives of public transportation employees
- Public ports
- Freight shippers
- Providers of freight transportation services
- Private providers of transportation
- Intercity bus operators
- Employer-based commuting programs
- Carpool program
- Vanpool program
- Transit benefit program
- Parking cash-out program
- Shuttle program
- Telework program
- Representatives of users of public transportation
- Representatives of users of pedestrian walkways and bicycle transportation facilities
- Representatives of the disabled
- Other interested parties
- Those traditionally underserved by existing transportation systems
  - Low-income households
  - Minority Households

**Required for the Metropolitan Transportation Plan and TIP**
- Agencies and officials responsible for other planning activities within the MPA that are affected by transportation
  - State and local planned growth
  - Economic development
  - Tourism
  - Natural disaster risk reduction
  - Environmental protection
  - Airport operations
  - Freight movements
- Indian Tribal governments
- Federal land management agencies, when the MPA includes Federal public lands
Required for Metropolitan Transportation Plan
- State and local agencies responsible for land use management
- State and local agencies responsible for natural resources
- State and local agencies responsible for environmental protection
- State and local agencies responsible for conservation
- State and local agencies responsible for historic preservation

Required for Congestion Management Plan (if developed in the future)
- Employers
- Private and nonprofit providers of public transportation
- Transportation management organizations
- Organizations that provide job access reverse commute projects or job-related services to low-income individuals

Consultation with Committees
Standing and ad hoc committees, subcommittees, task forces and working groups provide valuable input, insight and coordination on planning for transportation and air quality issues in the region. The Regional Transportation Council is the forum for cooperative decision-making by the elected officials of local governments and representatives of local transportation providers in the Metropolitan Planning Area. The RTC meets on the second Thursday of each month.

The Surface Transportation Technical Committee provides technical review and advice to the RTC with regard to the surface transportation system. Other technical committees, determined as needed by the NCTCOG Transportation Director, provide technical review and advice for the regional transportation planning process.

Meetings of the RTC and the standing technical, policy and strategic committees are open meetings. Visit www.nctcog.org/trans/about/committees to learn more about the committees, their members, past and upcoming meetings, and other information.
3. Public Participation Goals

NCTCOG implements an integrated communications and outreach program to engage diverse audiences in planning for transportation and improving air quality. Making content relevant, removing barriers to participation, stating information simply and using visualization techniques facilitates understanding and meaningful input. NCTCOG not only seeks to inform and educate, but also to empower and improve opportunities for the public to share their ideas, perspectives and priorities for transportation. When the public has been informed and has had an opportunity to provide input, sufficient consensus building can take place, providing the support for whatever transportation decisions are made. Finally, monitoring, evaluating and refining communications and outreach strategies will ensure NCTCOG’s efforts to inform and gather input are inclusive, effective and transparent, and meet its desired outcomes for its public participation process.

Public involvement goals and the strategic priorities for accomplishing each are outlined below.

Goal 1: Inform and Educate
- Increase awareness and understanding of the MPO among North Texans
- Connect with organizations and community leaders who can help reach more people and engage those individuals in the planning process
- Make information accessible and understandable
- Develop visuals to illustrate and enhance communications
- Provide timely public notice of information resources and opportunities to comment on plans, policies and programs
- Ensure transparency and accessibility for open meetings, including for the RTC and the standing technical, policy and strategic committee meetings
- Provide language translation and alternate formats upon request

Goal 2: Engage Diverse Audiences and Encourage Continued Participation
- Identify the affected public and other stakeholder groups with respect to the plans, programs, projects, policies and partnerships under development
- Clearly define the purpose and objectives for public dialogue on transportation plans, programs, projects, policies and partnerships
- Encourage input to be submitted in various ways, including flexible, creative and innovative approaches
- Eliminate barriers to participation by hosting public meetings at accessible locations and convenient times and posting video recordings, information and public comment opportunities online for ease of access
- Document and respond, as needed, to comments from public meetings, outreach events, mail, email, web forms and social media
- Share public input with policy and technical committees
- Use input to develop policies, plans and programs, making the final versions easily accessible

Goal 3: Evaluate Public Participation Strategies and Efforts
- Review quantitative and qualitative data for outreach and communications efforts
- Review how public input influenced transportation decision-making
- Inform the public about outreach and communications efforts and outcomes through reporting
4. Procedures for Public Comments and Specific Plans and Programs

NCTCOG strives to continuously inform and involve the public and encourages North Texans to submit comments and questions at any time. A summary of NCTCOG’s procedures for gathering and documenting public input and presenting it to the RTC and other committees is outlined below.

In addition, when developing and updating major plans and programs there are several specific outcomes and milestones that especially benefit from public input. Staff seeks to align the outcomes and milestones to outreach efforts and opportunities for public involvement. It is important that local governments, transportation partners, business and community groups, nonprofits, stakeholders and interested residents who have a stake in these outcomes have opportunities to be involved in determining the future of transportation in the region. As such, the opportunities for public input described below meet legislative regulations for participation while aiming to provide early notification and a process that is efficient, accessible and transparent.

Public Comment Compilation, Consideration and Response

NCTCOG compiles, summarizes and responds to substantive comments submitted on plans, programs and policies. Public input provides NCTCOG and the RTC with community insight that can be balanced with professional expertise and technical analysis to reach informed decisions. In the event that more than one public meeting is scheduled for a given topic, the public comment period for that topic begins the day of the first meeting. When a specific comment period is stated, comments must be received by 11:59 pm CT on the date specified as the deadline.

Comments relevant to and received during specific public comment periods are provided to the RTC in advance of any meetings where they are scheduled to take action on the relevant policy, plan or program. All comments received outside these formal public comment periods, regardless of the topic, are compiled into a monthly report and presented to the RTC in advance of its next regularly scheduled meeting. These comments are accessible to the public in the RTC meeting agendas, public meeting minutes and monthly comment reports on the NCTCOG website.

As a matter of course, the RTC gives greater weight to the voices of impacted residents, businesses, governments, transportation partners, and other agencies and organizations in the region. Therefore, when providing comments to the RTC, NCTCOG may distinguish between local comments and comments submitted from outside the region or a project corridor.

With an increased focus on expediting project implementation and funding allocation, there may be rare occasions in which issues arise that require urgent action, such as modification of the Transportation Improvement Program, due to funding requirements or timelines. In these cases, there will be adequate public notice and clear communication of the abbreviated comment period. An abbreviated comment period will be at least 72 hours. Longer comment periods are preferred and will be offered whenever possible. As with comments received during longer comment periods, staff will compile, summarize and respond to substantive comments received during the abbreviated comment period. Staff will provide these comments and their responses at the next RTC meeting.
Following the request of emergency funds to provide assistance in the aftermath of Hurricane Harvey in 2017, NCTCOG may also choose to utilize an abbreviated comment period to seek public input on assistance requested from the state or local governments experiencing an emergency. Use of a comment period in such instances is at NCTCOG’s discretion and depends on the amount of assistance requested. NCTCOG may not provide funds to either state or local governments in any instance without securing approval from the RTC. Notification will be provided to the public of such actions at the next public input opportunity.

**Additional Comment Opportunities for Changes to Final Plans**
If any of the final plans or programs differ significantly from the draft that was made available for public comment and raise new material issues that interested parties could not reasonably have foreseen from the public involvement efforts, an additional opportunity for public comment will be made available. At the minimum, the format of the additional comment opportunity will be the same as the initial opportunity and have a minimum 14-day comment period, unless provisions for an expedited comment period apply as outlined above. In the case of public meetings, the number and location of the subsequent public meeting(s) may vary, but at a minimum one public meeting will be held at NCTCOG, and a video recording of that meeting will be posted online.

Minor changes to a final plan or program, or changes that could have been reasonably foreseen, can be made without further opportunities for public involvement. As such, recommendations presented during public comment periods are understood to be contingent on the outcomes of the public involvement process. Changes made to a final draft plan or program as a result of public comments received during the comment opportunity will not require a further opportunity for public comment; notification of such changes will be provided at the next public input opportunity. This is consistent with CFR § 450.316 (a)(1)(viii) included in Appendix A.

**Inclement Weather and Public Comment Periods**
Specific public comment periods are given for the transportation planning actions and outcomes outlined, and these are initiated either by a public meeting or posting information online for public review. Should inclement weather lead to the cancelation of one or more public meetings, NCTCOG will first notify the public of the cancelation through email, webpage updates and social media. In most cases, if another public meeting in the series can be hosted as planned and/or a video recording made available at www.nctcog.org/input, the deadline for public comments will remain as if weather were not a factor. However, based on the topic, staff may determine it is necessary to reschedule the meeting or meetings and adjust the public comment period. If action initiating a public comment period, such as posting information to www.nctcog.org/input for review, is delayed by inclement weather, staff will communicate the delay by email and social media and again when the information becomes available for comment. If the delay is less than seven calendar days, the deadline for public comments will remain as if weather were not a factor.
Public Participation Plan Development and Updates

The Public Participation Plan describes the public involvement responsibilities of the MPO and outlines goals and strategies for broadly engaging diverse audiences in the transportation planning process. Staff monitors and evaluates communication and outreach strategies and reviews federal legislation and guidance for public participation. As communications trends and transportation planning requirements change, staff will determine the level and timing of changes needed to the Public Participation Plan. Staff will align input opportunities with the extensiveness of proposed changes.

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<th>Transportation Planning Action</th>
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<th>Length of Comment Period</th>
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<tbody>
<tr>
<td>Development or update of the Public Participation Plan</td>
<td>One public meeting shall be held at least 30 days prior to requesting RTC approval. At a minimum, the meeting will be recorded and posted online at <a href="http://www.nctcog.org/video">www.nctcog.org/video</a>. Whenever possible, a livestream will be provided as well.</td>
<td>45 days</td>
<td>• Information sent to public involvement contact list</td>
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<tr>
<td>Update to one or more Public Participation Plan appendices or legislative references in the document</td>
<td>Proposed changes posted online for public review and comment at <a href="http://www.nctcog.org/input">www.nctcog.org/input</a></td>
<td>45 days</td>
<td>• Information sent to public involvement contact list</td>
</tr>
<tr>
<td>Typographic or grammatical correction</td>
<td>None</td>
<td>Not applicable</td>
<td>Not applicable</td>
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Unified Planning Work Program (UPWP)

The Unified Planning Work Program for Regional Transportation Planning provides a summary of the transportation and related air quality planning tasks conducted by the MPO. It is developed every two years and serves as a guide for transportation and air quality planning activities to be conducted over the course of specified fiscal years. Included in the UPWP are detailed descriptions of the transportation and air quality planning tasks with a summary of the amount and source of funds to be used. The UPWP is developed in cooperation with the Texas Department of Transportation, Dallas Fort Worth International Airport, transportation authorities, toll authorities and local governments in the Dallas-Fort Worth Metropolitan Area. Specific planning needs for the region are identified through requests solicited from representatives of these agencies. This information is combined with regional needs identified by NCTCOG, and after allocating funds from available resources, presented as a proposed Work Program for the upcoming fiscal years. The UPWP is modified periodically to reflect new initiatives, project modifications and funding adjustments.

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| Development of the UPWP       | One public meeting shall be held at least 30 days prior to requesting RTC approval. At a minimum, the meeting will be recorded and posted online at www.nctcog.org/video. Whenever possible, a livestream will be provided as well. | 30 days                  | • Information sent to public involvement contact list  
  • NCTCOG publication article  
  • Social media  
  • Newspaper ad, including minority publications  
  • News release |
| Modifications                 | Recommendations posted online for public review and comment at www.nctcog.org/input | 30 days                  | • Information sent to public involvement contact list  
  • NCTCOG publication article  
  • Social media  
  • Newspaper ad, including minority publications  
  • News release |
Metropolitan Transportation Plan (MTP)

Updated at least every four years, the Metropolitan Transportation Plan is the long-term, financially constrained, multimodal transportation plan for the region. It includes policies, programs and projects for development that respond to adopted goals, and it guides expenditures of state and federal funds during the next 20 or more years. It is the product of a comprehensive, cooperative and continuous planning effort. Transit, highway, local roadway and bicycle and pedestrian projects are among projects included in the MTP. During its development, transportation investment priorities and major planning-level project design concepts are established. Broad regional impacts of transportation and the environment are addressed. This is an early and important opportunity for the public and stakeholders to help define and influence transportation choices in the region. As such, numerous outreach and communications strategies are implemented to engage a diverse audience in public input opportunities. Strategies may include but are not limited to print and online surveys, stakeholder workshops, website content, media outreach, email and mail notices, presentations to community groups and public meetings for both the development of the MTP and review of its final recommendations prior to Regional Transportation Council consideration. Public comments regarding the MTP will be included in the plan’s documentation or by reference to the Transportation Conformity documentation.

Changes to the MTP are incorporated through an update, amendment or administrative modification, and public input opportunities correspond to the level of proposed changes.

The most comprehensive set of changes, an update, is a complete review of the MTP that addresses new demographics or changes to the overall timeframe for the plan. Project changes, additions or deletions may also be part of an update, requiring a new transportation conformity determination.

An amendment incorporates a significant change to one or more projects included in the MTP, but it does not modify the demographic assumptions or overall timeframe for a plan. The addition or deletion of a project is completed through the amendment process. Other examples of changes to projects requiring an amendment include a major change in project cost, project or project phase initiation dates, or a major change in design concept or design scope, e.g., changing project termini or the number of through traffic lanes. An amendment requires public review and comment and redemonstration of fiscal constraint. Changes to projects that are included only for illustrative purposes outside of the financially constrained section of the plan do not require an amendment.

The purpose of the public comment and review period in all cases is to solicit feedback regarding the recommendations and information documented in the MTP. As a result, it is sometimes necessary to make minor modifications to the MTP documentation and coded transportation model networks. These modifications may include updating existing project data, correcting erroneous information, or clarifying text. In the event these changes are necessary during the public comment and review period, revised documentation will be posted online at www.nctcog.org/input and the associated MTP website. Notification of these revisions will be provided to the public involvement contact list and through social media.

Administrative modifications are minor changes to project/project phase costs, funding sources of previously-included projects, and minor changes to project or project phase initiation dates. An administrative revision is a revision that does not require public review and comment, redemonstration of fiscal constraint, or a conformity determination. This could also include
Finally, changes to the section of non-regionally significant projects in the Metropolitan Transportation Plan may be incorporated through the Transportation Improvement Program modification process to ensure consistency between the two documents. The action to make modifications to the Transportation Improvement Program will also modify the Metropolitan Transportation Plan.

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| Development of the Metropolitan Transportation Plan | A public meeting shall be held at least 60 days prior to requesting RTC approval. A second public meeting will be held at least 30 days prior to RTC approval. At a minimum, the meeting will be recorded and posted online at www.nctcog.org/video. Whenever possible, a livestream will be provided as well. | 30 days following each meeting | • Information sent to public involvement contact list  
• NCTCOG publication article  
• Social media  
• Newspaper ad, including minority publications  
• News release |
| Metropolitan Transportation Plan Update | A public meeting shall be held at least 60 days prior to requesting RTC approval. A second public meeting will be held at least 30 days prior to RTC approval. At a minimum, the meeting will be recorded and posted online at www.nctcog.org/video. Whenever possible, a livestream will be provided as well. | 30 days following each meeting | • Information sent to public involvement contact list  
• NCTCOG publication article  
• Social media  
• Newspaper ad, including minority publications  
• News release |
| Metropolitan Transportation Plan Amendment | One public meeting shall be held at least 30 days prior to requesting RTC approval. At a minimum, the meeting will be recorded and posted online at www.nctcog.org/video. Whenever possible, a livestream will be provided as well. | 30 days | • Information sent to public involvement contact list  
• NCTCOG publication article  
• Social media  
• Newspaper ad, including minority publications  
• News release |
| Metropolitan Transportation Plan administrative revisions | Summary of modifications accessible from www.nctcog.org/input for informational purposes. | Not applicable | • Availability of information included on next notice for a public input opportunity |
Transportation Improvement Program (TIP)
As projects listed in the Metropolitan Transportation Plan move closer to implementation, they are added to the Transportation Improvement Program, a comprehensive, multi-year list of funded transportation projects. The TIP lists projects with committed funds from federal, state and local sources. To maintain an accurate project listing, this document is updated on a regular basis, according to the Transportation Improvement Program Modification Policy in Appendix C. The modification policy defines types of TIP modifications and the related procedures. Every two to three years, NCTCOG, in cooperation with the Texas Department of Transportation, local governments and transportation agencies, develops a new TIP. Public comments on the TIP will be included in the documentation of the TIP or by reference to the public meeting minutes on the NCTCOG website. With an increased focus on expediting project implementation and funding allocation, there may be very rare occasions in which issues arise that require urgent modification of the Transportation Improvement Program due to funding requirements or timelines. In these cases, there will be adequate public notice and clear communication of the abbreviated comment period. An abbreviated comment period will be at least 72 hours. Longer comment periods are preferred and will be offered whenever possible.

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</table>
| Development of the Transportation Improvement Program | One public meeting shall be held at least 30 days prior to requesting RTC approval. At a minimum, the meeting will be recorded and posted online at [www.nctcog.org/video](http://www.nctcog.org/video). Whenever possible, a livestream will be provided as well. | 30 days | • Information sent to public involvement contact list  
• NCTCOG publication article  
• Social media  
• Newspaper ad, including minority publications  
• News release |
| TIP Revisions requiring Regional Transportation Council approval | Recommendations posted online for public review and comment at [www.nctcog.org/input](http://www.nctcog.org/input) | 30 days | • Information sent to public involvement contact list  
• NCTCOG publication article  
• Social media  
• Newspaper ad, including minority publications  
• News release |
| TIP Administrative Amendments | Summary of modifications accessible from [www.nctcog.org/input](http://www.nctcog.org/input) for informational purposes. | Not applicable | • Availability of information included on next notice for a public input opportunity |
| Project changes not requiring TIP modification (i.e. staff action) and modifications supporting previous RTC action | None | Not applicable | Not applicable |
Transportation Conformity

The region’s long- and short-range transportation plans, the Metropolitan Transportation Plan and Transportation Improvement Program, must comply with federal air quality regulations because the Dallas-Fort Worth area is designated by the EPA as nonattainment for the pollutant ozone. The Transportation Conformity analysis documents that the total ozone-causing pollution expected from all of the region’s planned transportation projects is within limits established in the State Implementation Plan. The analysis incorporates, among many factors, the expected completion date of transportation projects. The draft conformity determination of the Metropolitan Transportation Plan and Transportation Improvement Program and supporting documentation shall be made available at the related public meetings.

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<th>Transportation Planning Action</th>
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<th>Length of Comment Period</th>
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| Transportation Conformity determination draft related to development of the Transportation Improvement Program or Metropolitan Transportation Plan | One public meeting shall be held at least 30 days prior to requesting RTC approval. At a minimum, the meeting will be recorded and posted online at [www.nctcog.org/video](http://www.nctcog.org/video). Whenever possible, a livestream will be provided as well. | 30 days | • Information sent to public involvement contact list  
• NCTCOG publication article  
• Social media  
• Newspaper ad, including minority publications  
• News release |
| Transportation Conformity determination draft related to update or amendment of the Metropolitan Transportation Plan | One public meeting shall be held at least 30 days prior to requesting RTC approval. At a minimum, the meeting will be recorded and posted online at [www.nctcog.org/video](http://www.nctcog.org/video). Whenever possible, a livestream will be provided as well. | 30 days | • Information sent to public involvement contact list  
• NCTCOG publication article  
• Social media  
• Newspaper ad, including minority publications  
• News release |
| Transportation Conformity draft related to changes to the transportation system | One public meeting shall be held at least 30 days prior to requesting RTC approval. At a minimum, the meeting will be recorded and posted online at [www.nctcog.org/video](http://www.nctcog.org/video). Whenever possible, a livestream will be provided as well. | 30 days | • Information sent to public involvement contact list  
• NCTCOG publication article  
• Social media  
• Newspaper ad, including minority publications  
• News release |

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### Transportation Conformity

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| Transportation Conformity draft related to changes in the emissions budget of the State Implementation Plan and/or nonattainment area boundary changes | Draft conformity determination and supporting data posted online for public review and comment at [www.nctcog.org/input](http://www.nctcog.org/input) | 30 days | • Information sent to public involvement contact list  
• NCTCOG publication article  
• Social media  
• Newspaper ad, including minority publications  
• News release |
| Transportation Conformity approval by federal partners | None, final approval available at [www.nctcog.org/conformity](http://www.nctcog.org/conformity) | Not applicable | • News release announcing federal approval |
Federal Transit Administration Funding

Local public transportation providers receive Federal Transit Administration (FTA) funds through the Urbanized Area Formula Program. The providers request Urbanized Area Formula Program funds, including Job Access/Reverse Commute (JA/RC) projects, through their annual Programs of Projects (POPs). The POPs are included in the Transportation Improvement Program following public comment and approval by the Regional Transportation Council. The public involvement procedures outlined below satisfy the federal public participation requirements associated with development of POPs, and this is stated on public meeting notices. Additionally, up to 2 percent of the Urbanized Area Formula Program funds are awarded through a competitive Call for Projects for Job Access / Reverse Commute projects. NCTCOG follows the same public involvement procedures when recommending the award of funds through a Call for Projects. Local public transportation providers may also receive funds from other FTA formula programs, and the public will have an opportunity to review and comment on the recommendations. Whenever possible, draft POPs and other funding recommendations will be combined with a discussion about regional public transportation needs and priorities to garner interest and provide for a more comprehensive discussion. Changes to POPs will be addressed through the Transportation Improvement Program modification process.

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</table>
| Draft Programs of Projects for Urbanized Area Formula Program funds (includes Job Access / Reverse Commute projects) | One public meeting shall be held at least 30 days prior to requesting RTC approval. At a minimum, the meeting will be recorded and posted online at www.nctcog.org/video. Whenever possible, a livestream will be provided as well. | 30 days | • Information sent to public involvement contact list  
• NCTCOG publication article  
• Social media  
• Newspaper ad, including minority publications  
• News release |
| Funding recommendations for other Federal Transit Administration formula programs, e.g., Bus and Bus Facilities, Enhanced Mobility of Seniors and Individuals with Disabilities and State of Good Repair | One public meeting shall be held at least 30 days prior to requesting RTC approval. At a minimum, the meeting will be recorded and posted online at www.nctcog.org/video. Whenever possible, a livestream will be provided as well. | 30 days | • Information sent to public involvement contact list  
• NCTCOG publication article  
• Social media  
• Newspaper ad, including minority publications  
• News release |
Annual Listing of Obligated Projects
Federal regulations require NCTCOG to develop an annual listing of obligated projects, including investments in roadways, transit, maintenance, pedestrian walkways and bicycle transportation facilities, for which federal funds were obligated in the preceding fiscal year. NCTCOG, in consultation and coordination with the Texas Department of Transportation and public transportation agencies, compiles the information and publishes the annual listing of projects at [www.nctcog.org/annual](http://www.nctcog.org/annual).

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<tr>
<td>Publishing of Annual Listing of Obligated Projects</td>
<td>Review only at <a href="http://www.nctcog.org/annual">www.nctcog.org/annual</a></td>
<td>Not applicable</td>
<td>• Information sent to public involvement contact list</td>
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<td>• NCTCOG publication article</td>
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Congestion Management Process
The Congestion Management Process outlines lower-cost projects and programs for the effective management of transportation facilities and systems, maximizing the benefit of available resources and improving reliability of the system. A transportation system as large as Dallas-Fort Worth’s needs more than just capital improvements to run smoothly. The CMP includes quick-to-implement, low-cost strategies to better operate the system and manage travel-demand. These strategies complement costly infrastructure improvements. This plan is required of metropolitan areas with populations exceeding 200,000 people, and it is updated periodically.

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<tr>
<td>Development of the Congestion Management Process</td>
<td>One public meeting shall be held at least 30 days prior to requesting RTC approval. At a minimum, the meeting will be recorded and posted online at <a href="http://www.nctcog.org/video">www.nctcog.org/video</a>. Whenever possible, a livestream will be provided as well.</td>
<td>30 days</td>
<td>• Information sent to public involvement contact list</td>
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Environmental Studies
Whenever NCTCOG is involved in the development of environmental documents pursuant to the National Environmental Policy Act (NEPA), the public involvement requirements of implementing agencies; and when applicable, the Texas Department of Transportation Environmental Manual, will be met. During this process, NCTCOG will continuously coordinate with the implementing agency.

Additionally, as the Metropolitan Planning Organization for the Dallas-Fort Worth area, NCTCOG receives copies of draft environmental documents to make available to the public for review and comment during business hours. The comment period is determined by the agency publishing the document.
5. Public Participation Strategies

NCTCOG offers information in a variety of formats to include as many people as possible in the planning process. In today’s media and communications environment, a comprehensive approach to outreach will rely on multiple streams of information to engage people repeatedly at different times and through different media. Upon request, any NCTCOG Transportation Department information will be converted into alternative formats or languages.

Efforts to inform and gather input from the public include, but are not limited to, the following strategies.

**NCTCOG Transportation Department Website**

The internet allows NCTCOG to reach a large cross section of people at times convenient to their personal schedules. People can access NCTCOG’s web-based information 24 hours a day, seven days a week on their personal or public computer or mobile devices. Websites, email lists, online video, webinars and social media can all be used to inform, educate and dialog with people about transportation planning.

NCTCOG maintains [www.nctcog.org/trans](http://www.nctcog.org/trans), a website that provides easy access to information about the plans, programs and policies of the MPO. Following a major redesign in 2018, the website employs responsive design features and includes a calendar of events; committee activities and actions; requests for proposals, qualifications or partners; and electronic versions of plans, reports, policies and program information. The site includes a search feature that allows users to find specific documents or other information using key words, and the Google Translate widget embedded on every webpage provides an option to instantly translate information into more than 100 languages.

When information is released for public review and comment, it will be available at [www.nctcog.org/input](http://www.nctcog.org/input), which will be included on all communications announcing the public review and comment opportunity.

This site includes a Public Involvement webpage, [www.nctcog.org/trans/involve](http://www.nctcog.org/trans/involve), to provide the latest information on public meetings, media releases, public surveys and the NCTCOG Transportation Department Public Participation Plan. Public meeting presentations, handouts, schedules, flyers and minutes are made available on this site as well. Interested parties may also directly access all NCTCOG Transportation Department staff members via email, phone, fax or postal mail; contact information for all staff members is easily accessible on the website.

Finally, website visitors can easily subscribe to NCTCOG email and mailing lists and submit comments and questions. If a person does not have internet access, he or she can request staff to make items on the website available by calling 817-695-9240.

**Social Media**

The NCTCOG Transportation Department maintains a social media presence to inform North Texans about programs, projects, policies and opportunities for them to give input and be involved in the decision-making process. This currently includes the use of Facebook, Twitter, Instagram, YouTube, and Vimeo, but other social media platforms may be added in the future.
NCTCOG staff will post information on NCTCOG Transportation Department accounts and monitor and respond to questions and concerns as warranted. To reach the widest audience possible, NCTCOG also posts engaging and entertaining content that focuses on transportation and air quality issues. Additionally, staff actively seeks to build relationships with transportation partners, local governments, agencies and other groups by sharing their posts and occasionally submitting suggested social media content to cities, chambers of commerce and other organizations.

**Video**
One of several visualization techniques, video is used to increase understanding of complex transportation plans, policies and programs. Video recordings of public meetings and Regional Transportation Council meetings, including livestreams, are posted online at [www.nctcog.org/video](http://www.nctcog.org/video). Video recordings of selected other meetings and workshops are also available.

Additionally, short, informational videos are posted at [www.youtube.com/NCTCOGtrans](http://www.youtube.com/NCTCOGtrans) and may be shared on NCTCOG’s other social media accounts. As needed, video will complement materials available for public review and comment at [www.nctcog.org/input](http://www.nctcog.org/input). Depending on the length of the video, not only will it be online at [www.nctcog.org/input](http://www.nctcog.org/input), but it will also be available at [www.nctcog.org/video](http://www.nctcog.org/video) or [www.youtube.com/NCTCOGtrans](http://www.youtube.com/NCTCOGtrans).

**Print and Digital Publications**
The NCTCOG Transportation Department develops publications designed to educate the public on transportation issues and encourage their active involvement. Many of the publications are sent to the public involvement contact list and made available at public meetings, community events and Regional Transportation Council and subcommittee meetings. All are available on the NCTCOG website or by contacting NCTCOG at transinfo@nctcog.org or 817-695-9240. Upon request, any NCTCOG Transportation Department publication will be converted into alternative formats or languages. Publications include, but are not limited to:

- *Citizen’s Guide to Transportation Planning and Programming in the Dallas-Fort Worth Metropolitan Area*
- Educational pieces, such as topic-specific *Fact Sheets* and the annual state-of-the-region report
- Local Motion (a newsletter for local elected officials and transportation decision-makers)
- Metropolitan Transportation Plan Executive Summary
- *Mobility Matters* (a newsletter mailed and emailed to the public involvement list)
- Notices of public meetings, opportunities for public review and comment, workshops and open house events

Various planning documents and other publications are available upon request. Most can also be viewed via the NCTCOG website. These documents include, but are not limited to:

- Metropolitan Transportation Plan
- Transportation Improvement Program
- Congestion Management Process
- Transportation Conformity Analysis
- Technical Report Series
- Unified Planning Work Program
Environmental documents received by the Metropolitan Planning Organization are also available to the public. As the Metropolitan Planning Organization for the Dallas-Fort Worth area, NCTCOG receives copies of draft environmental documents to make available to the public for review and comment during business hours.

Finally, staff occasionally submits suggested article content to cities, chambers of commerce and other organizations for inclusion in their communications.

**Public Meetings, Workshops, Roundtables, Forums and Other Events**

For large, complex or extensive transportation planning efforts, public meetings, workshops, roundtables, conferences, forums and other events enable and foster in-depth discussion. Typically, these events are reserved for development of plans, programs and policies and significant changes to those as well as more project- or study area-specific discussions. As needed, the NCTCOG Transportation Department will host these events to gather input and build consensus among various transportation stakeholders.

To facilitate greater participation in public meetings specifically, the following criteria are considered when selecting meeting locations. These criteria also reflect Environmental Justice considerations.

- Meetings will be held in accessible locations, preferably near transit lines or routes.
- Meetings will be held in buildings that are in full compliance with the Americans with Disabilities Act of 1990.
- Presentations and supporting documentation, as needed, will be available at meetings.
- An informal meeting environment will be cultivated, allowing attendees to ask questions and submit comments.
- For meetings on a specific project, an effort will be made to hold the meeting(s) in the corridor(s) directly affected by the project.
- The NCTCOG Transportation Department will make every effort to accommodate attendees with special needs if they provide sufficient notice. Upon request, language translation, including sign and foreign language interpreters and handouts in large print or Braille, will be available. Additionally, staff will make every effort to accommodate requests from persons with disabilities. A minimum of three days advance notice is required for these arrangements to be provided as outlined in the Language Assistance Plan in Appendix B. Public meeting notices will provide the telephone number and email address to request special arrangements.
- At a minimum, meetings will be audio taped. Video recording and livestreaming, however, are increasingly offered, and these recordings are subsequently posted to the website.

The NCTCOG Transportation Department will, on occasion, provide other informational items at public meetings. Any additional information or materials may be requested at public meetings, and NCTCOG can assure that information is mailed upon request.

All public meeting notices are sent to selected newspapers, including minority publications, as necessary, to ensure regional coverage. Staff coordinates with non-English newspapers to provide translated notices to their readers. All public meetings are posted on the Texas Register website as part of the Open Meetings requirement. Public meeting notices are mailed to public libraries and city and county offices for posting. Additionally, notices are mailed and emailed to
individuals, elected officials, transportation partners and organizations on the public involvement contact list, which is constantly growing. To be included, individuals may subscribe at meetings and events, on the website or by contacting NCTCOG. Staff coordinates with public information officers of the cities in which meetings are scheduled to request assistance in posting information, often on the city cable television channel, websites and social media accounts.

Community Events
In an effort to educate the public and increase public awareness of transportation plans and programs, NCTCOG distributes information and engages in discussion at a variety of community events throughout the year such as events organized by local governments and school districts, Earth Day celebrations, bike rallies, etc. To request NCTCOG’s participation in an event or for more information, email transinfo@nctcog.org or call 817-695-9240.

Mail and Email
The public involvement mail and email lists are the most direct forms of communication used by NCTCOG to inform and engage the public and partners. Together, they represent a comprehensive way to reach member governments, state agencies, neighborhood associations, civic organizations, transportation advocacy groups, social service organizations, freight companies, transit providers, chambers of commerce (including minority chambers), houses of worship, representatives of tribal governments and individuals.

Individuals receive public meeting notices, information about public review and comment opportunities, announcements of workshops or open houses, educational brochures, newsletters, and other material suitable for mass mailings.

The lists are continually maintained and expanded based on sign-up sheets at public meetings and community events, requests sent through the NCTCOG Transportation Department website (an online form is available for submission), returned mail, and requests for additions and deletions from various other sources.

Advertising
Paid advertising is used to announce public meetings, opportunities for public review and comment and other initiatives. Fixing America’s Surface Transportation (FAST Act) and the U.S. Code of Federal Regulations emphasize the importance of public involvement, including public meetings and the opportunity for public comment, in the transportation planning process and require adequate notice be given to the public of these activities. As such, paid advertising complements other outreach and communications efforts. Ads are placed in select newspapers, including minority publications, to ensure regional coverage. Online advertising, including on Facebook, may be used to complement traditional print advertising.

Shareable Content
Staff will seek to develop connections and partnerships with a wide range of outreach professionals, business and community groups, jurisdictions and agencies to extend the reach of messaging about transportation and air quality issues and opportunities for public input. NCTCOG committee members and community leaders are encouraged to share information to reach wider and more diverse audiences and help involve new audiences in the planning process.
Speaking Opportunities
Staff often presents to organizations and groups such as neighborhood associations, Kiwanis and Rotary groups, chambers of commerce, professional associations, universities, schools, businesses and nonprofits, among others. Presentations provide staff with the opportunity to build relationships with organizations and involve them more actively in the planning process. To schedule a speaker or for more information, visit www.nctcog.org/speakers or call 817-695-9240.

Media Relations
Proactive media outreach efforts include distributing news releases on major projects and programs and opportunities for public input to more than 240 reporters at local media outlets and community news sources, including minority news media. The extensive media list includes all major local television stations and newspapers as well as several radio stations. The media contact list is continuously updated, and staff are committed to coordinating with local editors and news directors to provide timely and accurate information. Staff participates in interviews with local and national print, radio and television media. The goal of furthering these relationships with local media is to foster greater public awareness and understanding among Dallas-Fort Worth area residents regarding transportation issues. NCTCOG posts all of its news releases on its website in an online newsroom that is accessible to the public.

Visualization
Maps, charts, diagrams, illustrations, photographs, infographics, video and the use of color are used to visualize ideas, concepts, plans, projects and programs. Visualization elements are integrated in presentations, publications, website and social media content.

Surveys and Keypad Polling
The NCTCOG Transportation Department may conduct print and/or electronic surveys to determine public awareness and/or sentiment with regard to certain planning issues. Surveys may be relatively small endeavors designed to shed light on a single issue, or may be related to large-scale planning endeavors.

Similar to a survey, keypad polling is another opportunity to gather input on community preferences and priorities. Polling questions can be integrated into a presentation and attendees respond with keypads provided by NCTCOG. Results can be immediately shown in the presentation or captured and reviewed later.

Stakeholder Interviews
Meetings with regional transportation stakeholders, such as community and business leaders, nonprofit organization representatives and other individuals helps staff understand local communities. For example, information about the most effective communications and outreach strategies for a particular area or group of people helps staff to engage more and increasingly diverse groups of people in the transportation planning process.

Telephone Town Halls
The NCTCOG Transportation Department will host telephone town hall discussions as needed. Telephone town halls are announced through NCTCOG Transportation Department communications, and interested individuals can sign up in advance to participate. The format is similar to a radio show, except participants listen in from their landline or mobile phones. Staff provides information on a topic and callers can respond with their questions or comments.
Polling can be integrated into the discussion, as relevant. An audio recording is then posted online and shared with members of the public who were not able to participate.

**Community Networks**

The population of the Dallas-Fort Worth area is 7.3 million people and growing, and regional demographics are ethnically, linguistically and economically diverse. Therefore, in an effort to reach as many people as possible, staff is increasingly seeking to engage people of influence who are willing to use their connections in their communities to help raise awareness of NCTCOG; share information and notices about plans, programs and projects; facilitate meetings and organize events that allow NCTCOG to interact directly with community members and groups; highlight NCTCOG on social media; and publicize NCTCOG meetings and events. By cultivating a network of key individuals and organizations, NCTCOG will leverage existing community networks to provide information to the widest possible audience, including groups traditionally underrepresented in the transportation and air quality planning process.

In the coming years, NCTCOG is planning to initiate a grant-funded community-based organization (CBO) pilot program through a Request for Partners or similar initiative. In the program, NCTCOG will engage local CBOs to carry out public involvement activities related to transportation issues; possible activities could include surveys, community events or focus groups. The CBOs will then facilitate interactions between NCTCOG and community members and provide NCTCOG with data and information related to their contracted public involvement activities. The program’s goal is to help NCTCOG access community networks by opening doors to engage individuals in communities that have been traditionally underrepresented in its public involvement process.
6. Evaluation of Public Participation

The NCTCOG Transportation Department will regularly evaluate its measurable public participation strategies to help determine whether the Public Participation Plan is achieving desired outcomes for public involvement in the transportation and air quality planning process. Performance metrics and reporting for public participation utilize both quantitative and qualitative measures to tell the story of how public involvement is informing the planning process and helping meet goals for public involvement. Other public participation strategies are also reviewed, evaluated and discussed in the context of the measurable strategies, the desired outcomes of the Public Participation Plan and the goals for NCTCOG’s public involvement process, more generally.

Evaluation helps staff understand how to better engage the public and more effectively allocate time and resources. In addition, staff will produce reports for the public that clearly explain and illustrate how public participation strategies are working toward the desired outcomes NCTCOG has identified for its public involvement processes. Evaluation of these strategies and the overall Public Participation Plan is ongoing, and efforts improve communication with the public.

The table on the following pages outlines the measurable public participation strategies, the performance metrics and reporting data for each, and desired outcomes for public participation.

Evaluation of Project-Specific Outreach

Some or all of the strategies outlined in the Public Participation Plan may be used for project-specific outreach, and the corresponding evaluation criteria and outcomes apply. Additional outcomes, however, may also be established to complement measurable public involvement goals for public involvement specific to each project. At the beginning of a project requiring public involvement, staff will outline strategies and expected outcomes so the public knows what to expect from the process. The results of the public involvement process for each project are communicated throughout the project and documented in final reports as applicable.
## Evaluation Matrix for Public Participation Strategies

<table>
<thead>
<tr>
<th>Outreach Strategy</th>
<th>Performance Metrics and Reporting</th>
<th>Desired Outcomes</th>
</tr>
</thead>
<tbody>
<tr>
<td>NCTCOG Transportation Department Website</td>
<td>Total number of visits</td>
<td>Identification of trends and changes for website usage</td>
</tr>
<tr>
<td></td>
<td>Number of unique visitors</td>
<td>Prioritization of and increased accessibility of information and public input opportunities</td>
</tr>
<tr>
<td></td>
<td>Webpages with most visits</td>
<td>Refined use of metadata to drive traffic</td>
</tr>
<tr>
<td></td>
<td>Average time spent on significant webpages</td>
<td></td>
</tr>
<tr>
<td></td>
<td>Top referring websites/sources of web traffic</td>
<td></td>
</tr>
<tr>
<td></td>
<td>Most common search terms</td>
<td></td>
</tr>
<tr>
<td>Social Media and Video</td>
<td><strong>Facebook</strong></td>
<td>Broad distribution of information and public input opportunities through engaging, shareable content and personalized interactions</td>
</tr>
<tr>
<td></td>
<td>Number of total page likes</td>
<td>Increased feedback and public input</td>
</tr>
<tr>
<td></td>
<td>Total reach</td>
<td>Development of an engaged online base of followers that helps disseminate information and public input opportunities</td>
</tr>
<tr>
<td></td>
<td>Average engagement rate per post</td>
<td></td>
</tr>
<tr>
<td></td>
<td><strong>Twitter</strong></td>
<td></td>
</tr>
<tr>
<td></td>
<td>Number of followers</td>
<td></td>
</tr>
<tr>
<td></td>
<td>Total number of impressions</td>
<td></td>
</tr>
<tr>
<td></td>
<td>Total number of engagements</td>
<td></td>
</tr>
<tr>
<td></td>
<td>Average engagement rate per post</td>
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<tr>
<td></td>
<td><strong>YouTube</strong></td>
<td></td>
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<tr>
<td></td>
<td>Number of subscribers</td>
<td></td>
</tr>
<tr>
<td></td>
<td>Number of views</td>
<td></td>
</tr>
<tr>
<td></td>
<td>Estimated minutes watched</td>
<td></td>
</tr>
<tr>
<td>Print and Digital Publications</td>
<td>Available publication formats</td>
<td>Information in multiple formats accessible to all communities in the region</td>
</tr>
<tr>
<td></td>
<td>Number of print copies of each publication distributed</td>
<td>Informed understanding of planning process</td>
</tr>
<tr>
<td></td>
<td>Number of unique views for each publication</td>
<td>Sustained awareness of public input opportunities</td>
</tr>
<tr>
<td>Outreach Strategy</td>
<td>Performance Metrics and Reporting</td>
<td>Desired Outcomes</td>
</tr>
<tr>
<td>----------------------------------</td>
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<td>--------------------------------------------------------------------------------------------------------------------------------------------------</td>
</tr>
</tbody>
</table>
| Public Meetings and Community Events | *Public Meetings*  
Number of public meetings  
Number of online public input opportunities  
Average attendance per meeting  
Average online viewers per meeting and online public input opportunity  
Accessible locations for individuals with disabilities  
Regional accessibility of information  
Notification of how to request language translation or special accommodations  
*Public Contacts*  
Number of contacts receiving public meeting notifications  
Net change in number of contacts for the year  
*Public Meeting Advertising*  
Ad placements  
Average reach for each Facebook ad  
Average engagement for each Facebook ad  
*Community Events*  
Number of events attended by staff  
Number of events distributing NCTCOG Transportation Department information  
Total estimated attendance for all events  
Geographic representation in event locations | Information about policies, programs and projects accessible in multiple formats to all communities throughout the region  
Greater awareness of policies, programs and projects  
Timely notification through multiple strategies about opportunities to provide input and engage with staff  
Increased feedback and public input  
Planned opportunities for the public to interact directly with staff  
Increased accessibility of staff to communities and partners  
Transparency in public involvement efforts and the planning process |
<table>
<thead>
<tr>
<th>Outreach Strategy</th>
<th>Performance Metrics and Reporting</th>
<th>Desired Outcomes</th>
</tr>
</thead>
<tbody>
<tr>
<td>Public Comments</td>
<td>Total number of comments received</td>
<td>Transparency in public involvement efforts and the planning process</td>
</tr>
<tr>
<td></td>
<td>Number of comments from meetings and events</td>
<td>Identification of trends and changes in public attention and concerns</td>
</tr>
<tr>
<td></td>
<td>Number of comments from email</td>
<td></td>
</tr>
<tr>
<td></td>
<td>Number of comments from social media</td>
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<tr>
<td></td>
<td>Number of comments received via other modes</td>
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<tr>
<td></td>
<td>Most common comment topics</td>
<td></td>
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<tr>
<td>Speaking Opportunities</td>
<td>Number of presentation requests</td>
<td>Increased awareness of the planning process and specific plans, programs and projects</td>
</tr>
<tr>
<td></td>
<td>Number of presentations</td>
<td>Increased accessibility of staff to communities and partners</td>
</tr>
<tr>
<td></td>
<td>Number of people reached</td>
<td>Greater participation by communities and organizations in the planning process</td>
</tr>
<tr>
<td></td>
<td>Types of audiences/groups reached</td>
<td></td>
</tr>
<tr>
<td></td>
<td>Types of presentation topics</td>
<td></td>
</tr>
<tr>
<td>Shareable Content</td>
<td>Number of partners that shared content</td>
<td>Strong relationships with partner organizations willing to help disseminate information to the public through multiple channels</td>
</tr>
<tr>
<td></td>
<td>Type of partners that shared content</td>
<td>Extended reach of messaging about transportation, air quality and public input opportunities</td>
</tr>
<tr>
<td></td>
<td>Type of content shared by partners</td>
<td>Increased connections with communities not actively involved in the planning process</td>
</tr>
<tr>
<td></td>
<td>New audiences reached through partners</td>
<td></td>
</tr>
<tr>
<td>Media Relations</td>
<td>Number of news releases</td>
<td>Transparency in public involvement efforts and the planning process</td>
</tr>
<tr>
<td></td>
<td>Number of media requests</td>
<td>Proactive media relations to communicate public input opportunities, policies and programs</td>
</tr>
<tr>
<td></td>
<td>Number of media mentions</td>
<td>Diverse list of media contacts to keep the public broadly informed</td>
</tr>
<tr>
<td></td>
<td><em>Media Contacts List</em></td>
<td>Understanding of local, regional, statewide and national media coverage of transportation and air quality issues</td>
</tr>
<tr>
<td></td>
<td>Types of news sources</td>
<td>Understanding of the NCTCOG Transportation Department’s public image</td>
</tr>
<tr>
<td></td>
<td>Number of news outlets</td>
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<tr>
<td></td>
<td>Number of minority news outlets</td>
<td></td>
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<tr>
<td></td>
<td>Number of news outlets in each county</td>
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</tr>
<tr>
<td></td>
<td>Number of reporters</td>
<td></td>
</tr>
</tbody>
</table>
Appendix A: Laws and Legislation Relevant to Public Participation

Federal Legislation and Executive Orders

Fixing America’s Surface Transportation (FAST) Act
The FAST Act, the most recent federal transportation legislation, and the associated implementing regulations emphasize the importance of public involvement and contain specific language outlining requirements for public participation processes and procedures. In general, FAST Act legislation and regulations maintained requirements of previous transportation legislation (ISTEA, TEA-21, SAFETEA-LU and MAP-21) and did not establish any new requirements. Notably, the FAST Act did add a requirement to provide a reasonable opportunity for public ports and specific types of private providers of transportation to be involved in the metropolitan transportation planning process.

Elements of the Public Participation Plan that specifically respond to requirements:

- Notices of public input opportunities, including public meetings, will be sent to newspapers to ensure regional coverage. Translated notices will also be sent to non-English newspapers. Notification is also sent to local libraries, city halls, county court houses, chambers of commerce (including minority chambers) and representatives of tribal governments. NCTCOG will maintain a comprehensive contact list of individuals and organizations that wish to be notified of all public input opportunities as well as stakeholders outlined in federal requirements.

- Information is disseminated through NCTCOG’s publications, reports, public meetings and other outreach events, the NCTCOG website, social media pages, local media sources and open meetings.

- To the maximum extent possible, NCTCOG will employ visualization techniques such as maps, charts, graphs, photos and computer simulation in its public involvement activities.

- Reports, plans, publications, recent presentations and other information are available on the NCTCOG website. Public comments may also be submitted on the NCTCOG Transportation Department website and via email and social media. Interested parties may subscribe to receive topic specific email correspondence. Additional web-related communication tools are evaluated continuously for implementation.

- Public meetings are held in diverse locations throughout the region, accessible to individuals with disabilities, preferably near transit lines or routes, at both day and evening times. Public meetings are recorded and archived on the NCTCOG website; when multiple public meetings are held on the same topic(s), at least one meeting in the series is recorded and archived on the NCTCOG website. In addition, public meeting materials and summaries are archived online and hard copies can be mailed upon request.

- Public meetings will be held during development of the Transportation Improvement Program (TIP), Metropolitan Transportation Plan (MTP) and Unified Planning Work Program. There are also online public input opportunities. All public comments will be reviewed and considered by the Regional Transportation Council and standing technical, policy and strategic committees. Public comments received on the TIP and the MTP shall be...
included in documentation of the TIP and the MTP or by reference to the public meeting minutes (for the TIP) or Transportation Conformity documentation (for the MTP).

- If the final TIP or MTP significantly differs from the draft made available for public review and public comment and raises new material issues that interested parties could not reasonably have foreseen from the public involvement efforts, an additional opportunity for public comment will be provided. Recommendations presented during public comment periods are understood to be contingent upon the outcomes of the public involvement processes for these plans; therefore, it is understood that the final TIP or MTP may reflect changes resulting from the outcome of these processes. In addition, when NCTCOG can reasonably foresee alternative outcomes based on circumstances or events coincident with its public involvement processes for these plans, NCTCOG may present alternative recommendations for public comment alongside its final recommendations; in this case, it will be understood that decisions about these recommendations are contingent upon both the public involvement process and the resolution of these circumstances or events.

- When possible, public meetings will be coordinated with the Texas Department of Transportation.

- NCTCOG regularly reviews its Transportation Public Participation Plan. If modified in a more restrictive fashion, a 45-day comment period will be held following the public meetings at which proposed revisions are discussed.

23 CFR §450.316 Interested parties, participation, and consultation.

(a) The MPO shall develop and use a documented participation plan that defines a process for providing individuals, affected public agencies, representatives of public transportation employees, public ports, freight shippers, providers of freight transportation services, private providers of transportation (including intercity bus operators, employer-based commuting programs, such as carpool program, vanpool program, transit benefit program, parking cash-out program, shuttle program, or telework program), representatives of users of public transportation, representatives of users of pedestrian walkways and bicycle transportation facilities, representatives of the disabled, and other interested parties with reasonable opportunities to be involved in the metropolitan transportation planning process.

(1) The MPO shall develop the participation plan in consultation with all interested parties and shall, at a minimum, describe explicit procedures, strategies, and desired outcomes for:

   (i) Providing adequate public notice of public participation activities and time for public review and comment at key decision points, including a reasonable opportunity to comment on the proposed metropolitan transportation plan and the TIP;

   (ii) Providing timely notice and reasonable access to information about transportation issues and processes;

   (iii) Employing visualization techniques to describe metropolitan transportation plans and TIPs;

   (iv) Making public information (technical information and meeting notices) available in electronically accessible formats and means, such as the World Wide Web;
(v) Holding any public meetings at convenient and accessible locations and times;

(vi) Demonstrating explicit consideration and response to public input received during the development of the metropolitan transportation plan and the TIP;

(vii) Seeking out and considering the needs of those traditionally underserved by existing transportation systems, such as low-income and minority households, who may face challenges accessing employment and other services;

(viii) Providing an additional opportunity for public comment, if the final metropolitan transportation plan or TIP differs significantly from the version that was made available for public comment by the MPO and raises new material issues that interested parties could not reasonably have foreseen from the public involvement efforts;

(ix) Coordinating with the statewide transportation planning public involvement and consultation processes under subpart B of this part; and

(x) Periodically reviewing the effectiveness of the procedures and strategies contained in the participation plan to ensure a full and open participation process.

(2) When significant written and oral comments are received on the draft metropolitan transportation plan and TIP (including the financial plans) as a result of the participation process in this section or the interagency consultation process required under the EPA transportation conformity regulations (40 CFR part 93, subpart A), a summary, analysis, and report on the disposition of comments shall be made as part of the final metropolitan transportation plan and TIP.

(3) A minimum public comment period of 45 calendar days shall be provided before the initial or revised participation plan is adopted by the MPO. Copies of the approved participation plan shall be provided to the FHWA and the FTA for informational purposes and shall be posted on the World Wide Web, to the maximum extent practicable.

(b) In developing metropolitan transportation plans and TIPs, the MPO should consult with agencies and officials responsible for other planning activities within the MPA that are affected by transportation (including State and local planned growth, economic development, tourism, natural disaster risk reduction, environmental protection, airport operations, or freight movements) or coordinate its planning process (to the maximum extent practicable) with such planning activities. In addition, the MPO shall develop the metropolitan transportation plans and TIPs with due consideration of other related planning activities within the metropolitan area, and the process shall provide for the design and delivery of transportation services within the area that are provided by:

(1) Recipients of assistance under title 49 U.S.C. Chapter 53;
(2) Governmental agencies and non-profit organizations (including representatives of the agencies and organizations) that receive Federal assistance from a source other than the U.S. Department of Transportation to provide non-emergency transportation services; and

(3) Recipients of assistance under 23 U.S.C. 201-204.

(c) When the MPA includes Indian Tribal lands, the MPO shall appropriately involve the Indian Tribal government(s) in the development of the metropolitan transportation plan and the TIP.

(d) When the MPA includes Federal public lands, the MPO shall appropriately involve the Federal land management agencies in the development of the metropolitan transportation plan and the TIP.

(e) MPOs shall, to the extent practicable, develop a documented process(es) that outlines roles, responsibilities, and key decision points for consulting with other governments and agencies, as defined in paragraphs (b), (c), and (d) of this section, which may be included in the agreement(s) developed under §450.314.

Title VI of the Civil Rights Act of 1964: Nondiscrimination in Federally Assisted Programs
Title VI states that no person is excluded from participation in, denied the benefit of, or subjected to discrimination under any program or activity receiving federal financial assistance on the basis of race, color, national origin, age, sex, disability, or religion. Title VI prohibits discrimination: whether intentional or where the unintended effect is unduly burdensome.

Title VI Complaint Procedures (Appendix D) outline the NCTCOG Title VI policy, how an individual may submit a complaint, how the complaint will be investigated and potential resolution scenarios.

Executive Order 12898: Federal Actions to Address Environmental Justice in Minority and Low-Income Populations
In response to Executive Order 12898: Federal Actions to Address Environmental Justice in Minority and Low-Income Populations, NCTCOG’s policy reflects that no segment of the region should, because of race, economic makeup, age, sex, or disability, bear a disproportionate share of the adverse human health or environmental effects, including social and economic effects, of its programs, policies and activities or be denied equal access to environmental benefits. Other fundamental concepts of Environmental Justice included in NCTCOG’s policy are to ensure the full and fair participation by all potentially affected communities in the transportation decision-making process; and to prevent the denial of, reduction in, or significant delay in receipt of benefits by minority and low-income populations.

NCTCOG addresses Environmental Justice concerns throughout the transportation planning process, and it is the responsibility of all staff to consider the needs of traditionally underserved communities during planning, project selection and project implementation. As the Public Participation Plan is implemented, special consideration is given to ensure all residents have reasonable access to information and opportunities to give input. Demographic data is analyzed to identify areas having considerable numbers of protected populations, and this can be used for public meeting location and outreach event selection as well as identification of need for more targeted or diverse outreach efforts.
Executive Order 13166: Improving Access to Service for Persons with Limited English Proficiency

In 2000, President William J. Clinton signed Executive Order 13166: Improving Access to Services for Persons with Limited English Proficiency. The order provided clarification of Title VI in the Civil Rights Act of 1964, stating that recipients of federal funds must “ensure that the programs and activities they normally provide in English are accessible to LEP persons and thus do not discriminate on the basis of national origin.”

The order also required federal agencies and recipients of federal financial assistance to examine the services they provide and develop an implementation plan to provide meaningful access to LEP persons.

Guidance from the Federal Highway Administration, Federal Transit Administration and the Texas Department of Transportation stresses the importance of reducing language barriers that can prevent meaningful access by LEP persons to important services. NCTCOG values public involvement and feedback and encourages participation by all communities.

To ensure all communities have meaningful access to information and opportunities to participate in the planning process, the NCTCOG Transportation Department analyzes department activities and demographic information for the region in order to:

- Identify LEP persons who need language assistance and determine how these individuals are served or likely to be served by NCTCOG Transportation Department programs.
- Outline how language assistance will be available.
- Train staff for considering the needs of and interacting with LEP persons.
- Provide notice to LEP persons.
- Monitor and update plans and strategies that address how LEP individuals have access to information and opportunities for program participation.

Because transportation planning and services provided by NCTCOG can be both a benefit and a burden to economic development, employment, housing, education, healthcare and social opportunities, NCTCOG staff is dedicated to assessing the location and needs of LEP communities and consequently, the services NCTCOG provides to these communities.

A Language Assistance Plan (LAP) in Appendix B outlines NCTCOG’s efforts to make information available to limited English proficient (LEP) persons. According to U.S. Department of Transportation Guidelines, a four-factor analysis is used to evaluate the extent to which language assistance measures are required to ensure meaningful access to LEP persons.

The four-factor analysis considers:

1. The number or proportion of LEP persons eligible to be served or likely to be encountered by a program, activity or service.
2. The frequency with which LEP individuals come in contact with the program.
3. The nature and importance of the program, activity or service provided by the federal-funding recipient to people’s lives.
4. Resources available to federal-funding recipients and costs of language assistance.
The LAP outlines demographic information, analysis of Department activities, language assistance provided and communication to LEP persons about the availability of language assistance.
Appendix B: Language Assistance Plan (Updated June 2018)

The North Central Texas Council of Governments (NCTCOG) is committed to incorporating environmental justice elements and Title VI considerations into the public participation process for transportation planning. Input and involvement from populations that have been traditionally underserved by existing transportation systems including, but not limited to, low-income and minority households, are sought out and their needs considered. Various communication strategies and information formats seek to make information easily accessible and understandable.

Title VI states that no person shall be excluded from participation in, denied the benefit of, or subjected to discrimination under any program or activity receiving federal financial assistance on the basis of race, color, national origin, age, sex, disability, or religion. Title VI prohibits discrimination whether intentional or where the unintended effect is unduly burdensome. The North Central Texas Council of Governments Transportation Department Title VI Complaint Procedures (Appendix D) establishes a procedure under which complaints alleging discrimination in NCTCOG’s provisions, services, or NCTCOG activities can be made by persons who are not employees of NCTCOG.

The U.S. Department of Transportation defines Limited English Proficiency (LEP) as persons who do not speak English as their primary language and who have limited ability to read, write, speak, or understand English.

Executive Order 13166

In 2000, President William J. Clinton signed Executive Order 13166 “Improving Access to Services for Persons with Limited English Proficiency.” The order provided clarification of Title VI in the Civil Rights Act of 1964, stating that recipients of federal funds must “ensure that the programs and activities they normally provide in English are accessible to LEP persons and thus do not discriminate on the basis of national origin.”

The order also required federal agencies and recipients of federal financial assistance to examine the services they provide and develop an implementation plan to provide meaningful access to LEP persons.

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- Outline how language assistance will be available.
- Train staff to interact with and consider the needs of LEP persons.
- Provide notice to LEP persons.
• Monitor and update plans and strategies that address how LEP individuals have access to information and opportunities for program participation.

Because transportation planning and services provided by NCTCOG can be both a benefit and a burden to economic development, employment, housing, education, healthcare and social opportunities, NCTCOG staff is dedicated to assessing the location and needs of LEP communities and, consequently, the services NCTCOG provides to these communities.

Identification of LEP Populations and Determination of How These Individuals Are Served or Likely to be Served by NCTCOG Transportation Department Programs

The U.S. Department of Transportation issued Policy Guidance to federal financial assistance recipients regarding Title VI prohibition against national origin discrimination affecting LEP persons. In this guidance, the U.S. Department of Transportation provided the four-factor analysis as an approach to evaluate the extent to which language assistance measures are required to ensure meaningful access to LEP persons.

Factor 1: The number or proportion of LEP persons eligible to be served or likely to be encountered by a program, activity, or service of the recipient grantee.

The Metropolitan Planning Area boundary encompasses 12 counties (Collin, Dallas, Denton, Ellis, Hood, Hunt, Johnson, Kaufman, Parker, Rockwall, Tarrant and Wise).
Data for the 12-county Metropolitan Planning Area was gathered using the 2006-2010 and 2012-2016 American Community Survey datasets. LEP persons were classified as anyone over the age of five who described their ability to speak English as less than 'very well' (i.e. 'well,' 'not well,' or 'not at all'). Due to recent changes in the Census Bureau's coding of language data, it is not possible to compare language groups between the two datasets. The aggregate LEP population increased by 14.9% between 2010 and 2016.

In 2010, the American Community Survey estimated population over age five was 5,698,467 for the 12-county region. The total LEP population was 765,371, approximately 13.4 percent of the total population over age five. In 2016, the LEP population was 879,120, 13.6% of the region’s 6,446,768 residents over the age of five. In 2016, Spanish was the largest language represented among the LEP population, with 10.8% percent of the total population over age five. Asian and Pacific Island languages were the second largest group among the LEP population, comprising 1.7 percent of the total population over age five. LEP individuals speaking other Indo-European languages or other languages respectively comprised 0.8 percent and 0.4 percent of the total population over age five.
<table>
<thead>
<tr>
<th>Total Metropolitan Planning Area (MPA) Population Over 5</th>
<th>Total MPA LEP Population</th>
<th>% LEP of Total Population</th>
<th>Total MPA Spanish LEP Population</th>
<th>% Spanish LEP of Total Population</th>
<th>Total MPA Asian and Pacific Island Languages LEP Population*</th>
<th>% Asian and Pacific Island Languages LEP of Total Population</th>
<th>Total MPA Other Indo-European Languages LEP Population</th>
<th>% Other Indo-European Languages LEP of Total Population</th>
<th>Total MPA Other Languages LEP Population</th>
<th>% Other Languages LEP of Total Population</th>
</tr>
</thead>
<tbody>
<tr>
<td>2006-2010 American Community Survey</td>
<td>5,698,467</td>
<td>765,371</td>
<td>13.4%</td>
<td>624,880</td>
<td>11.0%</td>
<td>89,868</td>
<td>1.6%</td>
<td>35,731</td>
<td>0.6%</td>
<td>14,892</td>
</tr>
<tr>
<td>2012-2016 American Community Survey</td>
<td>6,446,768</td>
<td>879,120</td>
<td>13.6%</td>
<td>694,804</td>
<td>10.8%</td>
<td>109,511</td>
<td>1.7%</td>
<td>50,426</td>
<td>0.8%</td>
<td>24,379</td>
</tr>
</tbody>
</table>

Source: 2006-2010 and 2012-2016 American Community Survey; www.census.gov

Limited English Proficiency (LEP) is classified as any person whose primary language is other than English and answered that their ability to speak English was "well," "not well," and "not at all."

The Dallas-Fort Worth Metropolitan Planning Area consists of; Collin, Dallas, Denton, Ellis, Hood, Hunt, Johnson, Kaufman, Parker, Rockwall, Tarrant and Wise counties.

In 2016, the US Census Bureau changed the way that it codes language data. Consequently, language groupings cannot be compared between the 2006-2010 and 2012-2016 American Community Surveys.

*LEP Asian Languages for 2010 include: Vietnamese (0.58%), Chinese (0.33%), Korean (0.24%), Other Asian Languages (0.14%), Laotian (0.07%), Tagalog (0.06%), Thai (0.04%), Mon-Khmer, Cambodian (0.04%), Japanese (0.04%), Other Pacific Island Languages (0.02%) and Hmong (0.002%).

LEP Asian Languages for 2016 include: Vietnamese (0.64%), Other Asian and Pacific Island Languages (0.41%), Chinese (including Mandarin, Cantonese) (0.36%), Korean (0.21%), and Tagalog (including Filipino) (0.08%).
Recognizing that low literacy could also result in Limited English Proficiency, data from the U.S. Department of Education, Institute of Education Sciences, National Center for Education Statistics, 2003 National Assessment of Adult Literacy was analyzed. The study used population estimates for persons 16 years and older as of 2003. Individuals determined to lack basic literacy skills either scored below basic in prose or could not be tested due to language barriers.

The study found that 19 percent of the statewide population lacked basic literacy skills. Within the 12-county area, 21 percent of the Dallas County population lacked basic literacy skills. Dallas County was the only county in the region above the state percentage.

<table>
<thead>
<tr>
<th>Location</th>
<th>Population Size</th>
<th>Percent Lacking Basic Literacy Skills</th>
</tr>
</thead>
<tbody>
<tr>
<td>Texas</td>
<td>15,936,279</td>
<td>19%</td>
</tr>
<tr>
<td>Collin County</td>
<td>437,018</td>
<td>8%</td>
</tr>
<tr>
<td>Dallas County</td>
<td>1,650,735</td>
<td>21%</td>
</tr>
<tr>
<td>Denton County</td>
<td>371,897</td>
<td>8%</td>
</tr>
<tr>
<td>Ellis County</td>
<td>90,668</td>
<td>13%</td>
</tr>
<tr>
<td>Hood County</td>
<td>35,299</td>
<td>9%</td>
</tr>
<tr>
<td>Hunt County</td>
<td>60,001</td>
<td>13%</td>
</tr>
<tr>
<td>Johnson County</td>
<td>102,672</td>
<td>12%</td>
</tr>
<tr>
<td>Kaufman County</td>
<td>60,172</td>
<td>14%</td>
</tr>
<tr>
<td>Parker County</td>
<td>72,454</td>
<td>9%</td>
</tr>
<tr>
<td>Rockwall County</td>
<td>40,168</td>
<td>8%</td>
</tr>
<tr>
<td>Tarrant County</td>
<td>1,130,374</td>
<td>14%</td>
</tr>
<tr>
<td>Wise County</td>
<td>40,253</td>
<td>12%</td>
</tr>
</tbody>
</table>

1 Estimated population size of persons 16 years and older in households in 2003.
2 Those lacking basic prose literacy skills include those who scored Below Basic in prose and those who could not be tested due to language barriers.


This Language Assistance Plan outlines how the needs of the LEP population in the service area will be addressed, how language services will be made available, and how LEP persons will be notified of these services.

**Factor 2: The frequency with which LEP individuals come in contact with the program.**

The nature of the programs associated with the Metropolitan Planning Organization dictate that the majority of contact with the public and LEP persons is through inquiries submitted to the MPO, public meetings, public outreach events, the MPO website, and program implementation activities.

In order to better inform the frequency with which LEP individuals come in contact with MPO programs, a staff survey of LEP encounters was conducted in 2011. Department staff members were asked if they had encountered an LEP individual in the past six months, and if so, what
languages they had encountered, the frequency, and what type of work activity they were conducting. Of the 134 department staff members surveyed, 18 indicated that they encountered LEP individuals speaking six total languages in a period of six months. Spanish was the most common, followed by rare encounters of Vietnamese, Hindi, Arabic, Chinese and unspecified languages. The most frequent work activities in which staff encountered LEP individuals were phone calls and public meetings. The majority of interactions were related to the AirCheckTexas Drive a Clean Machine vehicle repair and replacement assistance program, a state-funded initiative to reduce ozone-causing emissions from high-polluting vehicles.

As a result of this survey, NCTCOG maintains a voluntary directory of employees who are able to communicate in languages other than English and are willing to provide assistance to LEP individuals. If an employee encounters a LEP individual with whom it is difficult to communicate, they may be able to refer the individual to an employee who can better assist them in another language. At present, 14 languages are represented in this language assistance directory.

Factor 3: The nature and importance of the program, activity or service provided by the recipient to people’s lives.

NCTCOG is the agency responsible for the regional transportation planning process; in this capacity, NCTCOG must ensure that all segments of the population are involved or have the opportunity to be involved in the decision making process. As required by federal guidelines, NCTCOG produces a Metropolitan Transportation Plan that outlines long-range transportation investments, a Transportation Improvement Program (TIP) that provides short-range planning for transportation investments, a Unified Planning Work Program (UPWP) that outlines tasks to be performed in the upcoming year and a Congestion Management Process for developing and implementing operational and travel-demand strategies that improve transportation system performance.

Consistent with the Public Participation Plan, planners seek public input on these products, which influence quality of life and mobility options in the region. Public meetings represent one way for North Texans to be informed and involved. Public meeting notices include the telephone number and email address to request special accommodations for language translation or disability. On each notice, this information is provided in English and Spanish. Public meetings are advertised in newspapers, and staff interact regularly with local reporters, some of whom contribute to minority publications. Translated ads are placed in the major Spanish newspapers.

Additionally, 10 North Texas counties, Collin, Dallas, Denton, Ellis, Johnson, Kaufman, Parker, Rockwall, Tarrant and Wise, are classified by the U.S. Environmental Protection Agency as moderate nonattainment for the 2008 8-hour ozone National Ambient Air Quality Standards (NAAQS). On April 30, 2018, EPA designated nine of these counties (excluding Rockwall) as marginal nonattainment for the 2015 8-hour ozone NAAQS. MPO transportation plans must show transportation conformity and comply with rules established by the Clean Air Act Amendments of 1990. Therefore, NCTCOG is also responsible for developing and implementing plans, policies, and programs to reduce transportation-related emissions that lead to ozone formation.

Based on the LEP Interaction Survey described in Factor 2, staff encounters most LEP individuals through the AirCheckTexas program. This state program offers financial assistance to individuals who meet income requirements and wish to make emissions-related repairs or replace older, high-polluting vehicles. It allows local residents to contribute to the regional air quality solution. The AirCheckTexas program team currently employs bilingual staff to assist
Spanish speakers that are LEP, and program applications are available in both Spanish and Vietnamese. Additionally, web content and other materials for public awareness campaigns are available in English and Spanish.

Factor 4: The resources available to the recipient and costs.

NCTCOG currently has available, if needed, bilingual staff who can assist with translation needs and/or translation review. NCTCOG also has agreements with translation services that cover many languages, as well as American Sign Language. Since 2013, NCTCOG has received one request for translation at a public meeting and one request for a meeting transcript for a hearing impaired person.

To translate documents, NCTCOG currently utilizes both a translation service and department staff. The average cost for the outside translation service is $0.12 per word. At no cost, the Google Translate tool was added to the NCTCOG Transportation Department website, making information more readily accessible in more than 100 languages. Each year a portion of the community outreach budget is proactively allocated to translation services. Visualization tools such as animations, maps, renderings, photos and others are also used, when possible, to increase understanding among all audiences. These tools can also be especially beneficial for LEP persons. All language assistance is provided at no charge to LEP individuals.

Guidelines for Making Language Assistance Available

The four-factor analysis will be used as a tool for analyzing to what extent and how the needs of LEP communities are addressed during transportation planning and program implementation. For example, the four-factor analysis will be used to determine initial translation or alternative format needs for documents and the website. Department reports, newsletters, brochures, other publications and website information include instructions about how to request information in other formats. Translators and interpreters used by the NCTCOG Transportation Department will be evaluated to ensure accurate, high-quality language services are available to LEP persons.

Increased use of visualization tools will be used to make information more understandable and, in some cases, reduce the need for English proficiency.

Plans, projects and programs for areas with a high number of LEP persons will have materials that address the needs of the population in those area. Environmental Justice communities, including non-English speakers, are mapped whenever possible to provide, as much as possible, plan- or project-specific data.

The NCTCOG Transportation Department will make every effort to accommodate language translation needs, if provided sufficient notice. A minimum of three business days advance notice is required for these arrangements to be provided at public meetings.

NCTCOG Transportation Department staff will consistently seek input and involvement from organizations and agencies which serve LEP populations to complement other language assistance and outreach efforts.

Staff Training for Interacting with and Considering the Needs of LEP Persons
All NCTCOG Transportation Department staff members employed as of February 2013 completed training on the requirements and techniques for providing meaningful access to services for LEP persons. Training materials and resources continue to be available for review by all staff — including new employees. In March 2018, a select group of staff (Environmental Justice Liaisons designated by each team in the department) received supplemental training in best practices for engaging LEP populations.

**Notice of Assistance Available for LEP Persons**

Public meeting notices include the telephone number and email address to request special accommodations for language translation or disability. On each notice, this information is included in English and Spanish.

Notice of the North Central Texas Council of Governments Transportation Department Title VI Complaint Procedures is accessible online and in a brochure made available at public meetings and outreach events. Title VI complaint forms are available in both English and Spanish.

Language assistance can be obtained by contacting the NCTCOG Transportation Department:

North Central Texas Council of Governments, Transportation Department  
P.O. Box 5888  
616 Six Flags Drive (76011)  
Arlington, TX 76005-5888  
**Phone:** (817) 695-9240  
**Fax:** (817) 640-3028  
**Email:** transinfo@nctcog.org  
**Website:** www.nctcog.org/trans/

**Monitoring and Updating Plans and Strategies That Address How LEP Individuals Have Access to Information and Opportunities for Program Participation**

This Language Assistance Plan is intended to be reviewed and updated in conjunction with the NCTCOG Transportation Public Participation Plan.

Environmental justice and Title VI activities will be periodically summarized to provide information about how the NCTCOG Transportation Department:

- Addresses the needs of LEP persons and those traditionally underserved by existing transportation services.
- Facilitates opportunities for full and fair participation from all individuals.
- Makes information accessible and understandable.
- Ensures no person shall, on the basis of race, color, national origin, age, sex, disability, or religion, be excluded from participation in, denied the benefit of, or subjected to discrimination under any program or activity receiving federal financial assistance.
2018 Public Participation Plan

Appendix C: Transportation Improvement Program Modification Policy – Policies and Procedures to Streamline Project Delivery (Updated March 2013)

TRANSPORTATION IMPROVEMENT PROGRAM MODIFICATION POLICY
Policies and Procedures to Streamline Project Delivery

The Transportation Improvement Program (TIP) is a staged, multi-year program of projects approved for funding with federal, State, and local funds within the Dallas-Fort Worth area. A new TIP is approved every two to three years by the Regional Transportation Council (RTC), which serves as the policy board for the Dallas-Fort Worth Metropolitan Planning Organization (MPO). Due to the changing nature of projects as they move through the implementation process, the TIP must be modified on a regular basis.

Please note certain project changes require collaboration with our State and federal review partners. This collaboration occurs through the Statewide Transportation Improvement Program (STIP) revision process. Therefore, modification of the Dallas-Fort Worth TIP will follow the quarterly schedule established for revisions to the Statewide Transportation Improvement Program (STIP).

This policy consists of four sections:

**General Policy Provisions**: Overall policies guiding changes to project implementation

**Project Changes Not Requiring TIP Modification**: Changes related to administration or interpretation of Regional Transportation Council Policy

**Administrative Amendment Policy**: Authority granted to the MPO Director to expedite project delivery and maximize the time the RTC has to consider policy level (vs. administrative) issues

**Revision Policy**: Changes only the Regional Transportation Council can approve or recommend for State and federal concurrence

**General Policy Provisions**

1. All projects inventoried in the Transportation Improvement Program fall under this modification policy, regardless of funding source or funding category.

2. Air quality conformity, Mobility Plan consistency, congestion management process compliance, and financial constraint requirements must be met for all TIP modifications.

3. Project modifications will only be made with the consent of the implementing/impacted agency.
4. The Dallas-Fort Worth MPO will maintain a cost overrun funding pool. Program funds must be available through the cost overrun pool or from other sources in order to process modifications involving project cost increases.

5. All funding from deleted projects will be returned to the regional program for future cost overruns or new funding initiatives, unless the deleted funds are needed to cover cost overruns in other currently selected projects. However, it is important to note that funds are awarded to projects, not to implementing agencies. Therefore, funds from potentially infeasible projects cannot be saved for use in future projects by implementing agencies. MPO staff will manage timely resolution of these projects/funds. In addition, if a project was selected through a particular “program,” such as the Sustainable Development or Regional ITS Funding Program, funds from deleted projects may be returned to those programs for future “calls for projects” in those areas.

6. For projects selected using project scoring methodologies, projects will no longer be rescored before a cost increase is considered.

7. Cost increases for strategically-selected projects fall under the same modification policy provisions.

8. As a general policy, new projects are proposed through periodic regional funding initiatives. However, the RTC may elect to add new projects to the TIP, outside of a scheduled funding initiative under emergency or critical situations. Projects approved under this provision must be an immediate need.

9. Local match commitments (i.e., percentages) will be maintained as originally approved. Cost overruns on construction, right-of-way, and engineering costs will be funded according to original participation shares.

10. Additional restrictions may apply to projects selected under certain funding initiatives. For example, projects selected through the Land Use/Transportation Joint Venture (i.e., Sustainable Development) program are not eligible for cost increases from RTC-selected funding categories.

11. Cost overruns are based on the total estimated cost of the project, including all phases combined, and are evaluated once total project cost is determined to exceed original funding authorization.

12. Cost indicators may be evaluated on cost overruns to alert project reviewers of potential unreasonable cost estimates (examples include cost per lane-mile, cost per turn lane). The cost indicators are developed by the MPO, in consultation with TxDOT, using experience from the last several years. If a project falls out of this range, the MPO may either: (a) require a more detailed estimate and explanation, (b) require value engineering, (c) suggest a reduced project scope, or (d) determine that a cost increase will come from local funds, not RTC funds.

13. For a project change to be considered, implementing agencies must submit modification requests for their TIP projects through the online TIP modification system. Project change requests must include complete information by the deadline. Incomplete requests will be sent back to agency for re-submittal in a future cycle.
14. Implementing agencies must identify one or two official points of contact for TIP project modifications. The point of contact is responsible for entering complete project modification requests into the online TIP modification system on time. The point of contact must be capable of collecting and entering accurate project information. Points of contact will be sent reminders leading up to submittal deadlines.

Project Changes Not Requiring TIP Modification

In certain circumstances, changes may be made to TIP projects without triggering a TIP modification. These circumstances are outlined below:

1. **Changes that do not impact the overall purpose of a project:** Changes to MTP reference, CSJ’s, or other clerical edits do not require a TIP modification.

2. **Changes to TxDOT’s Design and Construction Information System (DCIS):** The DCIS is a project tracking system, therefore, simply updating the DCIS to match previously approved TIP projects or project elements does not require TIP modification. MPO staff maintains the official list of projects and funding levels approved by the RTC.

3. **Carryover Funds:** At the end of each fiscal year, unobligated funds are moved to the new fiscal year as carryover funds. For example, if a project receives funding in a specific fiscal year, but the project is not implemented by the end of the fiscal year, staff will automatically move the funds for that project into the next fiscal year. These changes do not require a TIP modification.

4. **Cost/Funding Increases:** Staff will update cost increases in the information system for changes of less than $400,000.

5. **Increases in Local Funds:** Staff will adjust with concurrence of local agency.

6. **Changes in RTC Funding Categories:** Staff adjustments permitted.

7. **Emergency:** This provision includes emergency changes that need approval quickly, but timing is not aligned with the RTC Meeting schedule. These changes would come to the RTC for ratification at the next scheduled meeting.

8. **Cost/Funding Decreases:** Staff will update the information system with cost decreases.

9. **Funding Year Changes:** Staff will update the information system for changes that advance project implementation. Once projects are ready for construction (i.e., all federal and State requirements and procedures have been met), staff will advance the project to construction if funds are available.

10. **Statewide Transportation Improvement Program (STIP) Revisions Consistent with Previous RTC Action** (e.g., Staff will place a project or changes previously approved by the RTC in the appropriate information system and documents.)

11. **Addition of Noncapacity, Conformity-Exempt Projects:** Staff will place projects in the appropriate information system/document.
Examples include, but are not limited to:

- Sign refurbishing
- Intersection Improvements
- Landscaping
- Intelligent Transportation System
- Preventive maintenance
- Traffic Signal Improvements
- Bridge rehabilitation/replacement
- Safety/Maintenance

12. **Changes to Implementing Agency**: Staff will process after receiving a written request/approval from the current implementing agency and the newly proposed implementing agency.

13. **Increased Flexibility for Traffic Signal, Intersection Improvement, ITS, and “Grouped” Projects**: Staff will use best practices to advance this category of projects.

14. **Addition and Adjustment of Phases**: Includes engineering, right-of-way, construction, etc.

15. **Administrative Scope Changes**: Minor clarifications to the type of work being performed, physical length of project, and project termini/limits. For example, changing the limits of a project from “.25 miles west of” to “west of,” or changing the limits from “point A” to “.5 miles east of point A,” or clarifying limits due to a change to the name of a roadway when there is no physical change to the limits (the name of the roadway just changed from one name to another, etc.

16. **Funding Year Changes**: Can be moved by staff if project is being moved less than one year.

Please note that a STIP revision may be required to make these changes in the statewide funding document. In all cases, MPO information systems will be updated and changes will be noted in project tracking systems.

**Administrative Amendment Policy**

Administrative Amendments are TIP modifications that do not require action of the RTC for approval. Under the Administrative Amendment Policy, the RTC has authorized the Director of Transportation, or his designee, for the Dallas-Fort Worth MPO to approve TIP modifications that meet the following conditions. After they are approved, administrative amendments are provided to STTC and the RTC for informational purposes, unless they are merely processed to support previous RTC project approval.

1. **Changes in Federal/State Funding Categories that Do Not Impact RTC-Selected Funding Programs**: RTC-Selected funding programs include: CMAQ, STP-MM, RTR, Category 2M - Metro Corridor (in coordination with TxDOT), Texas Mobility Funds, Urbanized Area Formula Program - Transit Section 5307.
2. **Potentially Controversial Projects** - The administrative amendment policy does not restrict the Transportation Director from requesting Regional Transportation Council (RTC) action on potentially controversial project changes.

3. **Change in funding share due to adding funding from one program to another**: For instance, if adding Thoroughfare Assessment Program funds (80% federal and 20% state/local) to a project that is 56% federal and 44% local, an administrative amendment is permitted. The revision policy applies to all other instances.

**Revision Policy**

Revisions are modifications that require approval of the Regional Transportation Council. A revision is required for any project modification that meets the following criteria or that does not fall under the Administrative Amendment Policy.

1. **Adding or Deleting Projects from the TIP**: This provision includes all projects not covered previously in this Policy. All new projects regardless of funding source need to be approved under this Revision Policy.

2. **Cost/Funding Increases**: A revision is required on any cost/funding increase over $400,000.

3. **Substantive Scope Changes**: This provision includes major or substantive changes that may have citizen interest or policy implications. For example, limits change to a brand new location, limits are extended or shortened substantially, the number of lanes changes, etc.

4. **Funding Year Changes**: A revision is required to move a project more than one year into a fiscal year that would delay project implementation.

5. **Changes in the Funding/Cost Shares**: A change to the percentage of the total project cost paid by each funding partner requires a revision (with the one exception noted in the administrative amendment policy).

Approved by the RTC on March 14, 2013
North Central Texas Council of Governments
Transportation Department

Title VI Complaint Procedures
Introduction

The North Central Texas Council of Governments (NCTCOG) serves as the federally designated Metropolitan Planning Organization (MPO) for the Dallas-Fort Worth region. As a recipient of federal financial assistance and under Title VI of the Civil Rights Act of 1964 and related Title VI statutes, NCTCOG ensures that no person shall, on the grounds of race, religion, color, national origin, sex, age, or disability be excluded from participation in, be denied the benefits of, or otherwise be subjected to discrimination under any agency programs or activities. These prohibitions extend from the North Central Texas Council of Governments, as a direct recipient of federal financial assistance, to its sub-recipients (e.g., contractors, consultants, local governments, colleges, universities, etc). All programs funded in whole or in part from federal financial assistance are subject to Title VI requirements. The Civil Rights Restoration Act of 1987 extended this to all programs within an agency that receives federal assistance regardless of the funding source for individual programs.

This policy is intended to establish a procedure under which complaints alleging discrimination in NCTCOG’s provisions, services, or NCTCOG activities can be made by persons who are not employees of NCTCOG.

Any person who believes NCTCOG, or any entity who receives federal financial assistance from or through NCTCOG (i.e., sub-recipients, sub-contractors, or sub-grantees), has subjected them or any specific class of individuals to unlawful discrimination may file a complaint of discrimination.

NCTCOG will follow timelines set forth in guidance from the Department of Transportation, the Federal Highway Administration, Federal Transit Administration and the Department of Justice for processing Title VI discrimination complaints.
When to File

A complaint of discrimination must be filed within 180 calendar days of the alleged act of Discrimination, or discovery thereof; or where there has been a continuing course of conduct, the date on which that conduct was discontinued. Filing means a written complaint must be postmarked before the expiration of the 180-day period. The filing date is the day you complete, sign, and mail the complaint form. The complaint form and consent/release form must be dated and signed for acceptance. Complaints received more than 180 days after the alleged discrimination will not be processed and will be returned to the complainant with a letter explaining why the complaint could not be processed and alternative agencies to which a report may be made.

Where to File

In order to be processed, signed original complaint forms must be mailed to:

North Central Texas Council of Governments
Transportation Department
Title VI Specialist
P.O. Box 5888
Arlington, TX 76005-5888

Or hand delivered to:
616 Six Flags Drive
Arlington, TX 76011

Upon request, reasonable accommodations will be made for persons who are unable to complete the complaint form due to disability or limited-English proficiency. A complaint may also be filed by a representative on behalf of a complainant.

Persons who are not satisfied with the findings of NCTCOG may seek remedy from other applicable state or federal agencies.

Required Elements of a Complaint

In order to be processed, a complaint must be in writing and contain the following information:
- Name, address, and phone number of the complainant.
- Name(s) and address(es) and business(es)/organization(s) of person(s) who allegedly discriminated.
- Date of alleged discriminatory act(s).
- Basis of complaint (i.e., race, color, national origin, sex, age, religion, or disability).
- A statement of complaint.
- Signed consent release form.
Incomplete Complaints

Upon initial review of the complaint, the Title VI Specialist will ensure that the form is complete and that any initial supporting documentation is provided. Should any deficiencies be found, the Title VI Specialist will notify the complainant within 10 working days. If reasonable efforts to reach the complainant are unsuccessful or if the complainant does not respond within the time specified in the request (30 days), the recipient may close the complainant’s file. The complainant may resubmit the complaint provided it is filed within the original 180-day period.

Should the complaint be closed due to lack of required information, NCTCOG will notify the complainant at their last known address. In the event the complainant submits the missing information after the file has been closed, the complaint may be reopened provided it has not been more than 180 days since the date of the alleged discriminatory action.

Records of Complaints

The Title VI Specialist will keep a record of all complaints received. The log will include such information as:
- Basic information about the complaint such as when it was filed, who filed it, and who it was against.
- A description of the alleged discriminatory action.
- Findings of the investigation.

Complaint Process Overview

The following is a description of how a discrimination complaint will be handled once received by NCTCOG.

1. A complaint is received by NCTCOG:
   Complaints must be in writing and signed by the complainant or their designated representative. If the complainant is unable to complete the form in writing due to disability or limited-English proficiency, upon request reasonable accommodations will be made to ensure the complaint is received and processed in a timely manner. Complainants wishing to file a complaint that do not have access to the Internet or the ability to pick up a form will be mailed a complaint form to complete. The complainant will be notified if the complaint form is incomplete and asked to furnish the missing information.

2. Complaint is logged into tracking database:
   Completed complaint forms will be logged into the complaint tracking database; basic data will be maintained on each complaint received, including name of complainant, contact information, name and organization of person(s) who allegedly discriminated, date of alleged discriminatory act(s), basis of complaint (i.e., race, color, national origin, sex, age, religion, or disability), and description of the alleged discriminatory action. Once the investigation is complete, the findings of the investigation will be logged into the complaint tracking database.
3. **Determine jurisdiction:**
Within 10 calendar days of the receipt of the complaint, NCTCOG's Title VI Specialist will complete an initial review of the complaint. The purpose of this review is to determine if the complaint meets basic criteria.

Criteria required for a complete complaint:
- Basis of alleged discrimination (i.e., race, religion, color, national origin, sex, age or disability).
- Determination of timeliness will also be made to ensure that the complaint was filed within the 180 day time requirement.
- The program in which the alleged discrimination occurred will be examined to ensure that the complaint was filed with the appropriate agency. During this process, if a determination is made in which the program or activity that the alleged discrimination occurred is not conducted by NCTCOG or an entity who receives federal financial assistance from or through NCTCOG (i.e., sub-recipients, sub-contractors, or sub-grantees), every attempt will be made to establish the correct agency. Whenever possible, and assuming consent was granted on the Consent/Release form, the complaint will be forwarded to the appropriate agency.

NCTCOG's Title VI Specialist will confer with the Department Director on the determination of a complete complaint and on any deferrals to other agencies. Once the Title VI Specialist completes an initial review of the complaint and determines that the criteria for a complete complaint is met, NCTCOG will forward the complaint to the Texas Department of Transportation, Office of Civil Rights, Compliance Section.

4. **Initial written notice to complainant:**
Within 10 working days of the receipt of the complaint, NCTCOG will send notice to the complainant confirming receipt of the complaint; if needed the notice will request additional information, notify complainant that the activity is not related to a NCTCOG program or activity, or does not meet deadline requirements. Conclusions made in step three will determine the appropriate response to the complaint. Examples of response letters are located in Appendix A. If any additional information is needed from the complainant, it will be communicated at this point in the process. A copy of the written response, as well as the complaint form, will be forwarded to the Texas Department of Transportation, Office of Civil Rights, Contract Compliance Section.

5. **Investigation of complaint:**
The Title VI Specialist will confer with the Department Director to determine the most appropriate fact finding process to ensure that all available information is collected in an effort to reach the most informed conclusion and resolution of the complaint. The type of investigation techniques used may vary depending on the nature and circumstances of the alleged discrimination. An investigation may include but is not limited to:
- Internal meetings with NCTCOG staff and legal counsel.
- Consultation with state and federal agencies.
- Interviews of complainant(s).
- Review of documentation (i.e., planning, public involvement, and technical program activities).
- Interviews and review of documentation with other agencies involved.
- Review of technical analysis methods.
- Review of demographic data.
6. **Determination of investigation:**
   An investigation must be completed within 60 days of receiving the complete complaint, unless the facts and circumstances warrant otherwise. A determination will be made based on information obtained. The Title VI Specialist, Department Director and/or designee will render a recommendation for action, including formal and/or informal resolution strategies in a report of findings to the NCTCOG Executive Director.

7. **Notification of determination:**
   Within 10 days of completion of an investigation, the complainant must be notified by the NCTCOG Executive Director of the final decision. The notification will advise the complainant of his/her appeal rights with state and federal agencies if he/she is dissatisfied with the final decision. A copy of this letter, along with the report of findings, will be forwarded to the Texas Department of Transportation, Office of Civil Rights, Contract Compliance Section for information purposes.
RECEIPT OF COMPLAINT
A written discrimination complaint is received and entered into tracking database.

INITIAL REVIEW
Initial review completed and response sent to complainant within 10 working days of when complaint received.

- Complete complaint and consent forms?
  - No
    - Requested information received within 30 days?
      - No
        - INITIAL WRITTEN RESPONSE
          Confirm receipt of complaint.
          Request additional information.
      - Yes
        - INITIAL WRITTEN RESPONSE
          Confirm receipt of complaint.
          Commence fact-finding process.
  - Yes
    - In NCTCOG jurisdiction?
      - Yes
        - INITIAL WRITTEN RESPONSE
          Confirmed receipt of complaint.
          Commence fact-finding process.
      - No
        - INITIALLY WRITTEN RESPONSE
          Referred to another agency.
          Complaint closed at NCTCOG.
    - < 180 calendar days since alleged occurrence?
      - Yes
        - INITIAL WRITTEN RESPONSE
          Complaint closed.
      - No
        - INVESTIGATION / FACT FINDING
          Completed within 60 working days of receiving complaint.
          Findings summarized and report submitted to head of Agency.

DETERMINATION OF INVESTIGATION
Notification of determination sent to complainant within 90 working days of receiving complaint.

- Did discrimination occur?
  - Yes
    - WRITTEN NOTIFICATION OF INVESTIGATION DETERMINATION
      Includes proposed course of action to address finding of discrimination.
  - No
    - WRITTEN NOTIFICATION OF INVESTIGATION DETERMINATION
      Explains finding of no discrimination and advises complainant of appeal rights.
The North Central Texas Council of Governments (NCTCOG) serves as the federally designated Metropolitan Planning Organization (MPO) for the Dallas-Fort Worth region. As a recipient of federal financial assistance and under Title VI of the Civil Rights Act of 1964 and related statutes, NCTCOG ensures that no person shall, on the grounds of race, religion, color, national origin, sex, age or disability be excluded from participation in, be denied the benefits of, or otherwise be subjected to discrimination under any agency programs or activities. These prohibitions extend from the North Central Texas Council of Governments, as a direct recipient of federal financial assistance, to its sub-recipients (e.g., contractors, consultants, local governments, colleges, universities, etc.). All programs funded in whole or in part from federal financial assistance are subject to Title VI requirements.

NCTCOG is required to implement measures to ensure that persons with limited-English proficiency or disability have meaningful access to the services, benefits and information of all its programs and activities under Executive Order 13166. Upon request, assistance will be provided if you are limited-English proficient or disabled. Complaints may be filed using an alternative format if you are unable to complete the written form.

The filing date is the day you complete, sign, and mail this complaint form. Your complaint must be filed no later than 180 calendar days from the most recent date of the alleged act of discrimination. The complaint form and consent/release form must be dated and signed for acceptance. You have 30 calendar days to respond to any written request for information. Failure to do so will result in the closure of the complaint.

Submit the forms by mail to:

North Central Texas Council of Governments
Transportation Department
Title VI Specialist,
P.O. Box 5888
Arlington, TX 76005-5888

Or in Person at:
616 Six Flags Drive
Arlington, TX 76011

If you have any questions or need additional information, please call (817) 695-9240 or e-mail titlevi@nctcog.org.
1

First Name    MI    Last Name

Street Address    City    State    Zip Code

Telephone Number    e-mail Address

2

Who do you believe discriminated against you?

First Name    MI    Last Name

Name of Business/Organization    Position/Title

Street Address    City    State    Zip Code

Person’s Relationship to You

3

When did the alleged act(s) of discrimination occur?  Please list all applicable dates in mm/dd/yyyy format.

Date(s):

Is the alleged discrimination ongoing?  ○ Yes  ○ No

4

Where did the alleged act(s) of discrimination occur? (Attach additional pages as necessary.)

Name of Location

5

Indicate the basis of your grievance of discrimination.

Race:        Color:

National Origin:        Sex:

Age:        Disability:

Religion:
Describe in detail the specific incident(s) that is the basis(es) of the alleged discrimination. Describe each incident of discrimination separately. Attach additional pages as necessary.

Please explain how other persons or groups were treated differently by the person(s)/agency who discriminated against you.

Please list and describe all documents, e-mails, or other records and materials pertaining to your complaint.

Please list and identify any witness(es) to the incidents or persons who have personal knowledge of information pertaining to your complaint.

Have you previously reported or otherwise complained about this incident or related acts of discrimination? If so, please identify the individual to whom you made the report, the date on which you made the report, and the resolution. Please provide any supporting documentation.
Please provide any additional information about the alleged discrimination.

7 If an advisor will be assisting you in the complaint process, please provide his/her name and contact information.

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8 This complaint form must be signed and dated in order to address your allegations. Additionally, this office will need your consent to disclose your name, if needed, in the course of our investigation. The Discrimination Complaint Consent/Release form is attached. If you are filing a complaint of discrimination on behalf of another person, our office will also need this person’s consent.

I certify that to the best of my knowledge the information I have provided is accurate and the events and circumstances are as I have described them. I also understand that if I will be assisted by an advisor, my signature below authorizes the named individual to receive copies of relevant correspondence regarding the complaint and to accompany me during the investigation.

Signature ___________________________ Date ___________________________
# Discrimination Complaint Consent/Release Form

Please read the information on this form carefully before you begin.

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As a complainant, I understand that in the course of an investigation it may become necessary for the North Central Texas Council of Governments to reveal my identity to persons at the organization or institution under investigation. I am also aware of the obligations of the North Central Texas Council of Governments to honor requests under the Freedom of Information Act. I understand that as a complainant I am protected from retaliation for having taken action or participated in action to secure rights protected by nondiscrimination statutes and regulations which are enforced by the Federal Highway Administration (FHWA) of the U.S. Department of Transportation.

Please Check one:

- [ ] I CONSENT and authorize the North Central Texas Council of Governments (NCTCOG), as part of its investigation, to reveal my identity to persons at the organization, business, or institution, which has been identified by me in my formal complaint of discrimination. I also authorize NCTCOG to discuss, receive and review materials and information about me from the same and with appropriate administrators or witnesses for the purpose of investigating this complaint. In doing so, I have read and understand the information at the beginning of this form. I also understand that the material and information received will be used for authorized civil rights compliance activities only. I further understand that I am not required to authorize this release and do so voluntarily.

- [ ] I DENY CONSENT to have the North Central Texas Council of Governments (NCTCOG), reveal my identity to persons at the organization, business, or institution under investigation. I also deny consent to have NCTCOG disclose any information contained in the complaint with any witnesses I have mentioned in the complaint. In doing so, I understand that I am not authorizing NCTCOG to discuss, receive, nor review any materials and information about me from the same. In doing so, I have read and understand the information at the beginning of this form. I further understand that my decision to deny consent may impede this investigation and may result in the unsuccessful resolution of my case.

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Signature __________________________ Date ____________

North Central Texas Council of Governments – Transportation Department Title VI Complaint Procedures

NCTCOG Transportation Public Participation Plan 2018
APPENDIX H

MEMORANDUM OF AGREEMENT
MEMORANDUM OF AGREEMENT
Between
The DALLAS-FORT WORTH METROPOLITAN PLANNING ORGANIZATION
and
The TEXAS DEPARTMENT OF TRANSPORTATION
and
The PUBLIC TRANSPORTATION OPERATORS

It is the purpose of this agreement to make provision for cooperative mutual responsibilities in carrying out the metropolitan transportation planning process in the Dallas-Fort Worth Metropolitan Planning Area and to provide a single agreement among the State, the MPO, and the Public Transportation Operator(s) in accordance with current federal legislation.

WHEREAS the Moving Ahead for Progress in the 21st Century (MAP-21) promulgated regulations 23 CFR 450.314, continued in Fixing America’s Surface Transportation Act (FAST Act); and

WHEREAS § 450.314 – Metropolitan Planning Agreements further requires that the MPO, the State, and the public transportation operator(s) cooperatively determine their mutual responsibilities in carrying out the metropolitan transportation planning process in clearly identified written agreements between the MPO, the State(s), and the public transportation operator(s) serving the metropolitan planning area; and

WHEREAS it is recommended that to the extent possible, a single agreement among all responsible parties be developed to include specific provisions for cooperatively developing and sharing information related to the development of financial plans that support the Metropolitan Transportation Plan (MTP) (§ 450.324), the Metropolitan Transportation Improvement Program (TIP) (§ 450.326), and development of the annual listing of obligated projects (§ 450.334).

NOW, THEREFORE, the parties do agree as follows:

- To cooperatively determine their mutual responsibilities in carrying out the metropolitan transportation planning process.

- To make provisions for cooperatively developing and sharing information related to the development of financial plans that support the MTP and the TIP.

- That the State, public transportation operator(s), and the MPO shall cooperatively develop a listing of projects (including investments in pedestrian walkways and bicycle transportation facilities) for which funds under 23 U.S.C. or 49 U.S.C. Chapter 53 were obligated in the preceding program year.

- To develop specific written provisions for cooperatively developing and sharing information related to transportation performance data, the selection of performance targets, the reporting of performance targets, the reporting of performance to be used in tracking progress toward attainment of critical outcomes for the region of the MPO (see §450.306(d)), and the collection of data for the State asset management plans.

- And, that the Unified Planning Work Program (UPWP) will detail and document these responsibilities, deliverables and associated costs as part of this Metropolitan Planning Agreement in Appendix H of the Work Program.
NORTH CENTRAL TEXAS COUNCIL OF GOVERNMENTS:
Mike Eastland, Executive Director
Date: 8/3/17

DENTON COUNTY TRANSPORTATION AUTHORITY:
James C. Cline, Jr., P.E., President
Date: 5/31/17

FORT WORTH TRANSPORTATION AUTHORITY:
Gary Ballard, President and Chief Executive Officer
Date: 6/30/17

DALLAS AREA RAPID TRANSIT:
Gary C. Thomas, President/Executive Director
Date: 6/29/17

DALLAS FORT WORTH INTERNATIONAL AIRPORT:
Sean Donohue, Chief Executive Officer
Date: 6/29/17

REGIONAL TRANSPORTATION COUNCIL:
Michael Morris, Director of Transportation
Date: 9/6/17

TEXAS DEPARTMENT OF TRANSPORTATION:
Loy I. Russell, P.E., Acting District Engineer, TxDOT Fort Worth District
Date: 7/16/17

James K. Selman, P.E., District Engineer, TxDOT Dallas District
Date: 7/15/17

Noel Paramanathan, P.E., District Engineer, TxDOT Paris District
Date: 7/28/17

NORTH TEXAS TOLLWAY AUTHORITY:
Gerry Carrigan, CEO/Executive Director
Date: 7/19/17

COLLIN COUNTY TOLL ROAD AUTHORITY:
The Honorable Keith Self, President
Date: 7/5/17
CITY OF ARLINGTON:

Trey Velverton, City Manager
James F. Parajon, Deputy City Manager
Date: 7-19-17

CITY OF MCKINNEY:

Paul Grimes, City Manager
Date: 7-20-17

CITY OF GRAND PRAIRIE:

Tom Hart, City Manager
Date: July 6th, 2017

CITY OF MESQUITE:

Cliff Keheley, City Manager
Date: 7-19-17