

Killeen-Temple Urban Transportation Plan Mobility 2035 Metropolitan Transportation Plan



Revised: 10/21/2009

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Executive Summary

The ability to travel directly affects the economic and social aspect of our communities and our daily lives. Meeting the challenge to provide adequate mobility in the future will depend on the development of a coordinated transportation planning process. The Killeen–Temple Urban Transportation Study (K–TUTS) is charged with the task of serving as the Metropolitan Planning Organization (MPO) for the Central Texas region. As population and employment growth continues within the K–TUTS urbanized area, the need for improved transportation options becomes an increasing priority. While automobile travel remains the dominant form of personal transportation and truck traffic for goods and services continues to increase, using resources to the fullest extent possible will be even more important in future years. Identifying necessary improvements and scheduling available funding constitute the important aspects of this long range plan.

Long range transportation planning requirements began with the passage of the Federal Highway Transportation Act of 1962. This act required that all urban areas with populations of 50,000 or greater develop and maintain a comprehensive, cooperative, and continuing regional transportation planning process. With the passage of the Intermodal Surface Transportation Efficiency Act of 1991 (ISTEA), a significant change in transportation planning began. In its Declaration of Policy, the act declared that the “...National Intermodal Transportation System shall consist of all forms of transportation in a unified, interconnected manner...”. The role of the MPO was further integrated into the transportation planning process, and citizen involvement became paramount to accomplishing the new directives. Since 1962 there have been three iterations of the original Act: the Transportation Equity Act for the 21st Century (TEA–21), two extensions, and Safe, Accountable, Flexible, and Efficient Transportation Equity Act: A Legacy for Users also known as SAFETEA–LU. This plan will feature changes in implementation for greater efficiency and accountability.

In upholding that responsibility, K–TUTS has developed this Metropolitan Transportation Plan (MTP) that is designed to outline funding and prioritize for the regionally significant thoroughfares where either anticipated construction is needed or substantial upgrades are forecasted within the next twenty–five years. This list of thoroughfare projects is divided into three major categories by determined priority; a short–range plan (10 years), a long–range plan (25 years), and a regionally significant unfunded list (those projects important to the region, but no funding identified.) The plan considers all modes of transportation (highway, transit, rail, air, bicycle, and pedestrian) and seeks to increase the accessibility, connectivity, and efficiency of the movement of persons and freight within and outside of the region.

The major recommendations of this plan are summarized below:

1. Chapter 4 discusses the financial plan designed to span 25 years to demonstrate the expected funding available for transportation improvements. Using historic funding trends, an average of \$37,806,867 will be available for highway and roadway improvements. Of this amount, \$5,451,030 is expected for system maintenance and \$32,355,837 for construction.
2. Major roadway improvements proposed within the K–TUTS planning area are presented in Chapter 6: “Alternatives.”

3. Due to the impact of transportation on development, industry, and commerce interaction of proposed improvement projects must be considered across future levels of service, environmental impact, economic impact, and usage by inhabitants of the region.
- * 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 non-motorized users;
 - * Increase the security of the transportation system for motorized and non-motorized users;
 - * Increase the accessibility and mobility of people and freight;
 - * Protect and enhance the environment, promote energy conservation, improve the quality of life, and promote consistency between transportation improvements and state and local planned growth and economic development patterns;
 - * Enhance the integration and connectivity of the transportation system across and between modes for people and freight;
 - * Promote efficient system management and operation; and
 - * Emphasize the preservation of the existing transportation system. K-TUTS will seek to provide guidance and assistance in establishing coordination between local land use policies and regional travel patterns in every effort to increase efficiency and reliability of the transportation network.

As a necessary part of transportation planning of this magnitude, community involvement coupled with guidance from transportation planning boards and the MPO has been utilized. This plan was submitted to TxDOT in May 2009.

Chapter 1: Development of Mobility 2035

WHY K-TUTS PREPARES AN MTP

Transportation systems are best planned at a regional level, this holds true especially for the Killeen - Temple Urban Transportation Study (K-TUTS) region. K-TUTS is the Metropolitan Planning Organization (MPO) for the Central Texas area. Encompassed within the K-TUTS boundaries are the cities of Belton, Copperas Cove, Harker Heights, Kempner, Killeen, Little River-Academy, Morgan's Point Resort, Nolanville, Salado, Temple, and Troy. Due to the proximity of major arterials, colleges, businesses, and other traffic generators, trips within the region are not confined to only the local area resulting in the need for transportation planning at the regional level.

Mobility 2035 is the twenty-five year Metropolitan Transportation Plan (MTP) that outlines the transportation needs for the K-TUTS region. This document, required by federal law, is designed as the guideline from which all future intermodal projects are planned and constructed within the K-TUTS region over the next 25-year period.

The K-TUTS area encompasses 543 square miles in Bell, Coryell, and Lampasas Counties. A map illustrating the K-TUTS region is provided on the following page. The 2000 Census Bureau reported a population of 277,310 within the K-TUTS region. It is projected that most of this planning area will be urbanized by the year 2035.

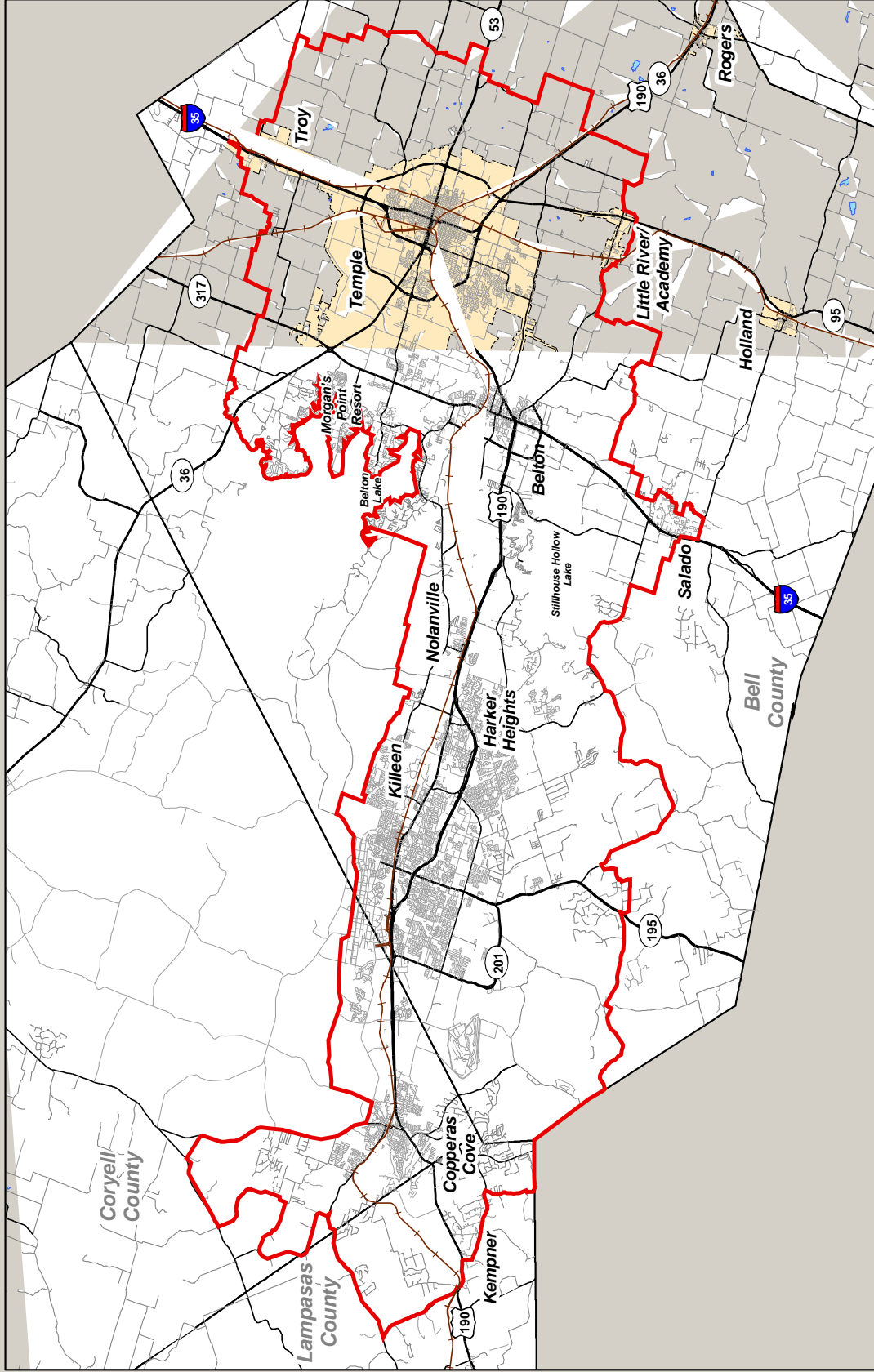


CREATION OF MOBILITY 2035 AND WHO IS INVOLVED

This transportation plan is the final product of several years of research through the continuing comprehensive and cooperative effort of the Transportation Planning Policy Board (TPPB), the Technical Committee, K-TUTS' staff, and the Texas Department of Transportation (TxDOT).

To kick off the Mobility 2035 process, the Technical Committee underwent a series of meetings to determine the project selection criteria and scoring methodology used for the project selection process. This criteria was then sent to the Transportation Planning Policy Board, also referred to as Policy Board, for adoption. Once the Policy Board voted to approve the project selection criteria and scoring methodology, the call for projects was released.

K-TUTS Region



Killeen-Temple Urban Transportation Study
February 20, 2009



Railroads - Texas Railroad Commission
Roads - 911 Road Centerlines



- Legend**
- K-TUTS Boundary
 - City Limits
 - Railroads
 - Lakes
 - Ft. Hood

The next task fell to the local entities. It was the responsibility of each local entity to submit new and revised transportation projects within their jurisdiction for possible inclusion into the MTP. These projects were submitted to the MPO by the September 30, 2008 deadline, as determined by Policy Board.

Once the projects were submitted, staff categorized and organized them into readable and usable living documents. A variety of displays and educational materials were available to the public, in addition to the many opportunities for their questions and comments.



Technical Committee and Policy Board members travel to view proposed MTP projects.

The Technical Committee members, Policy Board members and local elected officials viewed some proposed projects by accompanying staff on a bus tour showcasing about twenty five percent of the projects submitted. Information obtained from this tour played a significant role during the scoring and ranking of the projects, facilitating candid recommendations from Technical Committee members

and Policy Board members while determining project priority. Details on how project priority was determined are addressed in Chapter 6: Alternatives. Once adopted by the Policy Board, staff began to work on creating Mobility 2035. In compliance with the K-TUTS Public Participation Plan (PPP), the draft MTP went through two public hearings and a 30 day public comment period. A copy of the PPP can be found in Appendix E. The final MTP was recommended by Technical Committee and adopted by the Transportation Planning Policy Board on May 20, 2009.

FEDERAL AND STATE REQUIREMENTS

K-TUTS is the result of a long history of transportation planning legislation. In 1962, Congress passed the Federal Highway Act (FHWA) which focused on the needs for transportation planning in urbanized areas. This Act specifically states:

“The Secretary [of Transportation] shall not approve...any projects in any urban area of more than 50,000 population unless he finds that such projects are based on a CONTINUING, COMPREHENSIVE transportation planning process carried on COOPERATIVELY by the States and Local Communities.”

In compliance with this Act, the Cities of Temple, Belton, Nolanville, Harker Heights, Killeen, and Copperas Cove along with the counties of Bell, Coryell, and Lampasas, and the Texas Department of Transportation (TxDOT) formed K-TUTS.

The FHWA of 1962 became the catalyst for many later federal actions. When Congress passed the Federal Highway Act of 1970 they added:

“...no highway project may be constructed in any urban area of 50,000 population or more unless the responsible public officials of such urban area in which the project is located have been consulted and their views considered.”

In 1975, Congress implemented the FHWA/Urban Mass Transportation Administration (UMTA) Joint Regulation. This directed Governors to designate Metropolitan Planning Organizations to develop a:

1. Unified Planning Work Program (UPWP)
2. Metropolitan Transportation Plan (MTP)
3. Transportation Improvement Program (TIP)

The Intermodal Surface Transportation Efficiency Act of 1991, known as ISTEA, included some measures that have affected transportation planning in a more significant manner than any previous legislation. ISTEA included for the first time an emphasis on multi-modal considerations, public involvement, and better highway design. Although not as significant in the K-TUTS areas as in the Transportation Management Areas (TMAs), the inclusion of the Clean Air Act provisions in ISTEA highlighted the growing importance of issues beyond fast and convenient transportation. The Transportation Equity Act for the 21st Century (TEA-21) soon followed ISTEA and also had a significant impact on K-TUTS. This legislation authorized highway, highway safety, transit, and other surface transportation programs for the next six years.

All of these federal actions have had a profound effect on the history, formation, and role of K-TUTS, however, the most recent federal legislation that affects the organization and function of K-TUTS is the reauthorization of TEA-21- Safe, Accountable, Flexible, and Efficient Transportation Equity Act: A Legacy for Users (SAFETEA-LU.)

SAFETEA-LU

SAFETEA-LU was signed into law on August 10th of 2005. With guaranteed funding for highway construction, highway safety, and public transportation totaling \$244.1 billion, SAFETEA-LU represents the largest surface transportation investment in our nation's history. The two landmark bills that brought surface transportation into the 21st century—the Intermodal Surface Transportation Efficiency Act of 1991 (ISTEA) and the Transportation Equity Act for the 21st Century (TEA-21)—shaped the highway program to meet the nation's changing transportation needs. SAFETEA-LU builds on this firm foundation, supplying the funds and refining the programmatic framework for investments needed to maintain and expand our vital transportation infrastructure.

SAFETEA-LU addresses the many challenges facing our transportation system today - challenges such as improving safety, reducing traffic congestion, improving efficiency in freight movement, increasing intermodal connectivity, and protecting the environment - as well as laying the groundwork for addressing future challenges. SAFETEA-LU requires the Metropolitan Planning Organization to consider planning strategies that will serve to advance eight transportation-planning factors identified under SAFETEA-LU:

1. Support the economic vitality of the metropolitan area, especially by enabling global competitiveness, productivity, and efficiency;
2. Increase the safety of the transportation system for motorized and non-motorized users;
3. Increase the security of the transportation system for motorized and non-motorized users;
4. Increase the accessibility and mobility of people and freight;
5. Protect and enhance the environment, promote energy conservation, improve the quality of life, and promote consistency between transportation improvements and State and local planned growth and economic development patterns;
6. Enhance the integration and connectivity of the transportation system, across and between modes, for people and freight;
7. Promote efficient system management and operation; and
8. Emphasize the preservation of the existing transportation system.

SAFETEA-LU promotes more efficient and effective federal surface transportation programs by focusing on transportation issues of national significance while giving state and local transportation decision makers more flexibility in solving transportation problems in their communities. SAFETEA-LU continues a strong fundamental core formula program emphasis coupled with targeted investment featuring safety, equity, innovative finance, congestion relief, mobility and productivity, efficiency, environmental stewardship, and environmental streamlining.

Chapter 2: Demographics

SOCIO-ECONOMIC CHARACTERISTICS (CURRENT)

The Killeen - Temple Urban Transportation Study (K-TUTS) has experienced tremendous growth over the past several years. Based on estimates received from the Transportation Planning and Programming Division of TxDOT, the 2005 population for K-TUTS was 326,890. This is about an 18% increase over the population of 277,078 from the 2000 Census. K-TUTS has two designated urbanized areas derived from the 2000 Census. The Killeen urban area stretches from Copperas Cove to Nolanville and had a population of 167,979 during the 2000 Census. The Temple urban area contains most of Temple, Belton and Morgan's Point Resort with a 2000 population of 71,937. Population trends for cities and counties within the region can be found in Appendix B - Demographic Tables.

Statistics show that when the 2000 Census was taken the Killeen-Temple-Ft. Hood Core Based Statistical Area (CBSA) had a population count of 330,714. Of these persons, 190,740 were age 25 or older and 83.5% were high school graduates or better, with 29.1% having attained a Bachelor's degree or better. The 2008 population estimates for persons over the age of 25 in the CBSA is 360,241. An estimated 89.6% of the population graduated high school, and 32.8% received a Bachelor's degree or better.

In 2008, the Killeen-Temple-Ft. Hood CBSA median household income was \$46,426, compared to the State of Texas median household income which was \$51,025. The Census revealed median household incomes of \$36,758 in 2000 and \$23,683 in 1990 representing a change of 55.2%. It is estimated that the median household income in this area will be \$51,907 in 2013 which would represent a change of 11.8% from the current year. In 2008 the per capita income in this area was \$19,778 compared to the state's per capita income which was \$22,969.

Unemployment Rates

The Texas Workforce Commission reports a 5.6% unemployment rate for the Killeen Temple Metropolitan Statistical Area (MSA) as of December 2008. This is a 1% increase from the December 2007 unemployment rate of 4.6%. This is in line with the state trends, as the unemployment rate for the State of Texas was 4.3% as of December 2007 and 5.7% in December 2008. Currently, the Civilian Labor Force (CLF) for the MSA is at 155,900.

Housing

There were 92,948 housing units in the K-TUTS area at the time the 2000 Census was taken. Of those, 458 lacked complete plumbing, 724 lacked kitchen facilities, and 2,222 had no telephone in the unit. In the K-TUTS area, 7% of the housing units were vacant. The majority of families who owned a home paid less than 20% of their income on the mortgage. Most families who rented their homes paid less than 20% of their income on rent; however, a very large number of families paid more than 35% of their income on rent.

Fort Hood Influence

The inhabited areas of Fort Hood Military Reservation fall within the K-TUTS boundary. Even though K-TUTS does not have any authority on post, these residents should be included in the MTP because most, if not all, of the on-base population use the road systems in the K-TUTS area.

According to the Heart of Texas Defense Alliance, the Army named Fort Hood its best deployment site in 2003. The current military assigned population on post, including Air Force is 45,777 plus 17,232 family members. The total number of family members off-post is 19,996. This figure is down 54% from Mobility 2025 due to the current military deployment. The total number of military personnel with their families living within the K-TUTS boundary is 35,117 (not including Morgan's Point Resort).

Military personnel may also have a future impact on the population, as many people who leave the military decide to make their permanent homes in Central Texas. According to the Fort Hood Public Affairs Office Command Summary, there are currently 15,024 retirees/survivors/family members who live in the K-TUTS area. This is a 23% increase from Mobility 2025.

Currently, Fort Hood, the Army's Crown Jewel, has an estimated \$3.9 billion economic impact on the local economy. This economic impact takes place through salaries, contracts, and other out-paying sources.

SOCIO-ECONOMIC CHARACTERISTICS (FUTURE)

Statistics provided by the Transportation Planning and Programming Division of TxDOT show that significant growth is expected in the future for this area. The population for the entire K-TUTS area is expected to increase from 326,890 in 2005 to approximately 484,285 in 2035. With this 48% increase in population growth, industrial opportunities will increase as well.

The natural progression of more growth and more industrial interests creates an increase in travel demand, especially if the industries that come into the area locate in industrial sectors. Industrial sectors are generally located in areas that have little or no housing creating the need for employees to travel some distance in order to get to their jobs. More travel demand, leads to more congestion on our roadways. With more congestion and a fiscally constrained process, the MPO will need to search for alternative methods of achieving funding for transportation needs.

As congestion increases, the limited funds available for improvements will be stretched even further. As this situation continues, the MPO staff must work with the member entities to find more efficient uses of the limited resources available.

ENVIRONMENTAL JUSTICE

Environmental Justice is defined as “the right for all persons in a community to live in a safe, healthy, productive, and sustainable environment... where environment is considered in its totality to include the ecological, physical (natural and manmade), social, political, aesthetic, and economic environments.”

The Federal Highway Administration (FHWA) defines three basic principles of environmental justice:

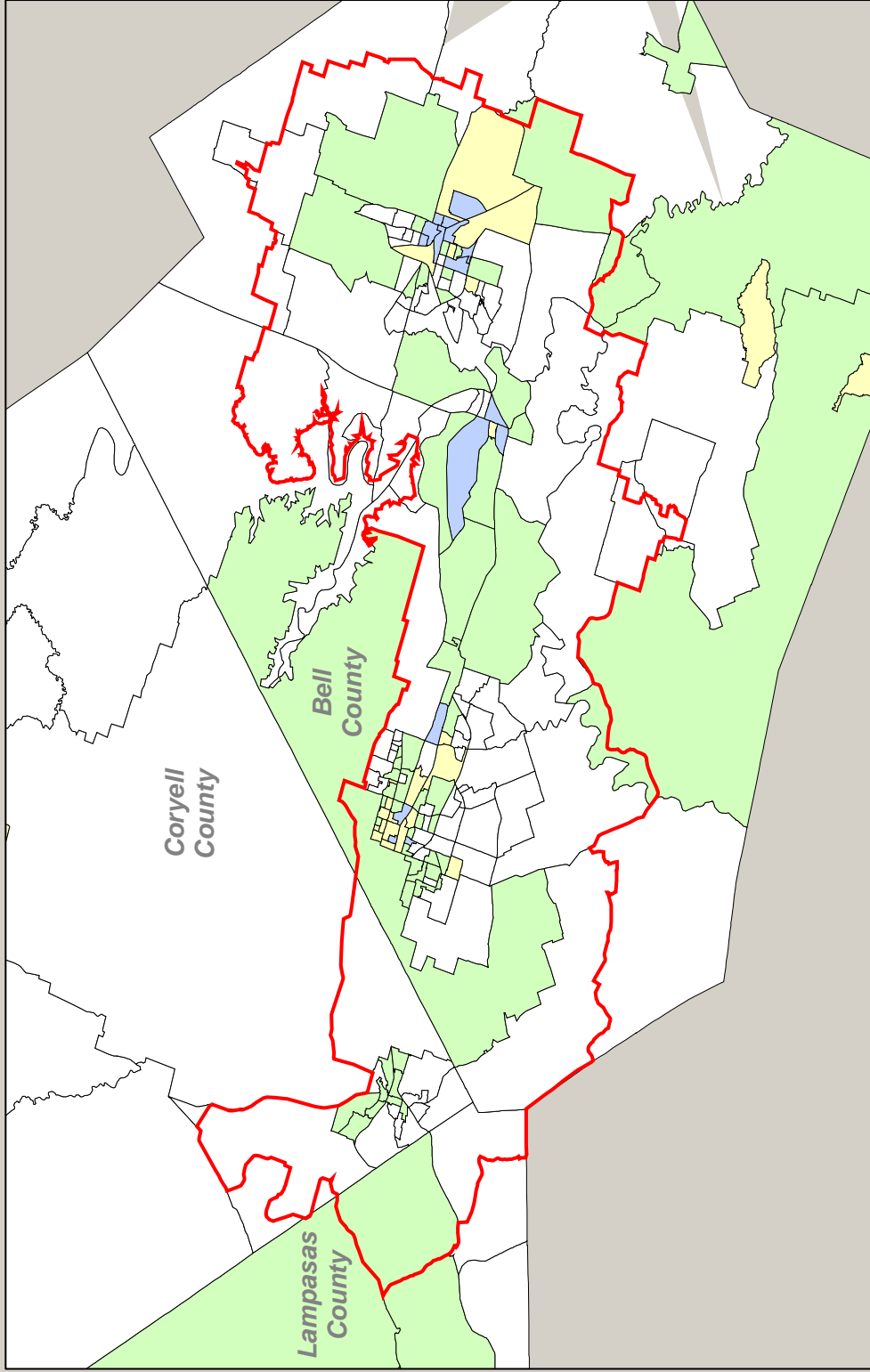
- Avoid, minimize, or mitigate disproportionately high and adverse human health and environmental effects, including social and economic effects, on minority populations and low-income populations.
- Ensure the full and fair participation by all potentially affected communities in the transportation decision-making process; and
- Prevent the denial of, reduction in, or significant delay in the receipt of benefits by minority and low-income populations.

K-TUTS ensures environmental justice through integration of the concerns for a wide variety of parties. Encouragement and facilitation of education on transportation issues assists with this accomplishment. Public outreach to community leaders, volunteers, and under-served groups help to remediate potential problems.

The following maps show potential areas of environmental justice consideration for poverty, disability, racial and ethnic groups.



Percentage of Population Below Poverty Level



Killeen-Temple Urban Transportation Study
March 3, 2009



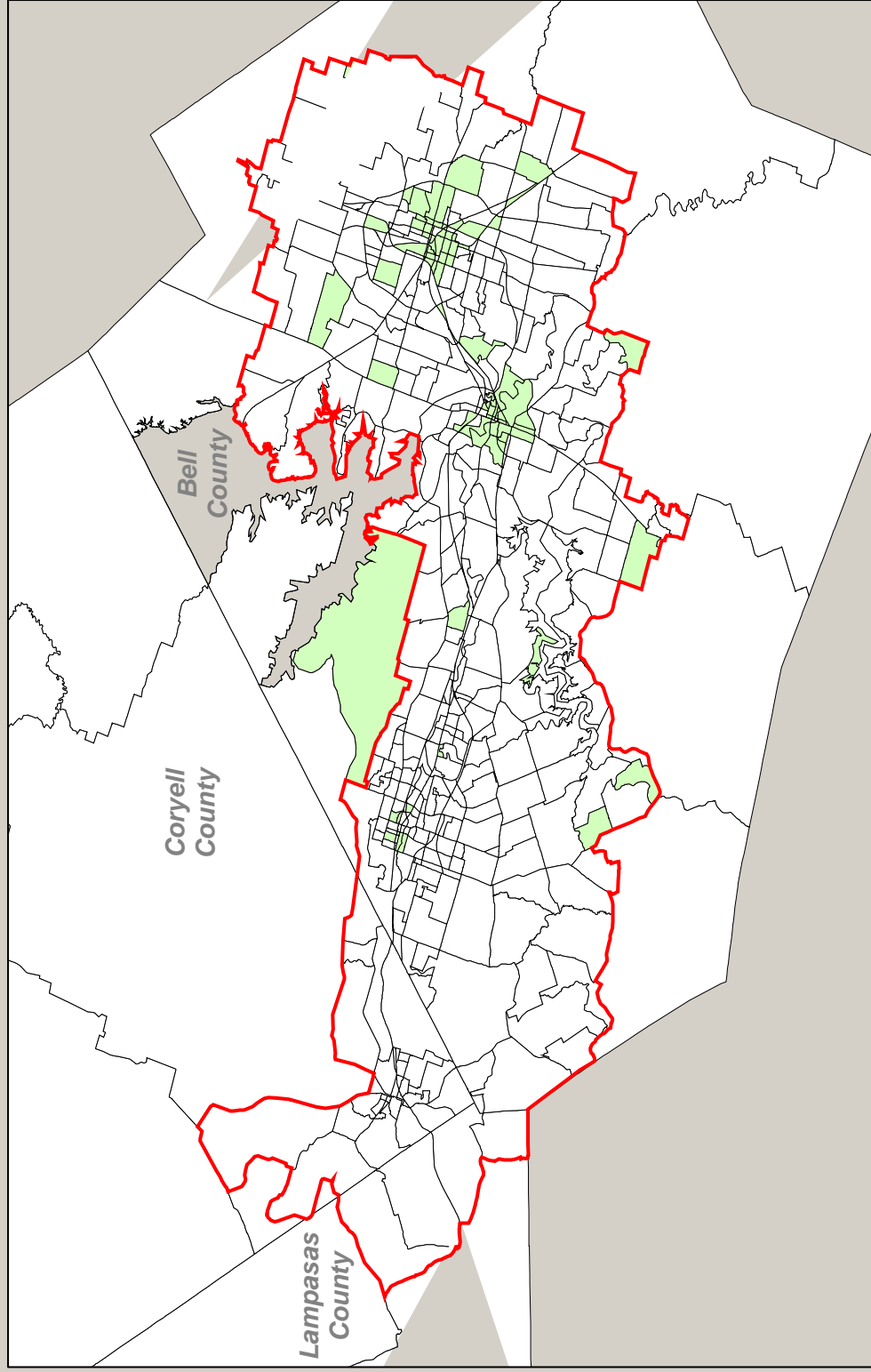
ktuts_ej_poverty_mtp_bkk_grp_2035.mxd
Poverty Data - Census 2000 SF3 Data
(1999 Income Bk Grp level)











Legend

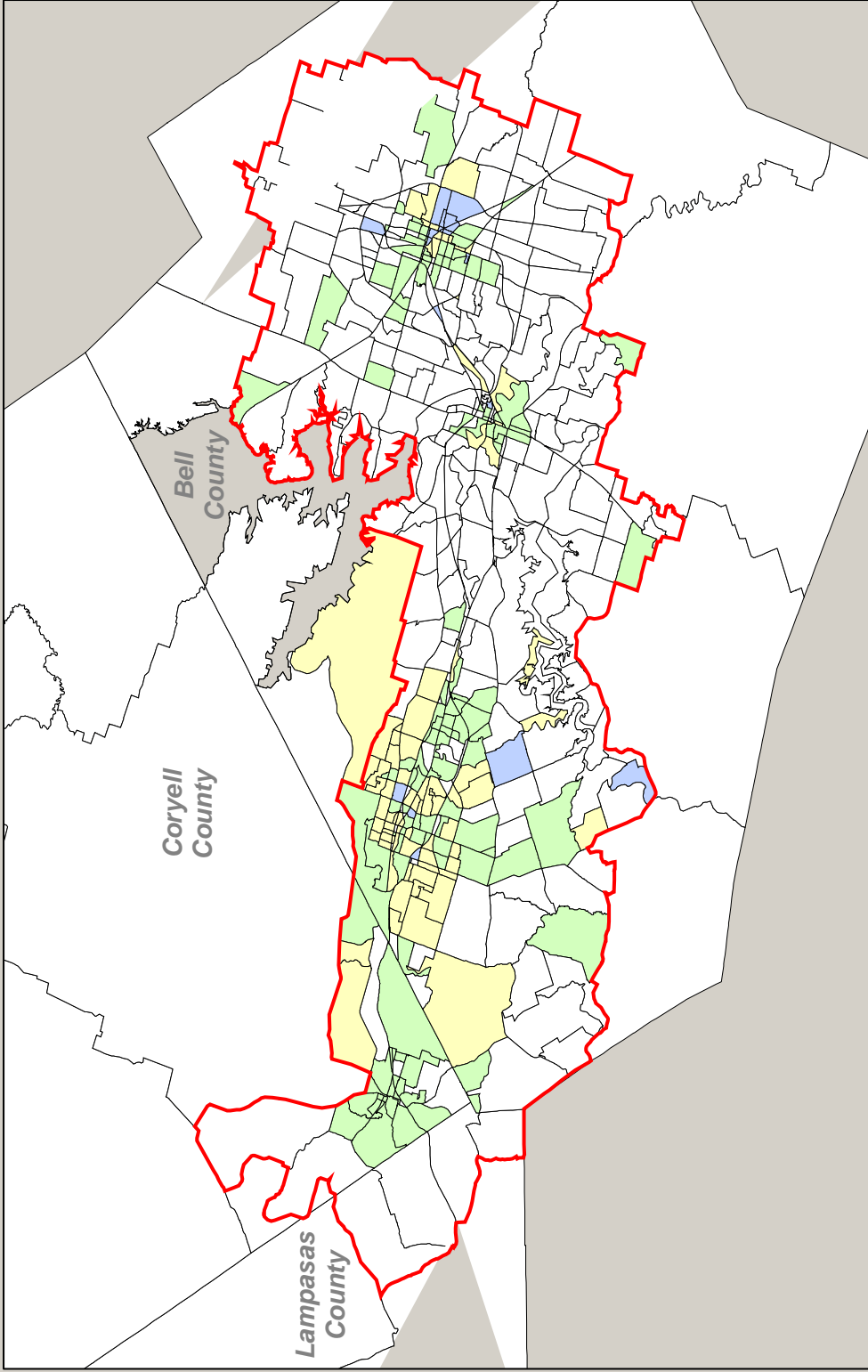
- K-TUTS Boundary
- Less than 10%
- 10 to 20%
- Greater than 30%

Hispanic Population Percentage



 <p>Killeen-Temple Urban Transportation Study March 3, 2009</p>	<p>ktuts_ej_hispanic_mtp_2005.mxd Census 2000 PL94-171 Data (TAZ Level)</p>	 <p>4 2 0 4 8 12 16 Miles</p>		Legend <ul style="list-style-type: none"> K-TUTS Boundary 50 to 75% Less than 25% 25 to 50% Greater than 75%
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Minority Population Percentage



Killeen-Temple Urban Transportation Study
March 3, 2009

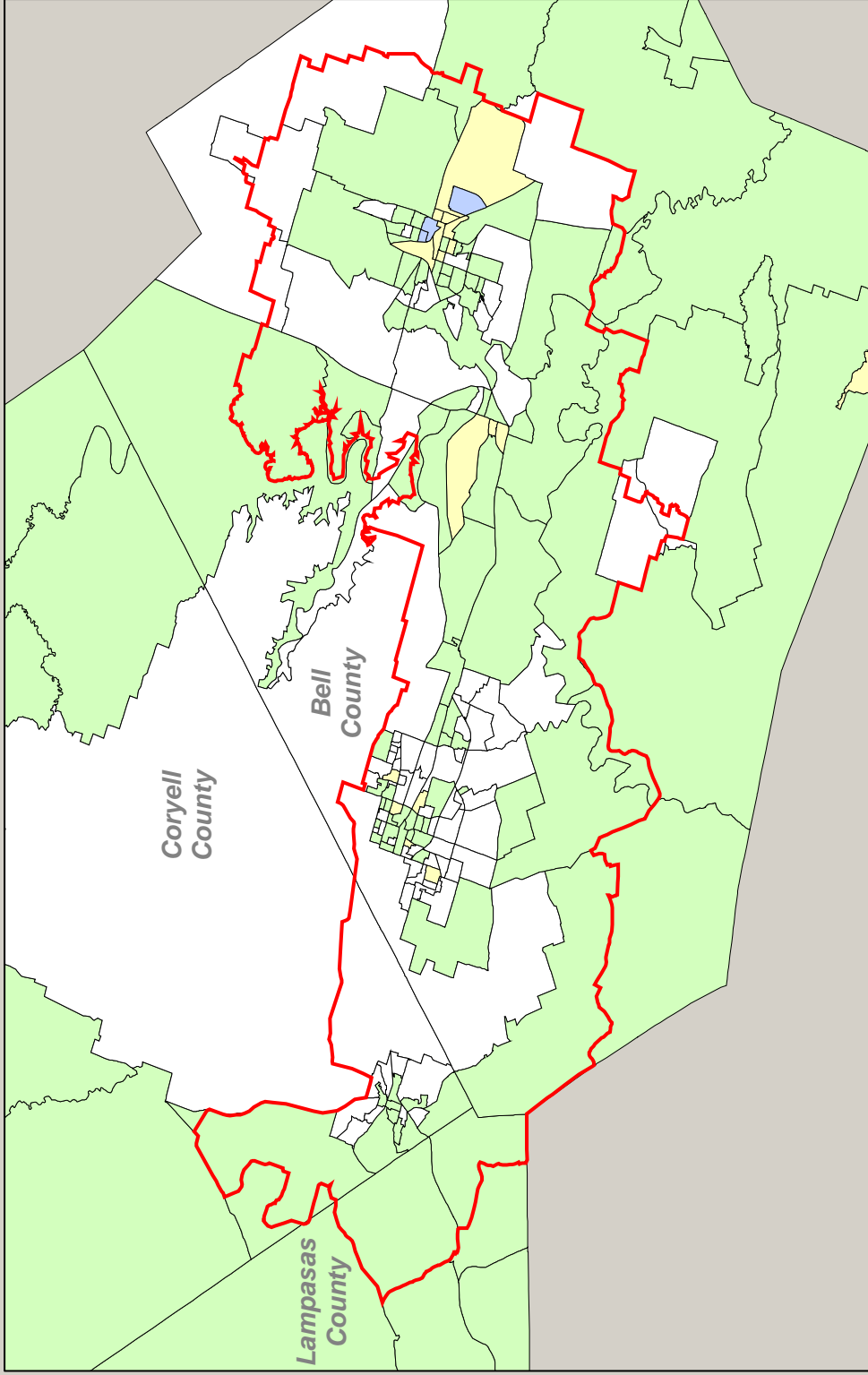


ktutis_ej_race_mip_2005.mxd
Census 2000 PL94-171 Data (TAZ Level)



- Legend**
- K-TUTS Boundary
 - Less than 25%
 - 25 to 50%
 - Greater than 75%

Percentage of Population with Disability



Killeen-Temple Urban Transportation Study
March 3, 2009



ktuts_ej_disability_mip_blk_grip_2035.mxd
Census 2000 SF3 Data (Block Group Level)



Legend

- K-TUTS Boundary
- Less than 25%
- 25 to 50%
- 50 to 75%
- Greater than 75%

Chapter 3: Vision, Goals, and Guiding Principles

Mobility 2035 is K-TUTS MPO Metropolitan Transportation Plan – the blueprint to address the mobility challenges created by our region’s growth. This long-range plan contains an integrated set of policies, strategies, and investments to maintain, manage, and improve the transportation system in the Central Texas region through the year 2035.

VISION

Preserve and enhance the Killeen–Temple Urban Transportation Study MPO area by developing a fully-integrated, multi-modal transportation system focusing on moving people and freight.

GOALS

- **Accessibility and Mobility** – Improve access to goods, employment, services, housing, and other destinations within the region and beyond.
- **Travel Options** – Provide a wide range of convenient, safe and affordable transportation alternatives.
- **Economic Vitality** – Enhance the economic vitality of the region by efficiently and effectively connecting people to employment, goods, and services.
- **Equity** – Pursue a transportation system addressing the needs of all people in all parts of the region and assure that impacts of transportation projects do not adversely affect particular communities disproportionately.
- **Transportation and Land Use** – Encourage the development of sustainable land use patterns designed to improve access to employment, services, and housing to everyone in the region.
- **Funding and Revenue** – Prioritize projected transportation funds to ensure the maintenance of current and future transportation systems.
- **Health** – Encourage transportation investments which promote healthy and active lifestyles.
- **Safety** – Improve the safety and security of all modes of transportation.
- **Environmental Sustainability** – Avoid, mitigate, and limit environmental impacts of transportation improvements.
- **Reliability** – Improve the reliability and safety of the transportation system.

GUIDING PRINCIPLES

Create a plan:

- Based on the best available data and analysis on all transportation modes;
- Built on the cooperation of all stakeholders in the region;
- Developed with opportunities for public involvement and participation;
- Respects the unique character of the communities within the region; and,
- Recognizes the need to make difficult choices to implement desired long term improvements.

Chapter 4: Financial Plan

Federal regulations require the financial component of the Metropolitan Transportation Plan to be “fiscally constrained”. The definition of “fiscal constraint” is the ability to demonstrate that the requested projects’ total cost does not exceed that amount which can be reasonably expected to be made available to the MPO. For any projected shortfall in available funds, the MTP must include proposed alternative funding or financing sources. This process is repeated for both highway projects and transit projects. For the highway element, this process results in two project listings. Those projects which can be constructed within the available dollars are placed on the short and long-range plan lists. Those projects which fall outside of the available funding limits are placed on the regionally significant – unfunded list. For the transit element, each provider’s federal, state, and local funding projection is provided.

In order to pursue solutions to transportation issues in the K-TUTS Region and in concurrence with the directives of the Texas Transportation Commission, which requests toll feasibility studies to be conducted on all new and added capacity controlled access facilities (as directed in Texas Transportation Commission Minute Order 109519), KTUTS supports that “TXDOT explore all funding mechanisms to expedite regional transportation goals, including the use of toll feasibility studies on those facilities which meet the commission Criteria.” Final Funding decisions will rest with the entity, the MPO, TXDOT, and RMAs (where applicable).

HISTORICAL BACKGROUND

The K-TUTS region relies primarily on state and federal funding to implement regional transportation improvements. Considerable statewide needs coupled with rising costs leave many transportation deficiencies without the necessary funding for construction. As a result, the Texas Transportation Commission and TxDOT are encouraging entities to seek alternate sources of revenue to remedy identified needs. During previous legislative sessions, several new funding tools and options were made available. These options include the enabling of toll equity, regional mobility authorities, and the Texas Mobility Fund. Other possible methods for funding include concessions, the federal Transportation Infrastructure Finance and Innovation Act of 1998, various other federal programs, and leasing right of way.

During the project planning and selection in Mobility 2035, cost estimates were developed for each project proposed. The costs of construction materials have fluctuated over the last several years causing estimating the costs of projects to be very difficult. In each case, the cost estimates have been prepared using the best estimating techniques available.

The process of forecasting future available financial resources is not preset. There are many variables which could be included in such an analysis. The methodology presented below attempts to account for those variables which can be reasonably forecasted.

METHODOLOGY

The methodology for determining the fiscal constraint figure for the next planning period is described in detail in this section. The process consists of the following steps:

- Review historical expenditures;
- Adjust historical expenditures to current dollars utilizing the Consumer Price Index;
- Compute future expenditure projections;
- Determine appropriate placeholders for specific funding categories; and
- Compute total fiscal constraint, amount available for programming, and total funding for the short and long-range plans.

Each of these steps is detailed in the following sections.

Review historical expenditures

Historical expenditure figures were obtained from TxDOT for the period 1998 to present. These figures were broken out into two categories: operations and maintenance and construction.

Adjusting historical expenditures to current dollars

The total historical expenditure figure computed in the above step included a mix of funds from a ten year period. In order to gain the most accurate picture of what impact those expenditures might have in the future, the figures had to be adjusted to the current dollar value. The factor selected for this conversion was the Consumer Price Index (CPI). The average construction CPI for the past ten years was computed to be 4.0%. Each year's historical funding was then adjusted by this factor to bring historical dollars to current dollars (2008).

Compute future expenditures

Once all historical figures were adjusted to current dollars, an average annual expenditure was computed. This average annual expenditure figure was then adjusted by the CPI inflationary amount of 4.0% over each year of the twenty five year planning horizon. The results of these computations are contained in Table 4.1.

Table 4.1 Average Annual Expenditures

Type of Expenditure	Avg. Fund/Year (2008 \$)	Total Funding 25 Year Plan
Construction	\$32,355,837	\$1,347,488,226
*Maintenance & Operations	\$5,451,030	\$227,013,104
Total	\$37,806,867	\$1,574,501,330

* Maintenance and operations include funds spent within the K-TUTS area for transportation maintenance and operations, not for construction.

The totals above represent the amount of federal and state dollars forecasted to be available for programming during the planning period.

Determine appropriate placeholders for specific funding categories

Placeholders for specific project types are used to make the completion of routine projects easier. Five types of placeholders were recommended for inclusion in this plan which mirrors the TxDOT grouped projects CSJ program of which the KTUTS MPO participates. The total amount for the placeholders were computed by extrapolating the average annual expenditure within the Maintenance and Operations funds over the twenty five year planning horizon. The total amount for the placeholders were then placed into the specific categories based on recommended percentages. (See Table 4.2)

***Table 4.2 Maintenance Placeholders**

Placeholder	Short Range Plan	Long Range Plan	Total
Preventive Maintenance	\$39,267,391	\$96,940,471	\$136,207,862
Structures Replacement	\$6,544,565	\$16,156,745	\$22,701,310
STP Safety	\$9,816,848	\$24,235,118	\$34,051,966
Transportation Enhancements	\$6,544,565	\$16,156,745	\$22,701,310
Miscellaneous	\$3,272,283	\$8,078,373	\$11,350,656
Total	\$65,445,652	\$161,567,452	\$227,013,104

*Please see Table 7.1 in Appendix A for a complete list of categories.

The total amount of construction funding available for inclusion in the short and long-range plans is the construction funding listed in figure 4.1. Table 4.3 below shows the breakdown of funding expected within the Short Range and Long Range planning horizon. These funding totals are derived from the average yearly funding expected within the timeframe using the CPI inflationary factor.

Table 4.3 Total Construction Funding Available

Funding Categories	Amount
Total Funding for Short-Range Plan (10 yr. Plan)	\$388,467,647
Total Funding for Long-Range Plan (11-25 yr. Plan)	\$959,020,579
Total Funding Available for Projects	\$1,347,488,226

The Total Project Costs (TPC) for the Short-Range and Long-Range project listings had to be considered for final inclusion into the MTP. The Total Project Cost includes the Year Of Expenditure (YOE) construction costs plus the right of way and preliminary engineering costs. Year Of Expenditure construction costs were calculated using the 2008 construction costs and adding a 4.0% yearly inflationary factor based on the estimated let date, or construction date of the project. Right of way and preliminary engineering costs were added to the year of expenditure cost to then represent the total project cost. Right of way and preliminary engineering costs are in addition to the total construction funding available and are assumed to be available to increase the total fiscal constraint of the MTP.

TRANSIT FUND PROJECTIONS

Due to the rapidly changing nature of transit within the K-TUTS area and the establishment of fixed route service in the Killeen and Temple urbanized areas, projections were based on the average expenditures from 2000 to the present. Current trends were taken into account and a consumer price index of 4.0% was used to calculate inflation. The resulting funding availability for transit through 2035 is \$115,645,140. Table 7.5 in Appendix C provides detailed information on funding availability through 2035.

CONCLUSIONS

The fiscal constraint figures formulated in this section represent the best possible forecast of available resources for use within the K-TUTS region. The total amount available represents a steady increase over the previous twenty-five year MTP period. Highway and transit systems within the K-TUTS region are constantly changing in response to the rapid growth experienced in recent years. These factors, coupled with the demand for services statewide, make the task of predicting future available funding difficult. The projections presented are the region's conservative estimate and are suitable figures for which to plan and prioritize our regional needs.

Chapter 5: Future Considerations

STRATEGIC CORRIDORS – Innovative Connectivity in Texas

K-TUTS will continue to be involved with all aspects of planning the evolving TTC-35 Corridor concept. Texas is uniquely positioned astride cross-continent traffic as well as routes from Mexico to the rest of the United States and Canada. As the population of Texas grows, the need for a well-planned transportation infrastructure becomes clear.

The Strategic Corridors – Innovative Connectivity in Texas concept is a design of wide corridors supporting rail, truck freight, passenger vehicles, utilities and resources such as oil, gas, electricity, data and water. The initial proposal described a 4,000 mile network of corridors up to 1,200 feet wide with separate lanes for passenger vehicles (three in each direction) and trucks (two in each direction). It also included six rail lines (three in each direction): two tracks for high-speed passenger rail, two for commuter rail, and two for freight. The dedicated utility zone will be a 200 foot corridor.

In January 2009, TxDOT Executive Director Amadeo Saenz unveiled several revisions during his remarks at the Fourth Annual Texas Transportation Forum. The Trans-Texas Corridor name will gradually be phased out in favor of identifying segments by their original names (SH130, I-69, or Loop 9). The right of way for the segments will be reduced from the original estimate of 1200 feet to as little as 600 feet. Utility and rail corridors may still be included in each individual segment. The changes are detailed in *Innovative Connectivity in Texas/Vision 2009*, the revised version of *Crossroads of the Americas*, the TTC's original concept document. This document may be viewed at www.keeptexasmoving.com.

Factors involved in considering the need for transportation corridors:

- Provision of faster and safer transportation of people and freight.
- Relief for congested roadways.
- Reduction of transport of hazardous materials in populated areas.
- Improvement of air quality by reducing emissions.
- Provision of a safer, more reliable utility transmission system.
- Promotion of economic growth and development through the creation of new markets and new jobs.

Costs and Funding

Proposition 15, which created the Texas Mobility Fund, allows more flexibility to pay for transportation projects. This includes public-private partnerships called comprehensive development agreements and other funding options. The Legislature has passed several pieces of transportation legislation that empower Texans with new funding mechanisms and authorized increased partnership capacity for major infrastructure projects.

Funding from the recent American Recovery and Reinvestment Act of 2009 will be directed to projects that are 'shovel-ready', not projects that are still in the design and environmental study stages, such as TTC-35 or other strategic corridors.

The narrower design concept has an estimated cost of \$19.3 million per centerline mile for the construction, engineering, and right of way cost for the primary roadway. Bridges are estimated to cost as much as \$1.7 million per crossing. Construction of miscellaneous components such as toll booths, plazas, rail passenger stations, dispatch control centers, and maintenance sites is not factored into the above costs. Operations and Maintenance costs (O&M) are estimated to be \$700,000 per mile per year.

Planning

Public Involvement will be a key part of planning and developing the corridor. The route-selection phase will allow identification and changes through a detailed, project-specific process of public involvement. The corridor will be developed in phases through several scenarios. Heavy truck lanes will be built first, to be shared initially by both passenger vehicles and trucks. As traffic volumes increase and additional capacity is warranted, separate passenger lanes would be constructed without disrupting the existing roadway.

The Corridor Advisory Committees and Corridor Segment Advisory Committees, comprised of citizens from affected communities, will guide project development weighing in on issues from transportation needs to mode and route location. TxDOT officials have stressed that the agency will focus on improving existing and planned transportation facilities, rather than breaking new ground for the project: Tier One and Tier Two

Right of Way

A 600 foot wide corridor will require 72.7 acres of right of way per mile. The total anticipated right of way for 4,000 miles of 600 foot wide corridor is 291,000 acres.

Right of Way Acquisition

Property rights will receive high priority in the property acquisition process. Acquisition will be characterized by public-private investment including financial participation by utilities, railroads, developers, and landowners.

Rail

For the rail component of the corridor a single track would be constructed initially along segments most needed to relieve pressing transportation problems. The corridor will give the Texas residents and visitors the ability to travel by commuter and high speed rail. Rail will also provide more capacity for freight (both rail and truck). Construction of high-speed passenger rail to connect the largest population areas will be implemented as the need grows for travel alternatives.

Utility

The 200 foot wide utility zone will accommodate large water lines, natural gas and petroleum pipelines, telecommunication fiber-optic cables and high power electric lines. The dedicated zone will reduce the chances of pipeline damage and the related safety and environmental consequences. It will provide the efficiency of pipeline systems, more capacity for electrical

transmission systems, improve cost effectiveness by providing advanced telecommunications and data transmission to all areas of the state, and it will facilitate the long distance transfer of fresh water to areas of the state in need.

Environmental

The environmental studies for TTC-35 will comply with the National Environmental Policy Act of 1969 (NEPA). These studies will be used to narrow the project study area and determine a final route alignment, as well as to identify potential project impacts, costs, and mitigation measures. These studies will address effects on the ecosystem and cultural resources. The focus for such efforts will need to include air quality, water quality, cultural resources, endangered species, and environmental review.

A full section of avoidance, minimization, and compensation tools will be needed to successfully address resource mitigation in a timely manner.

The framework for environmental review includes:

- Conceptual planning,
- Early public involvement,
- Corridor studies and identification,
- National Environmental Policy Act and mitigation,
- Corridor preservation.

Toll Segments

The toll segment of the corridor will be developed through a variety of means including low-bid contracts for turnpike improvements coordinated by TxDOT. Another mechanism for toll-segment development would be through low-bid contracts coordinated by regional mobility authorities. Development also can occur through exclusive development agreements (also containing a franchise agreement) with private-sector developers. Administration of such projects would come through TxDOT, a regional mobility authority, or a regional toll authority. Proposals for exclusive development agreements would be solicited by requests for proposals or submitted by private entities as unsolicited proposals. Regional toll authorities or a county authority also could play a role in development of the corridor's toll segments. Legislative action will be required for full implementation of such options.

Economy

With the truck lanes separated, only those lanes must have load carrying capacity pavement, which is more expensive. The separation also enhances operational efficiency and toll viability. The user appeal is that passenger vehicles will not have to slow for trucks climbing grades.

High operational speeds

The corridor will be designed for the following operational speeds between connections:

- 200 mph for high-speed passenger rail,
- 80 mph for commuter/freight rail,
- 80 mph for tollways.

Bridge Structures

The corridor may cut through about 1,200 unpaved county roads. These roads will be reconnected to other facilities to maintain efficient traffic flow. TxDOT will endeavor to assist counties in rebuilding any important intra-county routes affected by the corridor.

Future Activity

The Texas Transportation Commission took its first step toward implementing designated truck lanes when it proposed rules regulating such lanes.

The two legislative bills – House Bill 1208 and Senate Bill 514 – passed during the regular session of the 78th Legislature allowing Texas DOT (TxDOT) and counties to designate restricted travel lanes by class of vehicle, including commercial vehicles. Both TxDOT and counties must also work with affected municipalities to impose such restrictions, and counties must have TxDOT approval. Municipalities already have the authority to propose such lane restrictions with TxDOT approval.

SH 130

State Highway 130 operates as a toll road corridor between Georgetown and Austin, with segments planned to connect to Interstate 10 near San Antonio. Additionally, SH 130 may form part of the TTC-35 concept of a series of linked corridors. A future segment of TTC-35 passing through the K-TUTS area may link with the northern terminus of SH 130, allowing long-distance traffic to bypass congested urban areas.

SH 130 has already begun to alleviate traffic congestion on IH-35. As construction continues to widen State Highway 195, motorists from the Killeen/Fort Hood area will be able to travel a more direct route through Georgetown to Austin and southern Texas. This will decrease driving distance as well as reduce congestion on US 190 and sections of IH-35 in the K-TUTS area.

INTERSTATE HIGHWAY 35 CORRIDOR

The presence of I-35 brings numerous vehicles into and through the K-TUTS area. I-35 in the TXDOT Waco District runs through Bell, Falls, Hill, and McLennan Counties of Central Texas.

According to the Texas Transportation Institute, many of Texas' metropolitan areas are within the top 85 congested areas in the country resulting in lost time, increased pollution, and frustrated drivers. According to the Federal Highway Administration, 40% of congestion is caused by bottlenecks. Adding more lanes to I-35 should relieve current congestion and accommodate traffic needs in the near future. Long-term plans will address relief routes and alternative corridors to alleviate traffic on I-35, particularly through urbanized areas.

Bell, Falls, McLennan, and Hill Counties

Efforts to improve traffic flow and safety on I-35 are already taking place. Other improvements to the transportation system are planned for the future including major upgrades to I-35, US

Highway (US) 183, and SH 71. Long-range plans also call for substantial new investments in transit infrastructure along with programs and policies to curb travel demand, encourage more transportation-efficient land use patterns, and generally provide for more alternatives to single-occupant vehicle (SOV) travel. However, long-range traffic forecasts have shown that even with these improvements, programs, and policies, there will remain a high level of congestion on I-35 and other major transportation facilities in the corridor.

The Texas Department of Transportation is committed to widening a 94-mile segment of Interstate 35 to a minimum of six lanes from the Williamson/Bell County line to the I-35 East/West split near Hillsboro.

Traffic demands on I-35 in Bell, Falls, McLennan, and Hill counties - located in TxDOT's Waco District - continue to increase in part as a result of the North American Free Trade Agreement. Even though some elements of NAFTA have not been fully implemented, trucks currently account for 25 to 30 percent of all traffic on the interstate. Overall traffic on this section of I-35 is projected to increase by 50 to 100 percent during the next 20 years.

Improvements to the Interstate 35 corridor form a key part of the TxDOT plan to provide reliable mobility, improved safety, and economic vitality for the KTUTS region. Research has shown that TxDOT expenditures between 1996 and 2006 generated a significant amount of economic benefits. During that time 89,000 jobs were created resulting in \$4.1 billion in labor income. \$7.5 billion of TxDOT investments generated \$24.5 billion in travel efficiency and economic gain for residents and businesses in Texas (*2009 TxDOT Strategic Plan*).

TxDOT recognizes six segments of I-35. Segments 1 - 3 stretch from south of Salado to north of Troy. Currently, TxDOT is funding \$346 million of construction on I-35 in Bell County alone, 96% of which will pay for adding new lanes. Future lane additions may include widening I-35 between US-190 in Belton and FM 2484 in Salado.

Additional Funding

On Monday, February 23, 2009 TxDOT provided the House Select Committee on Federal Economic Stabilization Funding information on its efforts to implement its portion of the American Recovery and Reinvestment Act (ARRA), commonly known as the Economic Stimulus Package.

TxDOT released a list of transportation projects that would require \$2.2 billion in stimulus funds that department staff will eventually narrow to projects requiring \$1.2 billion. TxDOT also provided the committee with a list of maintenance projects that would require \$508 million in stimulus money.

The portion of funding for Texas transportation includes:

- The estimated creation of more than 23,000 direct jobs and 69,000 total jobs.
- Approximately \$2.6 billion dedicated to transportation projects around the state.
- Funding for highway, bridge, transit, aviation, and rail projects.

This is a reimbursement program. Texas will not receive the dollars up front.

TxDOT has worked with MPOs, transit authorities, toll entities, and the Federal Highway Administration since late 2008 to identify \$13 billion worth of construction projects that meet the requirements of the stimulus program. Projects funded through the stimulus package must be “shovel-ready”, meaning they are ready to go to contract within the time limits of the legislation. “Shovel-ready” means:

- all environmental requirements will have been met,
- design work will be complete, and
- sufficient amounts of right-of-way will have been secured to allow construction to begin.

Funding from the American Recovery and Reinvestment Act of 2009 was recently authorized to widen the section of I-35 between Belton and Salado.

Table 5.3 Projected Daily Truck Volumes in I-35 Corridor

Location	2025 Truck Volume on I-35			Volume on Truckway Lanes	on All Vehicles
	International	Other	Total		
Laredo - San Antonio	3,700	600	4,300	3,400	12,400
San Antonio-Austin	3,350	14,750	18,100	14,200	82,100
Austin-Waco	3,010	11,590	14,600	11,400	69,100
Waco-Dallas	3,050	6,250	9,300	7,300	41,600

Truck Traffic on I-35

In 2007, 9,179,573 trucks were registered in Texas, a 6.2% increase from 2006. (Federal Highway Administration). According to a July 2007 study performed by Texas A&M University, daily traffic volume on one section of I-35 in Austin was 27,670 vehicles. Truck traffic accounted for 3,289 of those vehicles or approximately 11.5% of total traffic. Table 5.3 shows projected traffic volumes along different sections of I-35.

In a number of urban areas, relief routes are recommended because of the inability to meet the travel demand within the existing right-of-way constraints. Any capacity needed that will not be met within the right-of-way limitations or other options will have to be met by a separate relief route. The details of actual location and dimensions for specific relief routes of I-35 will require local studies.

OTHER CORRIDORS

State Highway 201

SH 201 is currently a 7.5 mile stretch of highway that provides access to the Killeen–Fort Hood Regional Airport and numerous residential and commercial developments from US 190 to the north and SH 195 to the east. This area has experienced tremendous growth over the last several years, and State Highway 201 is designed to be the major corridor serving the transportation needs of that region. Residential and commercial development is expected to continue in the area with the addition of a new Texas A&M campus and the construction of a new runway at the Killeen–Fort Hood Regional Airport. Additionally, the potential for an increase of troops and the upgrade of health care and research facilities at Fort Hood will continue to add pressure to the transportation system.

Planning is being conducted on the next segment of State Highway 201 with the intent to:

- Provide improved east/west mobility in southern Bell County by directly connecting Interstate 35 and SH 195.
- Provide a high-speed east/west facility as an alternative to FM 2484.
- Provide relief to US 190 by establishing an alternate route between the fast-growth area of southern Bell County and the developing corridor of Interstate 35 near Salado.

In fiscal year 2004, the SH 201 project received national corridor planning and border development funds which were used for the feasibility study of the SH 201 extension.

US 190 Extension

US 190 crosses Texas as a generally east–west corridor. In a few instances US 190 is misdirected off the east–west orientation. One such occurrence happens in Belton when US 190 travels concurrently with I–35 northeast to Temple. Extensions of US 190 have been considered in a Major Investment Study completed in 1999, and TxDOT is in the process of completing a new US190/IH 10 Feasibility Study that will be available in August of 2010. The general concept of the corridor extension attempts to provide a more direct east–west connection for the region by connecting US 190 from Belton to the southeast side of Temple. This in turn would allow US 190 to continue to serve local, regional, and military traffic within and through the K–TUTS region. Traffic flow is expected to double over the next 25 years according to the TxDOT Traffic Analysis Section and the need for this extension will increase.

Loop 363 Expansion

Loop 363 in Temple has seen traffic increase tremendously. Expansion of this corridor is in the process to accommodate these changes. Increasing capacity to 6 lanes with one way frontage roads on the southern portion of the loop will allow better flow of traffic and easier east west movement through Temple.

The Texas Department of Transportation (TxDOT) began a project to reconstruct a portion of Loop 363 in Temple from south 57th Street to south 5th Street in September of 2005.

The nearly two-mile project will widen the existing 4-lane divided roadway travel lanes and shoulders, increase frontage roads to a minimum of three-lanes and add continuous turn lanes to the 31st Street bridge, as well as improve the north/south approaches to the bridge from 31st Street.

Improvements to the Northwest portion of Loop 363 are planned to include continuous frontage roads and expansion to four lanes. This will allow the efficient movement of freight to and from the Industrial Park. Also included in future plans are improvements to the East side of Loop 363 that will increase the facility to four lanes. These plans will increase safety and mobility greatly throughout the Temple area.

Chapter 6: Alternatives

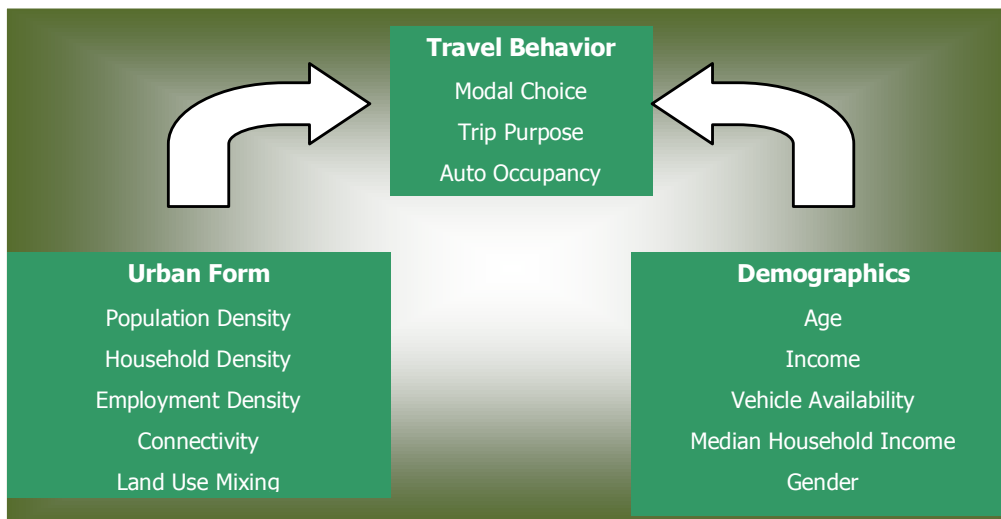
HOW DOES K-TUTS ANALYZE AND COMPARE ALTERNATIVES

General Overview

K-TUTS' goal is to identify and implement a realistic, affordable, and effective transportation management process that preserves the existing system and promotes a network of transportation improvements providing effective movement of people and goods through continuing, cooperative, and comprehensive planning.

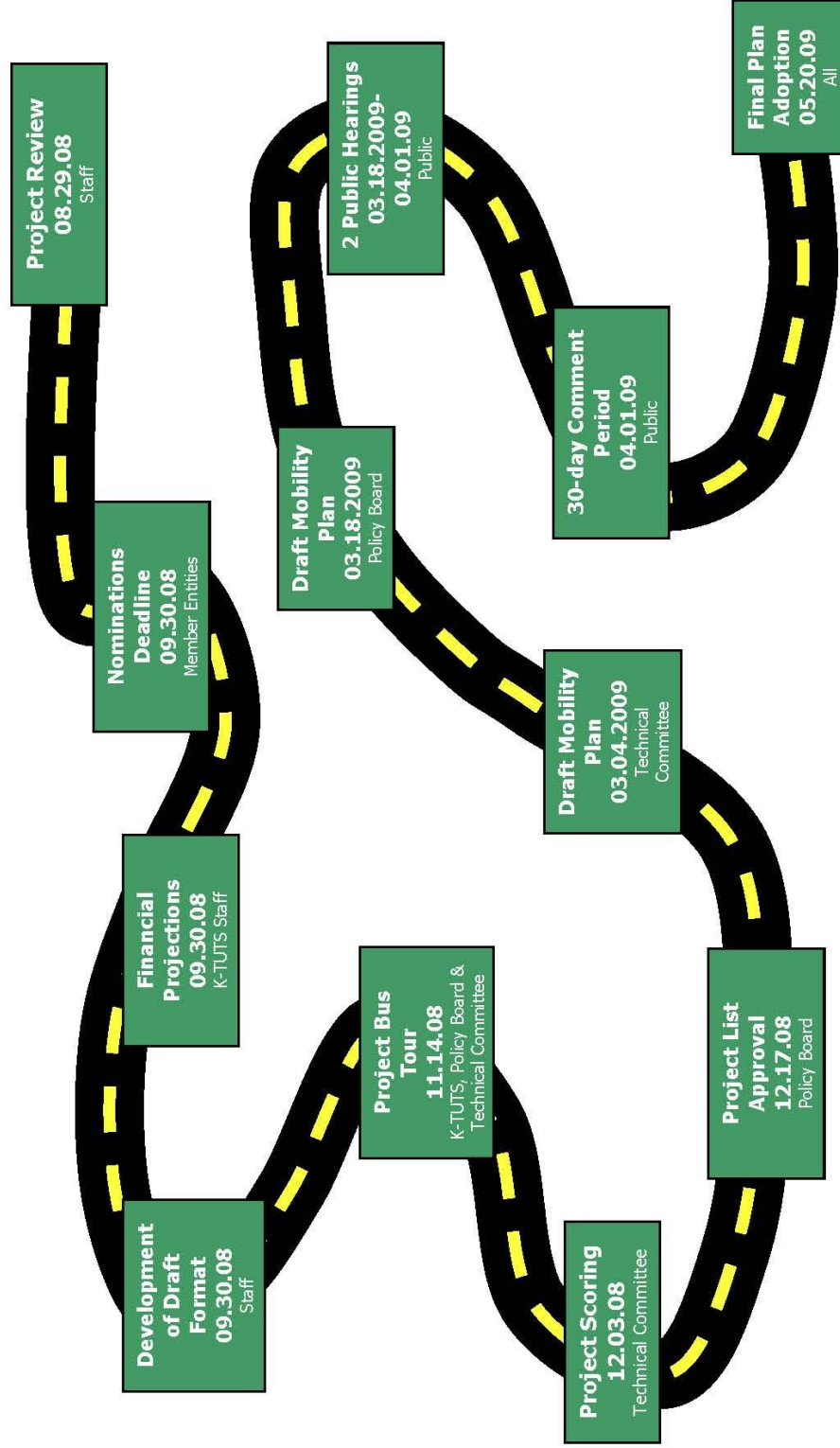
The major objective of the plan is to identify the transportation needs of the Killeen-Temple Metropolitan Transportation Planning Area and to implement solutions that would satisfy the following criteria:

- Consistent with adopted land use plans and promote economic development;
- Provide mobility, accessibility, connectivity, and circulation;
- Sensitive to the needs of both the human and the natural environment;
- Cost effective and cost efficient; and
- Promote intermodal development and usage.



The entire process of adopting a plan that comprises alternatives includes months of research and development. The entire process can best be summed up in the MTP Development figure on the following page.

MTP Development



PROJECT SELECTION PROCESS

Project Review. K-TUTS Staff reviews the previous MTP to determine projects that have been let and completed. At this point, changes in policy and funding categories are documented and prepared for if necessary.

Project Nominations Deadline. Member entities such as TxDOT, municipalities and counties are encouraged to submit proposed improvements and/or new transportation projects due to development and noticeable changes in usage. In order for K-TUTS Staff to have sufficient time to analyze, research, and compile all of the member entities information, a deadline is set. After this point, adjustments to the transportation model (see Technical Process later in chapter) and development of a master scoring list are developed.

Financial Projections. Historical expenditures on similar projects over the past twenty years were evaluated. These estimates were then inflated using the CPI average for the same time period. Cross-coordination with TxDOT about economic values and construction criteria were vital in this step. Policy Board reviews the data and approves the total amount in the Financial Plan as the MPO's economic plan and places the projects into a fiscally constrained plan as required by SAFETEA-LU. In order to ensure consistent cost estimation, all project costs are double checked by TxDOT.

Development of Draft Plan. MPO staff uses TransCAD to determine future level of service for proposed improvements and no-build scenarios. No-build scenarios involve determining the level of service and capacity for the future assuming the project is never placed on the ground.

Project Bus Tour. After conferring with member entities, a tour of the highest recommended projects is developed. Members of the Technical Committee, Policy Board, and K-TUTS Staff attend to witness first hand the need and location of proposed projects.

Project Scoring. Project scoring is the key to developing a short range, long range and regionally significant - unfunded list. Using the ranking, the costs are subtracted from the total financial plan until the first ten years of funding is used creating the Short Range listing. The Long Range listing is determined by using the same process for the remaining projects against the remaining funding. Projects left without funding are placed on an unfunded list.

Draft Mobility Plan. K-TUTS Staff develops the Metropolitan Transportation Plan. A process of review and updating statistical data is implemented in this process. The plan is presented to Technical Committee and Policy Board for input as to clarity, structure and inclusion of all necessary information.

Public Hearings. As required by the Public Participation Plan (PPP), two public hearings are held to allow for public involvement and to initiate the public comment period.

HIGHWAY

Although the K-TUTS region contains possible transportation alternatives such as heavy rail, air service, a newly developed transit system, and bicycle/pedestrian trail, highways are currently the only system that interconnects communities across the region. This makes highways the primary tool in intra-regional travel in this area.

Maintenance and developmental funding for this highway system is obtained from one or a combination of federal, state or local dollars. Unlike a majority of transportation projects and planned maintenance funding, some significant projects arrive in the region with their own dollars. In the interest of forecasting transportation funding, all known projects' monies are grouped together.

Though the need may always exist for facility improvements and expansions, economic and environmental costs coupled with the rapid increases in travel demand expected over the next few years dictate that more efficient alternatives be found. Transportation System Management (TSM) and Transportation Demand Management (TDM) strategies can improve mobility and increase system efficiency without the need for construction of new facilities. TSM and TDM alternative categories include: traffic engineering improvements, traffic control improvements, freeway management strategies, ride-sharing programs, parking management, and improvements to local transit options.

Traffic Engineering Improvements

Traffic engineering improvements are implemented to assist in the alleviation of congestion, reduce accidents, and minimize conflicting turning movements. Improvements within this category include:

- Installation of left and right turn lanes;
- Designation of one-way streets or pairings;
- Use of reversible traffic lanes;
- Intersection widening;
- Installation of bus or vehicle turn out bays;
- Improved signage and pavement maintenance.

The cost of traffic engineering improvements varies considerably depending on the size and scope of a project, but the benefits usually exceed the cost. Traffic engineering solutions improve the capacity of a roadway by moving traffic more efficiently through the system.

Traffic Control Improvements (TCI)

TCI enhances existing conditions by reducing travel time, delays, and congestion. Strategies include:

- Coordination of traffic signals;
- Use of bus priority signal control systems;
- Implementation of computer controlled traffic networks.

As with traffic engineering improvements, the cost of each alternative will vary considerably, especially in the instance of computer-aided network and freeway management.

Freeway Management Strategies

The development of a comprehensive freeway management system is used to relieve traffic delay resulting from congestion. Benefits often include an average reduction in delay and an average increase in vehicle speeds. According to the *Transportation Planning Handbook*, a comprehensive freeway management system would include the following elements:

- surveillance systems to monitor traffic conditions and collect traffic data;
- ramp meter signals to smooth traffic flow and improve freeway speeds;
- control systems to regulate traffic flow to prevent the onset of congestion and restore free flow more quickly when traffic breaks down;
- incident management programs to reduce the number and duration of incidents;
- motorist information systems to provide real-time information to drivers on traffic conditions;
- spot geometric/capacity improvements to reduce or eliminate bottlenecks; and,
- develop and implement toll-ways in the region

Alternatives to Improvements

Alternatives to automobile travel must compete for support based on convenience, travel-time savings, and availability. The lower land development costs, lack of restrictions, and location of preexisting rural roadways hinder development that would make certain alternatives more feasible; light rail for example. Growth management and population density control in communities could be one primary way to help further utilize and develop alternative modes of transportation.

Ride-sharing programs

Carpooling is most effective at employment sites with strong support from administrative bodies. Ride-sharing programs are designed to reduce vehicle trips to the site and thereby relieve congestion at the site entrance or adjacent intersections. Implementations of a successful ride-sharing program include:

- Employer transportation coordination;
- Preferential parking for ride-sharing participants;
- Flexible work hour policies;
- Marketing and promotional programs;
- Revised parking and zoning codes;
- Ride matching services.

Improvements to local transit options:

Transit is a critical component of reducing the dependence on automobile-oriented travel. Transit providers must increasingly view themselves in the mobility arena rather than just operators of traditional services. Through the provision of increased transit options, the region can meet many goals simultaneously: provision of service to former welfare recipients, increased accessibility, and environmental gains.

Limitations to Determining Alternatives:

TSM/TDM (Transportation System and Demand Management) alternatives are difficult to ascertain within the K-TUTS region. A few critical issues that must be addressed prior to determining appropriate alternatives in this region include:

- documenting congestion relief;
- limited funding availability;
- subsidized auto use;
- the lack of competitive mobility alternatives; and
- existing land development patterns

Currently, there is very little data to compare the region-wide effectiveness of demand versus supply side strategies. In addition, the effect of TSM and TDM strategies are not represented in the regional traffic model making it difficult to predict the potential impacts prior to implementation.

TRANSIT

The provision of efficient mobility options for the K-TUTS region is inherently tied to the maintenance and expansion of the regional public transportation system. Substantial changes have occurred in this region since the adoption of Mobility 2025. Public transit creates opportunities for employment, education, recreation, shopping, social activities, community involvement, and cultural activities for people with limited transportation means. Public transportation is part of the foundation for the enhanced quality of life in an urban environment.

Regional Direction for Transit

The transit element of Mobility 2035 builds upon the vision and goals provided in Mobility 2030. K-TUTS continues to promote expanded bus services to address efficient mobility and increasing the transportation options available to all Central Texas residents. The following objectives outline the transit policies desired within the K-TUTS planning region through the year 2030:

- Designate and develop priority transit corridors to include facilities such as transit terminals, park & ride lots, and a regional multi-modal facility.
- Create innovative multimodal transportation strategies supportive of mass transit and other alternative modes of transportation such as carpooling, bicycling, and walking.
- Develop a comprehensive program of transit improvements designed to encourage additional ridership for existing facilities.
- Implement increased use of Intelligent Transportation System (ITS) technology within the existing system which increase the ease of using the transit system, provide additional

safety and security measures for drivers and riders, and provide more reliable information for analyzing the current system.

The following section generally describes the services and facility plans for transit services within the K-TUTS planning region. This includes a summary of current services and identifies regional needs for future development.

Existing Service

Prior to 2000, there were no fixed route transit services operating in the K-TUTS planning region. Through the coordination and dedication of local providers, cities, and counties the K-TUTS region currently has a regional public transit system composed of two urban fixed route systems one in Killeen and one in Temple and the rural public transportation system. Transportation services are coordinated between all divisions. All three divisions are operated by Hill Country Transit District based in San Saba, Texas.

Urban

The HOP is Central Texas' Regional Public Transit System operated by Hill Country Transit District (HCTD) with operations offices in Killeen and Temple and administrative offices in San Saba, Texas. Both fixed route and complementary paratransit services are provided. In Killeen, the HOP operates fifteen routes serving the cities of Copperas Cove, Killeen, Harker Heights and Nolanville, and the Fort Hood military installation. The Temple service provides fixed route transit in the Temple urban area to all areas of the city, with the exception of the western part, including the Industrial Park where prior routes received very low ridership.

Special Transit Service

Section 223 of the Americans with Disabilities Act of 1990 (ADA) requires public entities operating non-commuter fixed route transportation services to also provide complementary paratransit service for individuals unable to use the fixed route system. The HOP Special Transit Service (also referred to as Complementary Paratransit Service or Paratransit Service) is provided to those individuals with disabilities that are unable to use the regular HOP services for their trip needs.

Rural Transit

To utilize Section 5311 Rural Transportation funds Hill Country Transit District provides transit services to a broad range of individuals within rural portions of the K-TUTS region on a demand-responsive basis,. HCTD provides transportation services across nine counties, and provides approximately 200,000 one-way trips annually within the K-TUTS region. Destinations for passengers using these services include Head Start facilities, day care centers, public schools, medical facilities and pharmacies, dialysis centers, senior nutrition sites, employment sites, and shopping and retail establishments.

Ridership

Transit in the Killeen-Temple region witnesses increasing demands for service each year. Since operation began in the Killeen area in 2000, demand for services has grown 250% for fixed route service and 192% for special transit services. In Temple, growth since 2002 has been 313% for the fixed route and 332% for special transit services.



Future Needs

The service needs estimates contained herein are based on information from the Hill Country Transit District and the MPO. The following estimates were developed for future transit activities, services, and expenditures.

Population

The 2000 Census indicates the population of the Hill Country Transit District Urban service area is approximately 277,173. According to K-TUTS estimates, the 2030 population is projected to be 445,866. Based on straight-line calculations, the populations for 2010 would be 333,403 389,633 and for 2020. Other factors in estimating future needs include:

- Extended hours of service (late evening),
- Increased Saturday service,
- Increased service during peak hours,
- Expanded service area,
- Service frequency.

Service

Fixed Route Service (FRS) fleet size will increase to 58 buses. By 2030, Special Transit Service (STS) will continue to carry both STS-eligible passengers and other passengers who fall under other program criteria providing service to a total of more than 111,467 annual passengers and requiring a STS fleet of 29 buses. As previously stated, STS service will meet Americans with Disabilities Act (ADA) complementary paratransit service.

Geographic Direction of Growth

The geographic direction of growth for the fixed route service plan will follow the growth pattern of the region as projected by K-TUTS. This growth will be as follows:

- Service in and to Troy, Little River/Academy, and Salado will be provided via route “connectors” and limited circulator service within each of these areas.
- Service in the Temple area will be expanded further south, following the growth toward and along the north of Highway 93. Service in Temple will also be expanded to provide service in a northern corridor (along North 3rd Street) and a western corridor (along West Adams) as the population density in these areas increase.
- Service will be expanded into the Morgan’s Point area using both “connectors” and circulator service approaches.
- “Connector” service into Belton will continue, and service in Belton will be expanded to include a circulator service.
- Service in the Killeen UZA, which includes the cities of Killeen, Nolanville, Harker Heights, and Copperas Cove will be expanded in areas of increasingly geographic growth, especially to the south, north, and west of Copperas Cove and to the south of Killeen.

- Service along the 190 corridor will take on more of a linear transit corridor from which circulators and feeder routes can operate.

Funding Projections

Funding projections through 2030 were developed by analyzing characteristics such as population, annual service hours, passengers served, service hours, and other operational data for both the fixed route and special transit service. Cost estimates will increase at a curve through 2030. Detailed cost estimates are provided in Appendix C.

Based on the funding projections developed, transit in the K-TUTS area will have to secure additional sources of funding to maintain and expand current services provided. According to the funding projection of \$115,645,140, there will be a \$87,041,545 short fall. One source of funding will be from the fares collected for services provided; however this may not be enough to cover the extent of the funds needed.

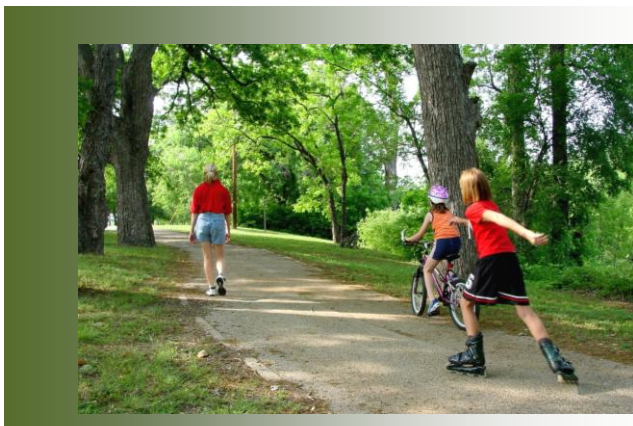
Capital and Special Projects

As part of these estimates, Hill Country Transit District projects that it will perform ongoing purchases of replacement and expansion rolling stock, and passenger shelters and benches.

A table listing HCTD special capital projects is provided in Appendix C. Other activities could include Park and Ride facilities (Killeen and Temple) with parking lots and waiting shelters, curb cuts and sidewalks at major bus stops, and transfer points, public education, and marketing.

BICYCLE/PEDESTRIAN

The walking and biking trails in the Killeen–Temple Metropolitan area encompass Bell, Coryell, and Lampasas counties. Central Texas has a multitude of trails that already exist and are being used on a regular basis. Future planned development of the trails will connect the cities of Killeen, Copperas Cove, Temple, Belton, Nolanville, and Salado into a 123 mile network of multi use trails in which users include commuters, walkers, joggers, bikers, horse back riders, roller bladders, bird watchers, and other outdoor activity seekers.



The Central Texas Trails Network is an advocacy not-for-profit group of volunteers that have been working together since 1999 to coordinate trail planning with cities, citizens, park departments, the Corps of Engineers, and private agencies to promote trail building in the Killeen–Temple Metropolitan area. The Network builds on

the Killeen–Temple Urban Transportation Study MPO Regional Thoroughfare and Bicycle and Pedestrian Plan. In recent years transportation planners have shifted interests to address more state and local concerns including alternatives to the car. Projects planned with local citizen involvement have led to the development of transportation facilities that better meet the needs of

local users including underserved communities such as minorities and people with disabilities. This shift was assisted by the enactment of The Intermodal Surface Transportation Efficiency Act (ISTEA) when the U.S. Department of Transportation undertook a major effort to develop a national policy to promote bicycling and walking as viable transportation options.

In 2008 K-TUTS contracted with Wilbur Smith Associates to complete a Regional Thoroughfare/Bicycle Pedestrian Plan. The bicycle and pedestrian part of this document describes the region's current bicycle and pedestrian conditions and outlines what the individual communities can do to improve their conditions along with the region as a whole. This document will serve the MPO as a significant bicycle pedestrian planning document.

RAIL

The freight rail system in Texas is an integrated portion of the state's transportation system. Railroads carry a large amount of freight throughout the state as well as the nation. Connections to the coastal ports of Texas' and Mexico's railroad infrastructure serve as a vital component for The United States' international trade.

Due to the central location, the K-TUTS region plays a vital role in the state's railroad operation. The prime location allows for north/south and east/west rail corridors. The Central Texas region is served by two major railroad companies. Burlington Northern and Santa Fe (BNSF) and Union Pacific (UP) are the predominant railroad freight carriers for the area. AMTRAK currently operates passenger trains on the existing rails with two to three trains passing through the Temple station each day.

As a result of increased military operations the railroad infrastructure has become vital to Fort Hood. The rails have allowed efficient movement of the post's military equipment to the ports as well as remote training locations. Without the railroads' heavy haul capabilities, it would be virtually impossible to deploy units in a timely manner. The need for expanded railroad operations for the region is likely to grow as Fort Hood continues to expand its worldwide role.



AIR SERVICE

Killeen–Fort Hood Regional Airport

The new Killeen–Fort Hood Regional Airport opened in August of 2004. The project was a cooperative effort between the City of Killeen, the Department of the Army and other entities throughout the region which involved building a new passenger terminal, aircraft–parking apron, parallel taxiway, fuel facility, and vehicle parking lots at Robert Gray Army Airfield. Major roadway improvements, which were also part of the project, will ensure direct, four–lane access to the site.

The economic impact of the new development has been and will continue to be significant. The Perryman Group was hired to do an Economic Impact Study prior to the start of the project. The study forecasts the creation of over 800 new jobs and \$2.8 billion added to the local economy.

The existing Killeen Municipal Airport remains open after airline service was moved to the new facility. The old facility was renamed “Skylark Field” which was the original name of the airfield. It serves the Central Texas College Flight School as well as light, general aviation and corporate aircraft. Both Killeen–Fort Hood Regional Airport and Skylark Field are operated by the City of Killeen.

This project is a model example of excellent cooperation between governmental agencies. The civilian community gets a first class airport and improved airline service. The military gets an improved airport capable of better serving their defense needs. Both parties benefit by sharing the costs of capital improvements and routine maintenance. This was a win–win situation for the City of Killeen, Fort Hood, and the entire Central Texas region.

Draughon–Miller Central Texas Regional Airport

Draughon–Miller Central Texas Regional Airport is a modern, award winning aviation facility operated by the city of Temple. Draughon–Miller is a general aviation airport that is certified for air carrier operations. Draughon–Miller also offers a number of services provided by experienced staff as well as contractual agreements to include Airframe Maintenance, Service/Repair, Piston Engine Overhauls, Line Service, Avionics, Flight Training, Pilot Training, and Rental

The airport has completed multiple expansions and improvements to benefit the Central Texas region including: T–Hangar Taxiway Improvements, Taxiway/Runway Improvements, 2000 T–Hangar and Taxiway Improvements, Terminal Expansion, and Renovation. The Draughon–Miller Central Texas Regional Airport continues to play a vital role in the Central Texas area economy and culture.

Acronyms

A

ADA: AMERICANS WITH DISABILITIES ACT OF 1990

ADT: AVERAGE DAILY TRAFFIC

ASHTO: AMERICAN STATE HIGHWAY TRANSPORTATION ORGANIZATION

B

BNSF: Burlington, Northern and Santa Fe Railroad

C

CAA: CLEAN AIR ACT

CAAA: CLEAN AIR ACT AMMENDMENTS OF 1990

CBD: CENTRAL BUSINESS DISTRICT

CMA: CONGESTION MANAGEMENT AREA

CMAQ: CONGESTION MITIGATION AND AIR QUALITY IMPROVEMENT PROGRAM

CBSA: CORE-BASED STATISTICAL AREA

CMSA: CONSOLIDATED METROPOLITAN STATITICAL AREA

CTCOG: CENTRAL TEXAS COUNCIL OF GOVERNMENTS

D

DOT: DEPARTMENT OF TRANSPORTATION

E

EA: ENVIRONMENTAL ASSESSMENT

EIS: ENVIRONMENTAL IMPACT STATEMENT

EPA: ENVIRONMENTAL PROTECTION AGENCY

F

FHWA: FEDERAL HIGHWAY ADMINISTRATION

FRA: FEDERAL RAILROAD ADMINISTRATION

FTA: FEDERAL TRANSIT ADMINISTRATION

I

ISTEA: INTERMODAL SURFACE TRANSPORTATION EFFICIENCY ACT OF 1991

ITS: INTELLIGENT TRANSPORTATION SYSTEM

K

K-TUTS: KILLEEN - TEMPLE URBAN TRANPORTATION STUDY

M

MPO: METROPOLITAN PLANNING ORGANIZATION

MTP: METROPOLITAN TRANSPORTATION PLAN

MSA: METROPOLITAN STATISTICAL AREA

N

NAFTA: NORTH AMERICAN FREE TRADE AREEMENT

NEPA: NATIONAL ENVIRONMENTAL POLICY ACT OF 1969

NHS: NATIONAL HIGHWAY SYSTEM

R

ROW: RIGHT OF WAY

S

SAFETEA-LU: SAFE, ACCOUNTABLE, FLEXIBLE,
AND EFFICIENT TRANSPORTATION EQUITY
ACT: A LEGACY FOR USERS

SIP: STATE IMPLEMENTATION PLAN

STA: STATE TRANSPORTATION AGENCY

STIP: STATEWIDE TRANSPORTATION
IMPROVEMENT PLAN

STP: SURFACE TRANSPORTATION PROGRAM

T

TCM: TRANSPORTATION CONTROL
MEASURES

TDM: TRANSPORTATION DEMAND
MANAGEMENT

TEA-21: TRANSPORTATION EQUITY ACT FOR
THE 21ST CENTURY

TIP: TRANSPORTATION IMPROVEMENT
PROGRAM

TMA: TRANSPORTATION MANAGEMENT AREA

TSM: TRANSPORTATION SYSTEM
MANAGEMENT

TxDOT: TEXAS DEPARTMENT OF
TRANSPORTATION

U

UP: Union Pacific Railroad

UPWP: UNIFIED PLANNING WORK PROGRAM

USDOT: U.S. DEPARTMENT OF
TRANSPORTATION

UTP: UNIFIED TRANSPORTATION PROGRAM

V

VMT: VEHICLE MILES TRAVELED

Other

3C: CONTINUING, COMPREHENSIVE,
COOPERATIVE

Glossary of Terms

A

AMERICANS WITH DISABILITIES ACT OF 1990 (ADA): A federal law mandating sweeping changes in building codes, transportation, and hiring practices to prevent discrimination against persons with disabilities, not just in projects involving federal dollars, but all new public places, conveyances and employers. The significance of ADA in transportation is mainly felt in terms of transit operations, capital improvements and hiring.

ARTERIAL: A street classification for roadways serving major traffic volumes other than highways.

ATTAINMENT AREA: An area considered to have air quality at least as good as the U.S. Environmental Protection Agency (EPA) health standards used in the Clean Air Act. An area may be an Attainment Area for one pollutant and a Non-Attainment Area for others.

AVERAGE DAILY TRAFFIC (ADT): The average number of vehicles passing a fixed point in a 24-hour time frame. A convention for measuring traffic volume.

B

BASE YEAR: An analysis or study's baseline or lead off year. The year to which other years are compared.

BIKEWAY: A facility intended to accommodate bicycle travel for recreational or commuting purposes. Bikeways are not necessarily separate facilities; they may be designed and operated to be shared with other travel modes.

C

CENSUS TRACT: Census tracts are small, relatively permanent subdivisions of a county which are delineated for all metropolitan areas and other densely populated counties by local census statistical area committees following Census Bureau guidelines.

CENTRAL BUSINESS DISTRICT (CBD): The most intensely commercial sector of a city.

CENTRAL TEXAS COUNCIL OF GOVERNMENTS (CTCOG): Encompassing entity of the seven county planning region and Fiscal Agent for the MPO

CLEAN AIR ACT AMENDMENTS OF 1990 (CAAA): Amendments which identify "mobile sources" (vehicles) as primary sources of pollution and call for stringent new requirements in metropolitan areas and states where attainment of National Ambient Air Quality Standards (NAAQS) is or could be a problem.

COLLECTOR/DISTRIBUTOR STREET: A road generally parallel to an expressway or arterial which collects and distributes traffic at access points to the expressway involving through lanes.

D

DEMAND-RESPONSIVE: Descriptive term for a transit service type, usually considered paratransit, in which a user can access transportation service which can be variably routed and timed to meet changing needs on a semi-daily basis.

DEMOGRAPHY: Characteristics of a total population. Characteristics can include, but are not restricted to: ethnic makeup, age distribution, education levels, and occupation patterns.

DEPARTMENT OF TRANSPORTATION (DOT): Develop and coordinate policies that will provide an efficient and economical national transportation system, with due regard for need, the environment, and the national defense. It is the primary agency in the government with the responsibility for shaping and administering policies and programs to protect and enhance the safety, adequacy, and efficiency of the transportation system and services. Can refer to U.S. DOT or to a state DOT.

E

EMPLOYER TRIP REDUCTION (ETR) PROGRAM: An employer designed program which minimizes employee commuting levels. These programs are federally required in non-attainment areas.

EMPLOYMENT DENSITY: The number of jobs within a defined geographical area.

ENHANCEMENT ACTIVITIES: Refers to activities conducted in relationship to a particular transportation project which “enhance” the existing or proposed project. Examples of such activities include provision of facilities for pedestrians or cyclists, landscaping other scenic beautification projects, historic preservation, control and removal of outdoor advertising, archeological planning and research, and mitigation of water pollution due to highway runoff.

ENVIRONMENTAL IMPACT STATEMENT (EIS): Report which details any adverse economic, social and environmental effects of a proposed transportation project for which federal funding is being sought. Adverse effects could include air, water, or noise pollution; destruction or disruption of natural resources; adverse employment effects; injurious displacement of people or businesses; or disruption of desirable community or regional growth.

ENVIRONMENTAL PROTECTION AGENCY (EPA): EPA is the source agency of air quality control regulations affecting transportation.

EXPRESSWAY: A divided highway for through traffic with controlled access, the intersections of which are usually separated from other roadways by differing grades.

F

FEDERAL FUNCTIONAL CLASS: Federal classification of streets and highways into functional operating characteristics. Categories are:

- Interstate
- Other Urban Freeways and Expressways
- Other Principal Arterial
- Minor Arterial
- Urban Collectors and Rural Major Collectors
- Rural Minor Collectors
- Urban and Rural Local Streets and Roads
-

FEDERAL FUNDING PROGRAM CATEGORY: Major goals of federal funding as established by SAFETEA-LU. Goals are:

- * 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 non-motorized users;
- * Increase the security of the transportation system for motorized and non-motorized users;
- * Increase the accessibility and mobility of people and for freight;
- * Protect and enhance the environment, promote energy conservation, improve the quality of life, and promote consistency between transportation improvements and State and local planned growth and economic development patterns;
- * Enhance the integration and connectivity of the transportation system, across and between modes, for people and freight;
- * Promote efficient system management and operation; and
- * Emphasize the preservation of the existing transportation system.

FEDERAL HIGHWAY ADMINISTRATION: The agency of U.S. DOT with jurisdiction over highways.

FEDERAL TRANSIT ADMINISTRATION (FTA): The agency of U.S. DOT administration with jurisdiction over transit. Formerly the Urban Mass Transit Administration.

FIXED ROUTE: Term applied to transit service which is regularly scheduled, operating over a set route.

H

HIGHWAY: Term applies to roads, streets, and parkways, and also includes appurtenances such as rights-of-way, bridges, railroad crossings, drainage tunnels, drainage structures, signs, guard rails, and protective structures in connection with highways.

HOME-BASED WORK TRIP: A trip for the purpose of one's employment, with the trip end being one's home.

HOUSEHOLD DENSITY: The number of households within a defined geographical area.

I

INFRASTRUCTURE: A term connoting the physical underpinnings of society at large, including, but not limited to, roads, bridges, transit, waste system, public housing, sidewalks, utility installations parks, public buildings, and communication networks.

INTERMODAL: Refers to the connections between transportation modes.

INTERMODAL SURFACE TRANSPORTATION EFFICIENCY ACT OF 1991 (ISTEA): A federal mandate signed into law December 18, 1991, ISTEA proposed broad changes to the way transportation decisions are made by emphasizing diversity and balance of modes and preservation of existing systems over construction of new facilities, especially roads, and by proposing a series of social, environmental and energy factors which must be considered in transportation planning, programming and project selection.

INTERSTATE SYSTEM: That system of highways which connects the principal metropolitan areas, cities, and industrial centers of the United States. The interstate system also connects at suitable border points with routes of continental importance in Canada and Mexico. The routes of the interstate system were selected by joint action of the state highway department of each state and the adjoining states, subject to the approval of the U.S. Secretary of Transportation.

K

KILLEEN-TEMPLE URBAN TRANSPORTATION STUDY (K-TUTS): The official name of the Metropolitan Planning Organization.

L

LAND USE: The way in which specific portions of land or structures on them are used, i.e., commercial, residential, retail, industrial, and so on.

LOCAL STREET: A street intended solely for access to properties contiguous to it.

LONG-RANGE: Refers in transportation planning to a time span of more than five years. The Transportation Improvement Program (TIP) is typically regarded as a short-range program.

M

MAJOR INVESTMENT STUDIES: A planning tool to provide the regional multimodal planning effort with more in-depth technical analysis of various sub-area or corridor options.

METROPOLITAN PLANNING ORGANIZATION (MPO): The agency designated by the Governor (or Governors in multi-state areas) to administer the federally required transportation planning process in the metropolitan area. An MPO must be in place in every urbanized area over 50,000 in population. The MPO is responsible for the 25-year long-range plan and the transportation

improvement program. The official name for an MPO may also be Council of Governments, Planning Association, Planning Authority, Regional or Area Planning Council, Regional or Area Planning Commission.

METROPOLITAN STATISTICAL AREA (MSA & CMSA): The Census classifications for areas having a population over 50,000. The MSA may contain several urbanized areas, but contains one or more central city or cities. When the commuting patterns of two MSA s have caused them to merge, the result is a Consolidated Metropolitan Statistical Area (CMSA).

MOBILITY: The ease with which desired destinations can be reached.

METROPOLITAN TRANSPORTATION PLAN: A document, formerly known as the Long-Range Transportation Plan, which identifies existing and future transportation deficiencies and needs, as well as network improvements needed to meet mobility requirements over at least a twenty five year time period. To receive federal funding, a transportation project must be included in the MTP and the TIP.

MODEL: A mathematical and geometric projection of activity and the interactions in the transportation system in an area. This projection must be able to be evaluated according to a given set of criteria which typically include criteria pertaining to land use, economics, social values, and travel patterns.

MULTIMODAL: Refers to the diversity of options for the same trip; an approach to transportation planning or programming which acknowledges the existence of or need for transportation options.

N

NATIONAL AMBIENT AIR QUALITY STANDARD (NAAQS): Federally mandated maximum levels (i.e., federal health standards) for air pollutants such as ozone, carbon dioxide, particulate matter, sulfur dioxide, nitrous oxide, and lead.

NATIONAL ENVIRONMENTAL POLICY ACT (NEPA): Federal act requiring a study on any environmental impact a federally funded or permitted project might cause.

NEO-TRADITIONAL NEIGHBORHOOD DESIGN (NTND): Neighborhoods characterized by an interconnecting street network, mixture of land uses, bike and pedestrian paths, grid pattern of land use, and resemblance to those areas developed in America before World War II.

NATIONAL HIGHWAY SYSTEM (NHS): A classification of roads authorized by ISTEA which are comprised of Interstate Highways and roads designated as important for interstate travel, national defense, intermodal connections and intermodal commerce. Federal funds are designated for projects on the NHS system.

NETWORK: A graphic and/or mathematical representation of multimodal paths in a transportation system.

NON-ATTAINMENT AREA: A designation by the Environmental Protection Agency of any place in the United States failing to meet national air quality standards (NAAQS).

O

ORIGIN-DESTINATION SURVEY (O-D Survey): A survey of travelers (motorists or transit passengers) typically undertaken to identify travel patterns, habits, and needs.

OZONE: A gas which in excess quantities at ground-level is a pollutant and irritant. Ozone is created when nitrogen oxides (Nox) react with volatile organic compounds (VOCs) in sunlight, also known as smog.

P

PARATRANSIT: Alternatively known as special transportation when applied to social services systems. Applies to a variety of smaller, often flexibly scheduled and routed non-profit oriented transportation services using low capacity vehicles to operate within normal urban transit corridors or rural areas. These services usually serve the needs of persons whom standard mass transit services would serve with difficulty or not at all. Common patrons are the elderly and persons with disabilities.

PARATRANSIT VAN: A van specially modified to carry disabled passengers.

PEAK HOUR: The sixty minute period in the a.m. or p.m. in which the largest volume of travel is experienced.

PERSON-TRIP: A trip made by one person from one origin to one destination.

PHASE: Project Phase for Federal Funding (E = Preliminary Engineering, R = Right of Way Acquisition, and C = Construction).

PLANNER: In the transportation field, a title usually to do with the management and analysis of data which directly supports qualitatively oriented, strategic, or "macro" decision making.

PRIVATIZATION: Concept having to do with for-profit business supplying goods and services for government, public programs or systems, with intent of enhancing cost efficiency.

PROJECT IDENTIFICATION (Project ID): Code assigned by the MPO for local tracking and identification. Used to relate projects to the MTP.

PROVIDER: An agency that causes clients to be transported, as opposed to an agency whose role is limited to funding programs.

PUBLIC INVOLVEMENT: The active involvement of the public in the development of transportation plans and improvements program. Various provisions of SAFTEA-LU require expanded consultation and cooperation with federal, state, local and tribal agencies responsible for land use,

natural resources and other environmental issues during the adoption of long and short-term plans along with many other notification requirements.

PUBLIC ROAD: Any road or street under jurisdiction of and maintained by a public authority and open to public traffic.

R

REVERSE COMMUTE: Travel from home to work or from work to home against the main directions of traffic.

RIGHT OF WAY (ROW): Priority paths for the construction and operation of highways, light and heavy rail, railroads, etc.

S

SAFETEA-LU: On August 10, 2005, the President of the United States signed into law the Safe, Accountable, Flexible, Efficient Transportation Equity Act: A Legacy for Users (SAFETEA-LU). With guaranteed funding for highways, highway safety, and public transportation totaling \$244.1 billion, SAFETEA-LU represents the largest surface transportation investment in our Nation's history. The bill authorizes transportation programs and projects for the five-year period of 2005-2009.

SURFACE TRANSPORTATION PROGRAM (STP): One of the key capital programs in Title I of ISTEA. It provides flexibility in expenditures of "roads" funds for non-motorized and transit modes and for a category of activities known as transportation enhancements, which broaden the definition of eligible transportation activities to include bicycle and pedestrian facilities and enhance community and environmental quality through ten categories of activity.

T

TRIP ORIGIN: The point or locale where a trip begins.

TELECOMMUTING: Using a home computer or a neighborhood work center for work, effectively eliminating the need to travel to a conventional workplace.

TELECONFERENCING: Using audio, video, and/or computer connections among sites for meetings. Eliminating any need to travel to the meeting site.

TEXAS DEPARTMENT OF TRANSPORTATION (TxDOT): State agency responsible for construction and maintenance of all Interstate, U.S., and State Highways; and Farm-to-Market (FM) Roads within the state.

TRAFFIC DISTRICT: A geographic unit comprised of several serial zones which may be used for the same purposes as traffic serial zones.

TRAFFIC ANALYSIS ZONE: The smallest geographically designated area for analysis of transportation activity such as data collection and travel movements within, into, and out of the urban area. A zone can be one to 10 square miles in area.

TRANSIT: Transportation mode which moves larger numbers of people than does a single automobile. Generally renders to passenger service provided to the general public along established routes with fixed or variable schedules at published fares.

TRANSIT-ORIENTED DEVELOPMENT (TOD): Similar to a Neo-Traditional Neighborhood Design, except that it incorporates higher densities and possesses a distinct focus toward transit.

TRANSIT DEPENDENT: Persons who must rely on public transit or para-transit services for most of their transportation. Typically refers to individuals without access to personal vehicles.

TRANSPORTATION: The act of getting persons or things from here to there, through personal or communal means. An integral and vital human need, behavior, and/or service.

TRANSPORTATION CONTROL MEASURE (TCM): Any measure designed to reduce congestion, emissions, and other traffic problems.

TRANSPORTATION DEMAND MANAGEMENT (TDM): Strategies for easing or reducing transportation demand, specifically aimed at diverting people from driving alone. Programs used to improve air quality and congestion by decreasing vehicle miles traveled and vehicle trips.

TRANSPORTATION EFFICIENCY ACT FOR THE 21ST CENTURY (TEA-21): The reauthorization bill for ISTEA designed to support transportation across the nation.

TRANSPORTATION IMPROVEMENT PROGRAM (TIP): A four year transportation investment strategy, required at the metropolitan level, and a four year program at the state level, which addresses the goals of the long-range plans and lists priority projects and activities for the region.

TRANSPORTATION MANAGEMENT AREAS (TMA): Areas subject to special requirements under ISTEA and in some cases benefiting from preferential treatment with regard to air quality needs, and local authority to select transportation projects. Any area over 200,000 in population is automatically a transportation management area, which subjects it to additional planning requirements, but also entitles it to earmarked funds for large urbanized areas under the Surface Transportation Program. Additional areas may be designated TMAs if the Governor and the MPO or affected local officials request designation. Such a designation would entitle them to greater local project selection authority through their MPOs, but would not, according to interim guidance issued by U.S. DOT, entitle them to the earmarked STP funds for large urban areas.

TRAVEL TIME: Customarily calculated as the time it takes to travel from “door-to-door.” For transit service measures of travel time include time spent accessing, waiting, and transferring between vehicles, as well as that time spent on board.

TRIP: A one-direction movement from an origin to destination.

U

UNIFIED PLANNING WORK PROGRAM (UPWP): Annual report or budget document prepared by the CTCOG describing transportation planning activities which will take place within K-TUTS MPO.

UNITED STATES DEPARTMENT OF TRANSPORTATION (US DOT): Principal federal funding and regulating agency for transportation facilities. FHWA and FTA are agencies within US DOT.

URBANIZED AREA (UZA): A census classification for area having a population of 50,000 or more which meet certain population density requirements.

V

VEHICLE MILES TRAVELED (VMT): Term used for describing the total number of miles traveled by a vehicle in a given time. Most conventional VMT calculation is to multiply average length of trip by the total number of trips.

W

WELFARE TO WORK (WtW): This program shares the same overall objectives of TANF, especially making welfare receipt temporary and changing the culture of welfare from one of cash benefits to one of work and self-sufficiency. The funding is intended to help states and localities meet their welfare reform objectives and the goals set forth under PRWORA by providing federal resources above and beyond the TANF block grant to move the least employable TANF recipients and non-custodial fathers of TANF children into long-term unsubsidized employment.

Other

3C: "CONTINUING, COMPREHENSIVE, COOPERATIVE" Refers to the requirement set forth in the Federal Highway Act of 1962 that transportation projects in urbanized areas be based on a "continuing, comprehensive transportation planning process carried out cooperatively by states and local communities."

APPENDIX A: TxDOT Funding Category Tables

Table 7.1 TxDOT Funding Categories



SUMMARY OF CATEGORIES 2007 STATEWIDE PRESERVATION PROGRAM (SPP)



CATEGORY NUMBER AND NAME	PROGRAMMING AUTHORITY	USUAL FUNDING	ALLOCATION PROGRAM (Yes/No) RESPONSIBLE ENTITY	RANKING INDEX OR ALLOCATION FORMULA	BRIEF SUMMARY, RESTRICTIONS, ETC.
1 Preventive Maintenance and Rehabilitation	Commission allocation by formula Allocation program to districts. Projects selected by districts.	Federal 90% State 10% or Federal 80% State 20% or 100% State	Yes, Districts	Preventive Maintenance ¹ 63% On-System lane miles 40% Lane miles of pavement distress scores between 70-89 5% Vehicle miles traveled per lane mile 2% Square footage of On-System Span Bridge Deck Area Rehabilitation ¹ 15% Interstate Equivalent Single Axle Load Miles 10% Non-Interstate National Highway System (NHS) Equivalent Single Axle Load Miles 5% Non-NHS Equivalent Single Axle Load Miles 15% On-System lane miles 3% On-System vehicle miles traveled 35% Lane miles of pavement distress scores less than 60 5% Lane miles of pavement ride scores less than 2.0 5% Area of bridge deck with Sufficiency Rating between 50 and 80 3% Centerline miles of 2 lane highways with average daily traffic (ADT) greater than 400 and pavement width less than 22 feet 2% Centerline miles of operational Intelligent Transportation System (ITS)	Preventive maintenance and rehabilitation of the existing state highway system. The rehabilitation funds may be used for rehabilitation of the Interstate Highway System main lanes, frontage roads, structures, signs, pavement markings, striping, etc. The Transportation Planning and Programming Division may approve the use of rehabilitation funds for the construction of interchanges and high occupancy vehicle (HOV) lanes on the Interstate Highway System. Rehabilitation funds may not be used for the construction of new single occupancy vehicle (SOV) lanes. Rehabilitation of an existing two-lane highway to a Super 2 highway may be funded within this category.

Note: ¹ A collaborative work group composed of transportation professionals from the [Association of Texas Metropolitan Planning Organizations](#), the [Texas Transportation Institute](#), the Texas Department of Transportation (TxDOT), [county judges](#) and Regional Planning Councils, recommended this formula to the Texas Transportation Commission (commission). The work group recommended averaging 3-years of pavement distress and ride scores. The commission has chosen to use the latest (1-year) of data, in order to make funding distribution decisions based on the most up-to-date information.



SUMMARY OF CATEGORIES 2007 STATEWIDE PRESERVATION PROGRAM (SPP)



CATEGORY NUMBER AND NAME	PROGRAMMING AUTHORITY	USUAL FUNDING	ALLOCATION PROGRAM (Yes/No) RESPONSIBLE ENTITY	RANKING INDEX OR ALLOCATION FORMULA	BRIEF SUMMARY, RESTRICTIONS, ETC.
6 Structures - Federal Highway Bridge Replacement and Rehabilitation Program (HBRRP)	Commission approval. Project-specific - HBRRP projects are selected statewide based on a prioritized condition of eligible bridges selection method (Prioritization Ranking and Texas Eligible Bridge Selection System Score (TEBSS)) by the Bridge Division.	Federal 90% State 10% or Federal 80% State 20% or Federal 80% State 10% Local 10%	No, Commission	Prioritization Ranking and Texas Eligible Bridge Selection System Score (TEBSS)	Replaces or rehabilitates eligible bridges on and off the state highway system (functionally obsolete or structurally deficient).
6 Structures - Federal Railroad Grade Separation Program (RGS)	Commission approval. Project-specific - RGS projects are selected statewide based on a Cost-benefit Index for at-grade railroad crossing elimination projects and a Prioritization Ranking for railroad underpass replacement or rehabilitation projects by the Bridge Division.	Federal 80% State 20%	No, Commission	Cost-benefit Index that utilizes vehicle and train traffic, accident rates, casualty costs, and personnel and equipment delay costs for selecting at-grade railroad crossing elimination projects. Prioritization Ranking that utilizes vertical clearance and roadway characteristics for selecting replacement or rehabilitation of railroad underpass projects	Eliminates at-grade highway-railroad crossings through the construction of highway overpasses or railroad underpasses, and rehabilitates or replaces deficient railroad underpasses on the state highway system.
8 Safety - Federal Highway Safety Improvement Program	Commission allocation. Statewide allocation program . Selected statewide by federally mandated safety indices.	Federal 90% State 10% or 100% State	Yes, Traffic Operations Division	Safety Improvement Index (SII)	Safety related projects - on and off state highway system. Projects are evaluated using three years of crash data, and ranked by Safety Improvement Index. Previously named the Federal Hazard Elimination Program.



SUMMARY OF CATEGORIES

2007 STATEWIDE PRESERVATION PROGRAM (SPP)



CATEGORY NUMBER AND NAME	PROGRAMMING AUTHORITY	USUAL FUNDING	ALLOCATION PROGRAM (Yes/No) RESPONSIBLE ENTITY	RANKING INDEX OR ALLOCATION FORMULA	BRIEF SUMMARY, RESTRICTIONS, ETC.
8 Safety – Federal Railway - Highway Crossing Program	Commission allocation. Statewide <u>allocation program</u> . Selected statewide by prioritized listing.	Federal 90% State 10%	Yes. Traffic Operations Division	Railroad Crossing Index	Installation of automatic railroad warning devices at railroad crossings on and off state highway system, selected from statewide inventory list which is prioritized by index (# of trains per day, train speed, ADT, school buses per day, type of existing warning device, train-involved crashes within prior five years, etc.) Provide incentive payments to local governments for closing crossings. Also improve signal preemption and coordination of train control signals.
8 Safety – Safety Bond Program	Commission allocation. Statewide <u>allocation program</u> . Selected statewide.	100% State	Yes. Traffic Operations Division	Safety Improvement Index (SI) and roadway safety characteristics	Allocations for the safety bond program are approved by the commission, with the program managed as an allocation program on a statewide basis.
8 Safety – Federal Safe Routes to School Program	Commission selection and approval. <u>Project-specific</u> – approved by separate Minute Order.	100% Federal	No. Commission	TxDOT staff evaluates for eligibility. The TxDOT Safe Routes to School Committee and/or an advisory committee appointed by the TTC make recommendations.	Safety related projects – on and off state highway system. Program designed to enable and encourage primary and secondary school children to walk and bicycle to school. Both infrastructure-related and behavioral projects allowed.
8 Safety – Federal High Risk Rural Roads	Commission allocation. Statewide <u>allocation program</u> . Selected statewide by federally mandated safety indices.	Federal 90% State 10%	Yes. Traffic Operations Division	Safety Improvement Index (SI)	Safety related construction and operational improvements on high risk rural roads. High risk rural roads are roadways functionally classified as rural major or minor collectors or rural local roads with a fatal and incapacitating injury crash rate above the statewide average for these functional classes of roadways; or likely to experience an increase in traffic volumes that leads to a crash rate in excess of the average statewide rate.



SUMMARY OF CATEGORIES

2007 STATEWIDE MOBILITY PROGRAM (SMP)



CATEGORY NUMBER AND NAME	PROGRAMMING AUTHORITY	USUAL FUNDING	ALLOCATION PROGRAM (Yes/No) RESPONSIBLE ENTITY	RANKING INDEX OR ALLOCATION FORMULA	BRIEF SUMMARY, RESTRICTIONS, ETC.
2 Metropolitan Area (TMA) Corridor Projects	Commission approval. <u>Project-specific</u> – corridors selected by Metropolitan Planning Organizations (MPOs). Projects are recommended by districts based on corridors that are selected by MPOs through the Metropolitan Transportation Plan process.	Federal 80% State 20% or 100% State	No. Commission	Funding Target Formula 32.63 % Total vehicle miles traveled (on and off the state highway system) 22.35 % Population 17.04 % Lane miles (on system) 14.22 % Vehicle miles traveled (trucks only) 7.04 % Percentage of population below the federal poverty level 6.72 % Fatal and incapacitating ¹ crashes	Mobility and added capacity projects within a Transportation Management Area (TMA) must have the concurrence and support of the Metropolitan Planning Organization (MPO). A TMA is a metropolitan planning area with a population of 200,000 or greater and is represented by a Metropolitan Planning Organization (MPO).
3 Urban Area (Non-TMA) Corridor Projects	Commission approval. <u>Project-specific</u> – corridors selected by Metropolitan Planning Organizations (MPOs). Projects are recommended by districts based on corridors that are selected by MPOs through the Metropolitan Transportation Plan process.	Federal 80% State 20% or 100% State	No. Commission	Funding Target Formula 22% Total vehicle miles traveled (on and off the state highway system) 26% Population 11% Lane miles (on system) 6% Centerline miles (on system) 15% Vehicle miles traveled (trucks only) 9% Percentage of population below the federal poverty level 11% Fatal and incapacitating ¹ crashes	Mobility and added capacity projects must have the concurrence and support of the Urban Area (Non-TMA) MPOs.
4 Statewide Connectivity Corridor Projects	Commission approval. <u>Project-specific</u> – corridors selected statewide. Projects scheduled by consensus of districts.	Federal 80% State 20% or 100% State	No. Commission	Selections based on engineering analysis of projects on three corridor types: Mobility Corridors - based on congestion. Connectivity Corridors - 2-lane roadways requiring upgrade to 4-lane divided. Strategic Corridors - strategic corridor additions to the state highway network. An example would be Ports-to-Plains.	Mobility and added capacity projects on major state highway system corridors which provide statewide connectivity between urban areas and corridors. Composed of a highway connectivity network which includes: - The Texas Trunk System - The National Highway System (NHS) - and connections from Texas Trunk System or NHS to major ports on international borders or Texas water ports

Note: ¹ An incapacitating crash is one with severe injuries which would prevent the injured from a continuation of normal activities.



SUMMARY OF CATEGORIES
2007 STATEWIDE MOBILITY PROGRAM (SMP)

BUILD IT



CATEGORY NUMBER AND NAME	PROGRAMMING AUTHORITY	USUAL FUNDING	ALLOCATION PROGRAM (Yes/No) RESPONSIBLE ENTITY	RANKING INDEX OR ALLOCATION FORMULA	BRIEF SUMMARY, RESTRICTIONS, ETC.
5 Congestion Mitigation and Air Quality Improvement	Commission allocation. Allocation based on percent of population in non-attainment areas. <u>Allocation program</u> to districts. Projects selected by MPO in consultation with TxDOT.	Federal 80% State 20% or Federal 80% Local 20%	Yes, Districts	Non-attainment area population weighted by air quality severity	Addresses attainment of national ambient air quality standard in the non-attainment areas (currently Dallas-Fort Worth, Houston, Beaumont and El Paso). Funds cannot be used to add capacity for single occupancy vehicles.
7 Metropolitan Mobility/ Rehabilitation	Commission allocation. Allocation based on population. <u>Allocation program</u> to districts. Projects selected by MPO in consultation with TxDOT.	Federal 80% State 20% or Federal 80% Local 20% or 100% State	Yes, Districts	Population (2000 Census)	Transportation needs within the Transportation Management Areas (TMAs). Projects selected by the Metropolitan Planning Organizations (MPOs).
9 Transportation Enhancements	Commission selection and approval. <u>Project-Specific</u> – approved by separate Minute Order.	Federal 80% State 20% or Federal 80% Local 20%	No, Commission	TxDOT staff and FHWA evaluate for eligibility, TEPEC (Transportation Enhancement Program Evaluation Committee) make recommendations to TTC.	Projects above and beyond what is normally expected for standard TxDOT roadway activities - twelve general categories as outlined in SAFETEA-LU . Projects recommended by local government entities, reviewed and recommended by TxDOT and committee, selected by Texas Transportation Commission as outlined in 43 TAC §11.204(c) .
9 Transportation Enhancements Safety Rest Area Program	Commission allocation. Statewide <u>allocation program</u> . Selected statewide by the Maintenance Division.	Federal 80% State 20%	Yes, Maintenance Division	Selection criteria includes: travel corridors, appropriate size and spacing of rest areas, customer desired features, and operational functions.	Funds to be used to renovate, build, and relocate safety rest areas along the state highway system. Small amount of program funds used for Safety Rest Area repairs. Other federal-aid or state funds may be used for non-qualifying repair activities.



SUMMARY OF CATEGORIES
2007 STATEWIDE MOBILITY PROGRAM (SMP)

BUILD IT



CATEGORY NUMBER AND NAME	PROGRAMMING AUTHORITY	USUAL FUNDING	ALLOCATION PROGRAM (Yes/No) RESPONSIBLE ENTITY	RANKING INDEX OR ALLOCATION FORMULA	BRIEF SUMMARY, RESTRICTIONS, ETC.
10 Supplemental Transportation Projects – Construction Landscape Programs	Commission allocation by formula. <u>Allocation program</u> to districts. Projects selected by districts.	State 100%	Yes, Design Division	75% Vehicle miles traveled on freeways and expressways 25% Lane miles of freeways and expressways	New landscape development and establishment projects such as typical right-of-way landscape development and establishment, aesthetic improvement (primarily in urban areas), rest area/picnic area landscape development, and erosion control and environmental mitigation activities on the state highway system.
10 Supplemental Transportation Projects - State Park Roads	Commission allocation. Statewide <u>allocation program</u> . Projects selected by Texas Parks and Wildlife Department (TPWD).	State 100%	Yes, Transportation Planning and Programming Division	None. Selected by TPWD	Construction and rehabilitation of roadways within or adjacent to state parks, fish hatcheries, etc. subject to Memorandum of Agreement between TxDOT and TPWD. Locations selected and prioritized by TPWD.
10 Supplemental Transportation Projects - Railroad Grade Crossing Replanking Program	Commission allocation. Statewide <u>allocation program</u> . Selected statewide based on conditions of riding surface.	State 100%	Yes, Traffic Operations Division	Condition of crossing's riding surface and cost per vehicle using crossing.	Replacement of rough railroad crossing surfaces on the state highway system (approximately 140 installations per year statewide). Project selection based on conditions of the riding surface (highway, railroad and drainage) and cost per vehicle using the crossing.
10 Supplemental Transportation Projects - Railroad Signal Maintenance Program	Commission allocation. Statewide <u>allocation program</u> . Contributions to maintain signals.	State 100%	Yes, Traffic Operations Division	Number of crossings and type of automatic devices present at each.	Contributions to each railroad company based on number of state highway system crossings and type of automatic devices present at each crossing.





SUMMARY OF CATEGORIES
2007 STATEWIDE MOBILITY PROGRAM (SMP)

BUILD IT



CATEGORY NUMBER AND NAME	PROGRAMMING AUTHORITY	USUAL FUNDING	ALLOCATION PROGRAM (Yes/No) RESPONSIBLE ENTITY	RANKING INDEX OR ALLOCATION FORMULA	BRIEF SUMMARY, RESTRICTIONS, ETC.
10 Supplemental Transportation Projects – Landscape Cost Sharing Program	Statewide <u>allocation program</u> .	State 100%	Yes, Design Division	The funding contribution will be determined for each project based on 50 percent of the total estimated project cost as proposed by the contributor.	Program allows the department to negotiate and execute joint landscape development projects through partnerships with local governments and support from civic associations, private businesses and developers for the aesthetic improvement of our state transportation system.
10 Miscellaneous – Landscape Incentive Awards Program	Statewide <u>allocation program</u> Funding distributed to nine locations based on population	State 100%	Yes, Design Division	This program will be handled on a statewide basis. The funding distribution to nine locations is based on the results of the annual <i>Keep Texas Beautiful</i> Awards Program.	Program allows the department to negotiate and execute joint landscape development projects in nine locations based on population categories in association with the Keep Texas Beautiful Governor's Community Achievement Awards Program. The awards recognize participating cities or communities efforts in litter control, quality of life issues and beautification programs and projects.
10 Supplemental Transportation Projects - Curb Ramp Program	Statewide <u>allocation program</u> .	State 100%	Yes, Design Division	Projects are selected based on the conditions at the curb ramp or the location of the intersection without ramps.	This program addresses construction or replacement of curb ramps at on-system intersections to make the intersections more accessible to pedestrians with disabilities.
10 Supplemental Transportation Projects – Green Ribbon Landscape Improvement Program	Statewide <u>allocation program</u> to the districts with air quality non-attainment or near non-attainment counties.	State 100%	Yes, Design Division	Allocations based on one-half percent of the estimated letting capacity for the TxDOT districts which contain air quality non-attainment or near non-attainment counties.	Program allows the department to address new landscape development and establishment projects within districts that have air quality non-attainment or near non-attainment counties (projects to plant trees and shrubs to help mitigate the effects of air pollution).



SUMMARY OF CATEGORIES
2007 STATEWIDE MOBILITY PROGRAM (SMP)

BUILD IT



CATEGORY NUMBER AND NAME	PROGRAMMING AUTHORITY	USUAL FUNDING	ALLOCATION PROGRAM (Yes/No) RESPONSIBLE ENTITY	RANKING INDEX OR ALLOCATION FORMULA	BRIEF SUMMARY, RESTRICTIONS, ETC.
10 Supplemental Transportation Projects – Coordinated Border Infrastructure Program	Commission allocation by formula. <u>Allocation program</u> to districts.	Federal 80% State 20%	Yes, Commission	Allocation Formula 20% Incoming commercial trucks 30% Incoming personal motor vehicles & buses 25% weight of incoming cargo by commercial trucks 25% Number of land border ports of entry	Projects selected in program to improve the safe movement of motor vehicles at or across the land border between U.S. and Mexico.
10 Supplemental Transportation Projects (Federal)	<u>Commission approval to participate</u> . Federal allocations.	Federal 100% or Federal 80% State 20%	No, Commission	Not Applicable	Federal programs such as Forest Highways, Indian Reservation Highways, Federal Lands Highways, Ferry Boat Discretionary and Congressional High Priority Projects.
11 District Discretionary	Commission allocation by formula. <u>Allocation program</u> to districts. Projects selected by districts. Minimum \$2.5 million allocation to each district in compliance with 79TH(R), SB1, VII, Rider 17.	Federal 80% State 20% or Federal 80% Local 20% or State 100%	Yes, Districts	Allocation Formula 70% On-system vehicle miles traveled 20% On-system lane miles 10% Annual truck vehicle miles traveled	Projects selected at the district's discretion.
12 Strategic Priority	Commission selection. <u>Project-specific</u>	Federal 80% State 20% or State 100%	No, Commission	Selected by Texas Transportation Commission.	Commission selects projects which generally promote economic opportunity, increase efficiency on military deployment routes or to retain military assets in response to the federal military base realignment and closure report, or maintain the ability to respond to both man-made and natural emergencies. Also, the Commission approves pass-through financing projects in order to help local communities address their transportation needs.

APPENDIX B: Demographic Tables

Table 7.2 Population Change – Current Data is self-provided unless noted

	Current	2000 Census	1990 Census	% Change from 1990 to 2000
Texas**	23,904,380	20,851,820	16,986,335	22.8%
Bell County**	274,881	237,974	191,073	24.5%
Belton	18,839	14,623	12,463	17.3%
Harker Heights	29,000	17,308	12,932	33.8%
Killeen	116,107	86,911	63,535	36.8%
Little River-Academy*	1,793	1,645	1,390	18.3%
Morgan's Point Resort*	3,698	2,989	1,766	69.3%
Nolanville*	2,333	2,150	1,834	17.2%
Salado*	4,743	(1,974 est)	1,216	185.8
Temple	65,550	54,514	46,150	18.1%
Troy*	1,378	1,378	1,395	-1.2%
Coryell County**	76,494	74,978	64,226	16.7%
Copperas Cove	31,732	29,592	24,079	22.9%
Lampasas County**	20,860	17,762	13,521	31.4%
Kempner*	1,286	1,004		

Source: U.S. Census Bureau *Source: Texas Water Development Board **Source: Texas State Data Center

Table 7.3 Population Projections – Local projections by city unless noted

	2000 Population	Current Estimate	2020 Projection	2030 Projection	2040 Projection	2050 Projection	2060 Projection
Belton	14,623	18,839	19,687	20,535	21,382	22,230	23,549
Copperas Cove	29,592	31,732	37,375	42,505	47,635	52,765	66,495
Harker Heights	17,308	29,000	35,000	39,000	43,000	47,000	50,000
Kempner*	1,004	1,286	1,584	1,800	1,960	2,065	2,131
Killeen	86,911	116,107	156,480	205,247	269,212	353,113	463,161
Little River/Academy*	1,645	1,793	1,896	1,989	2,049	2,088	2,116
Morgan's Point Resort*	2,989	3,698	4,191	4,637	4,924	5,109	5,243
Nolanville*	2,150	2,333	2,460	2,575	2,649	2,697	2,732
Temple	54,514	65,550	72,700	79,900	85,800	90,600	96,400
Troy*	1,378	1,378	1,378	1,378	1,378	1,378	1,378

*Source: Texas Water Development Board

APPENDIX C: TRANSIT TABLES

Table 7.4 Operating Cost Estimates

Year	Cost Projection
2004	\$4,138,107
2005	\$4,149,420
2006	\$4,585,929
2007	\$5,044,522
2008	\$5,548,974
2009	\$6,103,871
2010	\$6,714,259
2011	\$6,848,544
2012	\$6,985,515
2013	\$7,125,225
2014	\$7,267,729
2015	\$7,413,084
2016	\$7,561,346
2017	\$7,712,573
2018	\$7,866,824
2019	\$8,024,161
2020	\$8,184,644
2021	\$8,348,337
2022	\$8,515,303
2023	\$8,685,610
2024	\$8,859,322
2025	\$9,036,508
2026	\$9,217,238
2027	\$9,401,583
2028	\$9,589,615
2029	\$9,589,615
2030	\$9,781,407
Total	\$202,686,685

In addition, HCTD special capital projects will be:

Intelligent Transportation Systems (ITS) projects including:

- Computer assisted dispatch
- Mobile Data Terminals
- Automatic Vehicle Locators
- Vehicle Monitoring Systems (surveillance cameras)
- Transit Center/Transfer Center Kiosks
- Upgraded Vehicle-to-Dispatch Communications System
- On-board Alarm Systems
- Transit Center/Transfer Center Security Systems
- Electronic Fare Payment Smart Cards

Regional Multi-Modal Transportation Facility including:

- Central Operations Office, with meeting rooms and board room
- Central Dispatch Center
- Central Maintenance Facility
- Transit Vehicle Parking Facility
- Bus Wash Facility
- Bus Fueling Facility
- Employee Training Facility
- Transfer Terminal (urban-to-urban, rural-to-urban) – could also be used by intercity bus carriers and taxi cabs

(Facility could be developed into a transit plaza, with day care center, ATM machines, coffee shop, and deli, etc.)

APPENDIX D: Additional Information on Project Listing

T15-06b

TxDOT approved Scope of Work to include direct connect from Northbound I35 to Westbound US 190.

W30-29

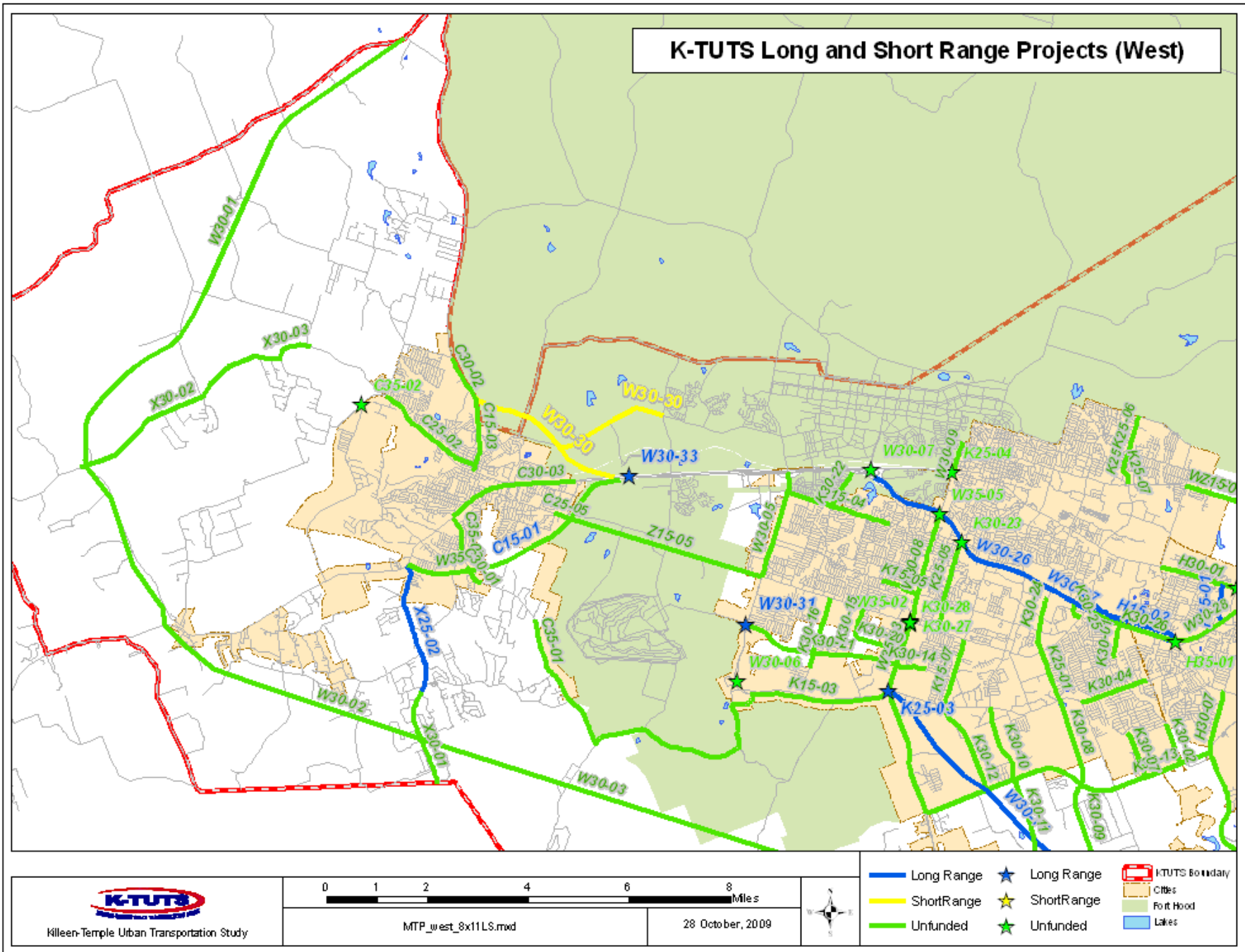
TxDOT approved scope of work to include construction of direct connect from Eastbound US190 to Southbound I35.

Appendix E: Other Planning Documents on File and available for viewing or downloading at www.ktuts.org :

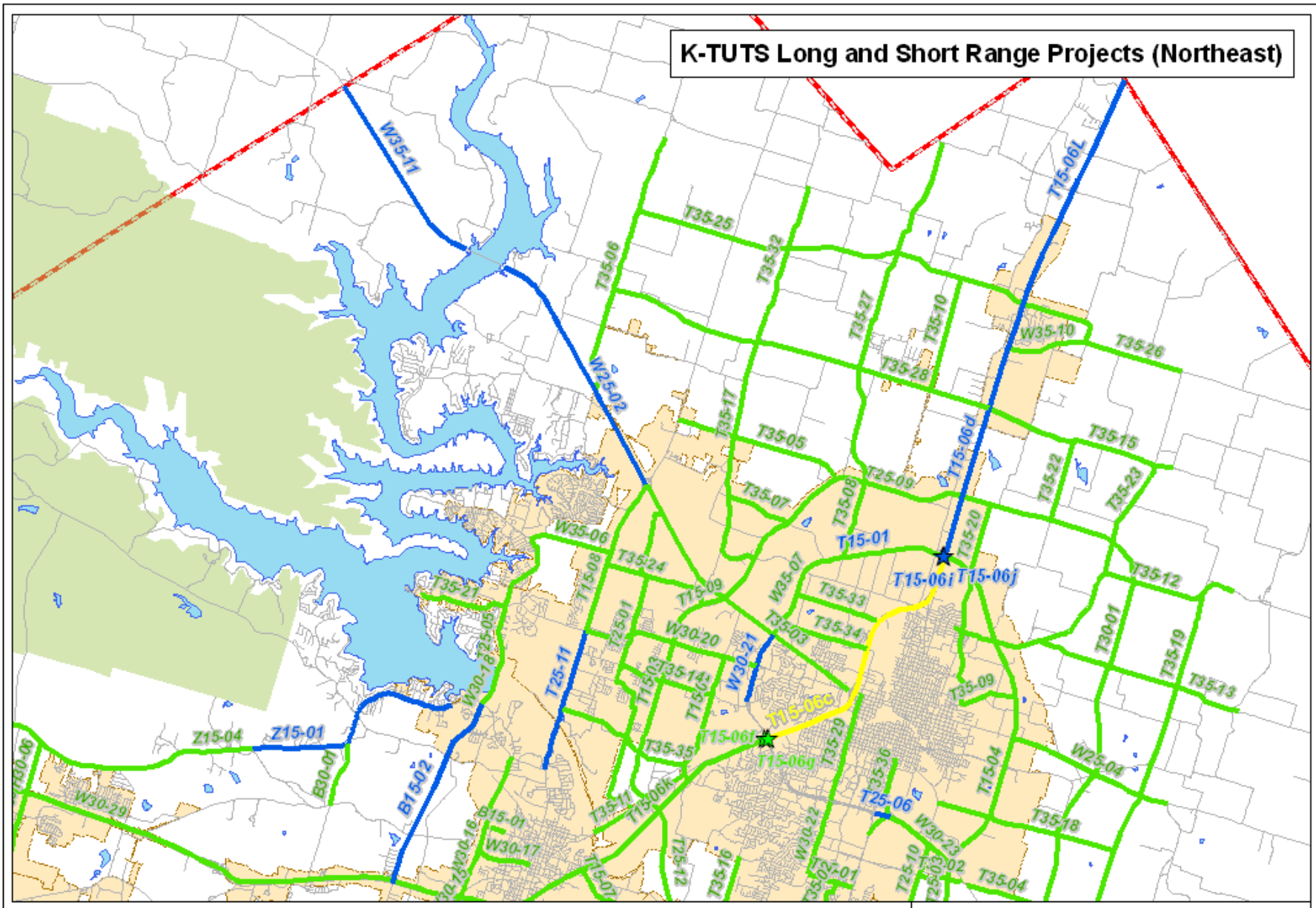
-
1. Project Scoring Criteria
 2. Public Involvement Policy
 3. Unified Work Program
 4. Transportation Improvement Program
-

K-TUTS Disclaimer:

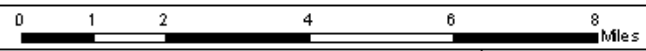
This report was funded in part through grants from the Federal Highway Administration, Federal Transit Administration, and U.S. Department of Transportation. The views and opinions of the Killeen–Temple Urban Transportation Study expressed herein do not necessarily state or reflect those of the U. S. Department of Transportation.



K-TUTS Long and Short Range Projects (Northeast)



Killeen-Temple Urban Transportation Study



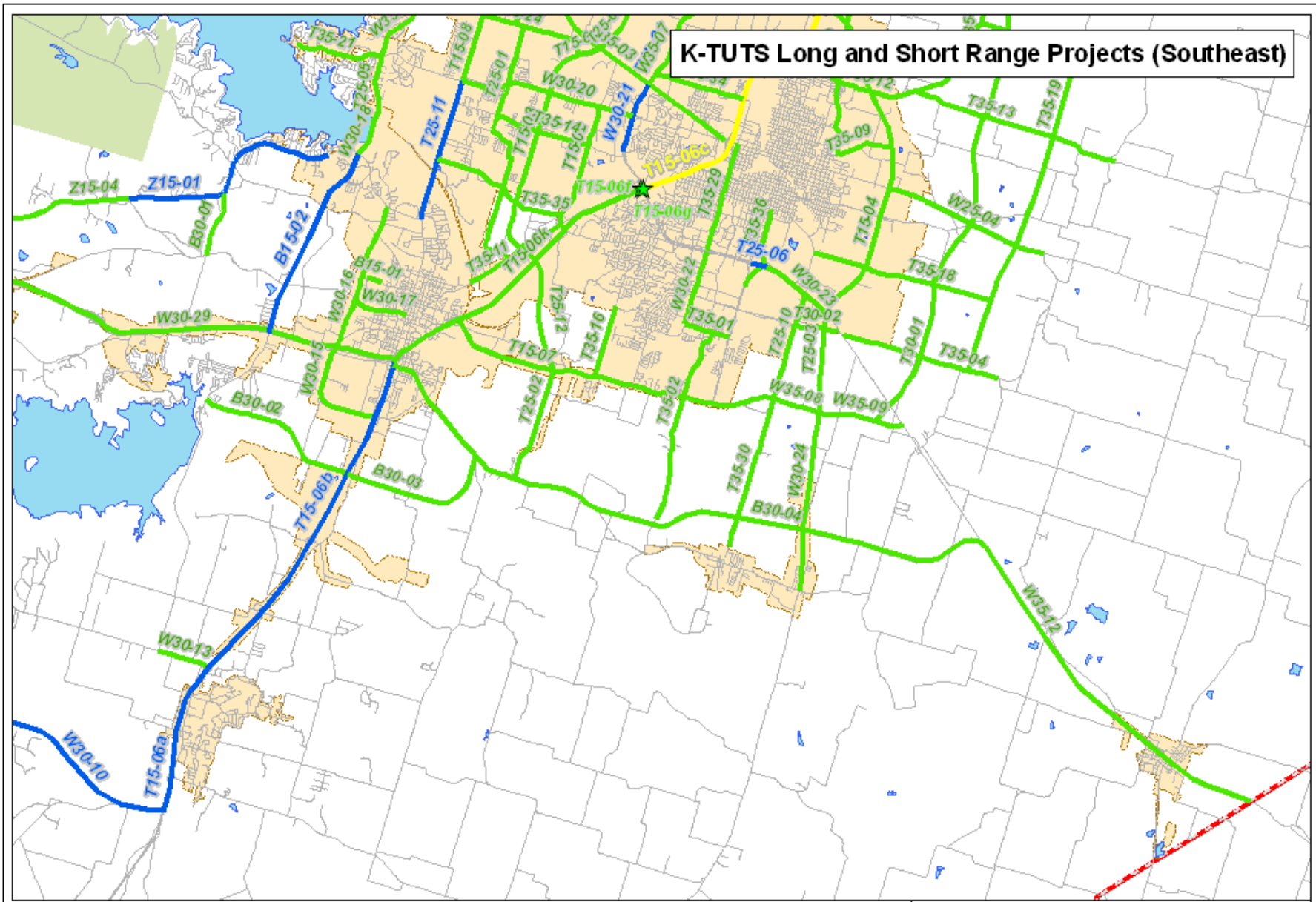
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28 October, 2009



- Long Range
- Short Range
- Unfunded
- ★ Long Range
- ★ Short Range
- ★ Unfunded
- K-TUTS Boundary
- Cities
- Fort Hood
- Lakes

K-TUTS Long and Short Range Projects (Southeast)



<p>Killeen-Temple Urban Transportation Study</p>	<p>Miles</p>		Long Range	Long Range	K-TUTS Boundary
			Short Range	Short Range	
			Unfunded	Unfunded	Fort Hood
			Lakes		

Short
Range

<i>Number</i>	<i>Facility</i>	<i>Location</i>	<i>Description</i>	<i>Total Score</i>	<i>2008 Cost</i>	<i>YOE Cost</i>	<i>PE Cost</i>	<i>ROW Cost</i>	<i>Total Project Cost</i>
T15-06e	I-35	S loop 363 in Temple	Construct at grade direct connector	54.9	\$9,900,000	\$10,707,840	\$485,100	\$18,860,992	\$30,053,932
W30-30	SH 9	US 190 to FM 116	Construct initial 2 lane of ultimate 4 lane divided roadway for Copperas Cove Northeast Relief Route (SH 9) and construct Tank Destroyer Blvd. connection	51.9	\$24,800,000	\$26,823,680	\$1,215,200	\$120,000	\$28,158,880
T15-06c	I-35 (2B)	South Lp 363 in Temple to N Loop 363 in Temple	Reconstruct and widen to 6 lanes	51.9	\$188,190,000	\$228,961,910	\$9,221,310	\$83,206,897	\$321,390,117
M30-01a	Preventive Maintenance and Rehabilitation		Various Locations				\$39,267,391		
M30-06a	Structures Replacement		Various Locations				\$6,544,565		
M30-08a	STP Safety		Various Locations				\$9,816,848		
M30-09a	STP Transportaion Enhancements		Various Locations				\$6,544,565		
M30-10a	Miscellaneous		Various Locations				\$3,272,283		
Short Range Total:						\$266,493,430	\$10,921,610	\$102,187,889	\$379,602,929

Long
Range

<i>Number</i>	<i>Facility</i>	<i>Location</i>	<i>Description</i>	<i>Total Score</i>	<i>2008 Cost</i>	<i>YOE Cost</i>	<i>PE Cost</i>	<i>ROW Cost</i>	<i>Total Project Cost</i>	<i>Fund Cat</i>
T15-06b	I-35 (1C)	FM 2484 to US 190 in Belton	Reconstruct and widen to six lanes and construct northbound frontage road at Lampasas River	51.1	\$131,812,500	\$148,271,136	\$6,458,813	\$41,993,880	\$196,723,829	4
T15-06h	I-35	North Loop 363 in Temple	Construct at grade direct connector	50.9	\$7,000,000	\$7,571,200	\$343,000	\$19,062,688	\$26,976,888.0	4
T15-06a	I-35 (1B)	FM 2843 to FM 2484	Reconstruct and widen to six lanes	49.8	\$83,600,000	\$110,011,897	\$4,096,400	\$13,668,344	\$127,776,640.7	4
T15-06d	I-35 (3A1)	N Loop 363 to North of Troy	Reconstruct and widen to 6 lanes	48.4	\$124,909,000	\$146,125,863	\$6,120,541	\$23,514,775	\$175,761,178.9	4
W30-33	US 190	At Railhead Road	Construct Grade Separation	46.7	\$3,300,000	\$3,569,280	\$161,700	\$506,500	\$4,237,480.0	12, ARR A
C15-01	US 190 Bypass	East of Copperas Cove to 0.5 mi West of Lampasas County Line	Construct 2 lanes of ultimate 4 lane divided controlled access roadway for Copperas Cove Relief Route to reduce congestion	45.1	\$52,100,000	\$56,351,360	\$2,552,900	\$30,000	\$58,934,260.0	3
W30-26	US 190	SP 172 to WS Young	Widen from 4 to 6 lane divided freeway, improve frontage road & ramp alignment	41.4	\$43,000,000	\$48,369,152	\$2,107,000	\$0	\$50,476,152.0	4
W30-27	US 190	WS Young to FM 2410	Widen from 4 to 6 lane divided freeway, improve frontage road and ramp alignment	40.7	\$30,000,000	\$33,745,920	\$1,470,000	\$1,589,952	\$36,805,872.0	3
W30-31	SH 201	At Mohawk Drive	Modify at-grade intersection	38.3	\$2,080,000	\$2,249,728	\$101,920	\$500	\$2,352,148.0	12, ARR A
T25-11	SH 317	FM 439 to FM 2305	Widen from 2 to 4 lane with raised median.	36.6	\$16,000,000	\$17,997,824	\$784,000	\$6,321,700	\$25,103,524.0	11
H15-02	FM 2410	FM 3470 (Stan Schlueter) to US 190	Widen from 2 to 4 lane with continuous left turn lane	33.1	\$7,500,000	\$8,436,480	\$367,500	\$0	\$8,803,980.0	11
T15-01	Loop 363	SH 36/53 to I-35 North of Temple	add continuous frontage roads to provide interim 4 lane divided roadway, construct interchange at SH 36, Wendland Rd and grade separation at BNSF RR	32.8	\$49,900,000	\$53,971,840	\$3,755,474	\$8,600,000	\$66,327,314.0	3, 12, Local
T25-06	Spur 290/Lp 363 Interchange		Construct interchange, 6 lane freeway with median and frontage roads TxDOT submitted (Construct interchange and upgrade freeway section with frontage roads)	32.2	\$20,000,000	\$32,020,644	\$980,000	\$6,549,051	\$39,549,695.4	3
X25-02	FM 2657	US 190 to 0.1 mile South of CR 4744	Widen from 2 lane to 4 lane divided roadway	29.8	\$11,186,735	\$12,099,573	\$548,150	\$4,300,000	\$16,947,722.6	1,11
K25-03	SH 195	At SH 201	Construct overpass at intersection	29.7	\$16,000,000	\$17,305,600	\$784,000	\$3,034,060	\$21,123,660.0	4

H15-01	FM 3423	Business 190 to US 190	Widen from 2 to 4 lane divided roadway	29.1	\$3,000,000	\$3,244,800	\$147,000	\$0	\$3,391,800.0	11
W25-02	SH 36	SH 317 to North K-TUTS boundary	Widen from 2 to 4 lane divided roadway	26.4	\$35,000,000	\$47,899,917	\$1,715,000	\$0	\$49,614,916.8	3, 11
Z15-01	FM 439	FM 93 to Belton City Limits	Widen from 2 to 4 lane divided roadway	23.2	\$16,000,000	\$19,466,446	\$784,000	\$0	\$20,250,446.4	11
W30-10	SH 201	SH 195 to IH 35	Construct 2 lanes of ultimate 4 lane divided roadway	23.0	\$150,000,000	\$240,154,833	\$7,350,000	\$11,523,000	\$259,027,832.8	3
W30-34	IH 35 and US 190	Various locations	Install overhead dynamic message signs	17.8	\$1,349,835	\$1,579,116	\$66,142	\$0	\$1,645,257.9	
W30-21	NW Loop 363	Hopi Trail to SH 36/SH 53	Reconstruct 4 lane divided freeway & add continuous frontage roads, reconstruct interchange @ FM 2305	33.1	\$19,400,000	\$25,529,077	\$950,600	\$156,000	\$26,635,676.5	3
B15-02	FM 2271 Extension	FM 439 to US 190 @ FM 1670	Construct 2 lane of ultimate 4 lane divided with raised median	27.8	\$35,000,000	\$46,057,612	\$1,715,000	\$0	\$47,772,612.3	11,3
T15-06i	I-35	at NW loop 363	Construct elevated direct connector from northbound NW LP 363 to northbound I-35	50.9	\$15,000,000	\$23,091,811	\$735,000	\$0	\$23,826,811	4
T15-06j	I-35	at NW loop 363	Construct elevated direct connector from southbound I-35 to southbound NW loop 363	50.9	\$15,000,000	\$23,091,811	\$735,000	\$0	\$23,826,811	4
T15-06l	I-35	North of Troy at Carpenter's Creek to Falls County Line	Reconstruct and widen to 6 lanes			\$106,306,093	\$5,208,997	\$5,379,600	\$133,701,649	4
W35-11	SH 36	North side of Lake Belton bridge to Coryell County Line	Widen to 4 Lane divided highway			\$8,224,573	\$1,072,513	\$2,000,000	\$26,421,031	3
M30-01a	Preventive Maintenance and Rehabilitation		Various Locations			\$96,940,471				
M30-06a	Structures Replacement		Various Locations			\$16,156,745				
M30-08a	STP Safety		Various Locations			\$24,235,118				
M30-09a	STP Transportation Enhancements		Various Locations			\$16,156,745				
M30-10a	Miscellaneous		Various Locations			\$8,078,373				

Long Range

Total: \$1,082,029,297 \$43,359,139 \$146,230,050 \$1,266,238,887

Regionally Significant - Unfunded

<i>Project No.</i>	<i>Facility</i>	<i>Location</i>	<i>Description</i>	<i>Total Score</i>	<i>2008 Cost</i>	<i>Funding Project No.</i>
T15-06f	I-35	at S loop 363	Construct elevated direct connector from Northbound I-35 to northbound NW lp 363	54.9	\$15,000,000	T15-06f
T15-06g	I-35	at S loop 363	Construct elevated direct connector from southbound NW LP 363 to southbound I-35	54.9	\$15,000,000	T15-06g
T15-06k	I-35	S loop 363 in Temple to US 190 in Belton	Reconstruct and widen to 8 lanes	51.3	\$120,000,000	T15-06k
T15-06i	I-35	at NW loop 363	Construct elevated direct connector from northbound NW LP 363 to northbound I-35	50.9	\$15,000,000	T15-06i
T15-06j	I-35	at NW lp 363	Construct elevated direct connector from southbound I-35 to southbound NW loop 363	50.9	\$15,000,000	T15-06j
W35-01	US 190	US 190 W of Copperas Cove to US 190 E of Copperas Cove	Construct main lanes to provide a 4 lane freeway with frontage roads	43.9	\$52,000,000	W35-01
C30-03	US 190	S. FM 116 to Liberty Bell Lane	Add curb and gutter	41.4	\$642,393	C30-03
W30-07	US 190	SP 172	Reconstruct major interchange	40.6	\$46,000,000	W30-07
H35-01	FM 2410	at US 190	add turn-around lanes, ramp and intersection work	37.3	\$5,000,000	H35-01

W30-28	US 190	FM 2410 to Nola Ruth in Harker Heights	Widen from 4 to 6 lane divided freeway, improve frontage road & ramp alignment	36.2	\$20,000,000	W30-28
W30-08	SH 195	US 190 to FM 3470	Widen from 4 lane divided to 6 lanes with raised median	35.7	\$12,000,000	W30-08
W35-05	US 190	SH 195	Upgrade interchange	35.2	\$50,000,000	W35-05
K30-25	Bacon Ranch Rd Exit	US 190 Access Road to Greenlee Drive	Construct 2 lane to Bacon Ranch, then 4 lane to Greenlee Dr; curb & gutter	35.2	\$537,761	K30-25
K30-01	Rosewood Drive	Rosewood drive to S Roy Reynolds Dr/MLK Jr. (FM2410)	construct 4 In divided roadway and interchange at US 190 and tie into either Stonetree Dr or S Roy Reynolds Dr.	32.8	\$16,000,000	K30-01
W35-07	NW LP 363	SH 36 to IH 35 North of Temple	Construct main lanes to provide a 4-lane freeway with frontage roads	32.1	\$22,400,000	W35-07
K30-27	SH 195	At FM 3470 North Side	Construct turn-around on North Side	31.7	\$400,000	K30-27
K30-28	SH 195	At FM 3470 South Side	Construct turn-around on South Side	31.7	\$400,000	K30-28
K25-04	SH 195	At Bus 190	construct grade separation over Bus 190 and BNSF RR	31.6	\$20,000,000	K25-04
W30-09	SH 195	Business 190 to the East Gate of Fort Hood	Widen from 4 to 6 lane divided roadway	31.4	\$6,000,000	W30-09
C15-03	FM 116	FM 1113 to House Creek	Widen from 2 to 4 lane divided roadway	31.3	\$5,266,890	C15-03
W30-05	SH 201	US 190 to FM 3470	Widen from 5 to 6 lane divided roadway	31.3	\$9,000,000	W30-05

W30-22	FM 1741 (31st Street)	Loop 363 S to Waters Dairy Rd	Widen from 4 lane to 6 lane divided roadway	30.4	\$9,000,000	W30-22
C25-02	FM 1113	FM 116 to Summers Rd	Widen from 2 to 4 lane divided roadway	29.8	\$11,101,958	C25-02
W30-29	US 190	Nola Ruth to IH 35 in Belton	Widen from 4 to 6 lane divided freeway, improve frontage road and ramp alignment	29.3	\$110,000,000	W30-29
Z15-05	W Ft. Hood LP	SH 201 (Clear Creek) to 190 Bypass (Copperas Cove)	Construct 2 lane w/ shoulder	28.4	\$4,839,845	Z15-05
T15-07	FM 93	IH 35 to FM 1741	Widen to provide for a raised median.	27.9	\$4,625,000	T15-07
T15-08	SH 317	FM 2305 to SH 36	Widen from 2 to 4 lane with raised median	27.6	\$8,400,000	T15-08
T25-05	FM 2271	FM 2305 to Lake Belton Dam	Widen from 2 to 4 lane divided roadway	27.5	\$4,200,000	T25-05
T35-29	S 31st street	Adams Ave to SW HK Dodgen Lp	Widen from 4 to 6 lane divided roadway with curb and gutter	26.0	\$12,000,000	T35-29
C30-02	FM 116	House Creek to Lutheran Church Road	Widen from 2 to 4 lane divided roadway	25.9	\$2,989,316	C30-02
B30-04	US 190 (extension)	IH 35 to SH 36	Construct 2 lanes of ultimate 4 lane freeway on new location	25.8	\$96,000,000	B30-04
W35-02	SH 195	At FM 3470	Upgrade interchange	25.7	\$50,000,000	W35-02
W30-20	FM 2305	Loop 363 to SH 317	Widen from 4 lane divided to 6 lane divided roadway	25.3	\$9,810,000	W30-20

T25-03	FM 95	US 190/SH 36 to FM 93	Widen to 2 lane to 4 lane divided with curb and gutter	24.9	\$6,700,000	T25-03
W30-23	Loop 363	SP 290 to SH 95	Upgrade to 4 lane freeway with continuous frontage roads, and grade separation at MLK Blvd/Taylor Hwy	24.5	\$13,000,000	W30-23
W35-08	FM 93	FM 1741 to SH 95	Widen from 2 to 4 lanes, provide for a raised median, and construct grade separation at UP RR	24.3	\$10,800,000	W35-08
X30-03	FM 3536	Lampasas County Line to FM 1113	Construct 2 lane w/ shoulder on new location	23.3	\$405,145	X30-03
K15-04	Watercrest Rd	Willow Springs Rd to SH 201	Widen from 2 to 5 lane section w/ shoulder	22.8	\$3,274,013	K15-04
K15-05	Elms Road	Carpet Lane to SH 195	Construct 5 lane section w/ shoulder	22.5	\$1,234,903	K15-05
W30-16	Loop 121	US 190 to FM 439	Widen from 2 to 4 lane divided roadway	22.0	\$12,000,000	W30-16
Z15-04	FM 439	0.5 Miles East of Roy Reynolds to FM 93	Widen from 2 to 4 lane divided roadway	21.7	\$30,000,000	Z15-04
W30-18	FM 2271	North of Belton Dam to FM 439	Widen from 2 to 4 lane divided roadway	21.5	\$25,000,000	W30-18
T25-10	Little River/Taylor Rd	LP 363 to FM 93	Widen from 2 to 4 lane w/ curb & gutter	21.4	\$5,250,000	T25-10
K30-21	E/W Arterial	SH 201 (Clear Creek) to SH 195	Construct 4 lane w/ median, curb & gutter	21.2	\$8,916,849	K30-21
C35-02	Grimes Crossing	At Bea Powell Rd	Create an overpass of the existing BNSF railroad	21.2	\$6,500,000	C35-02

	Rd					
W30-17	FM 93	SH 317 to Loop 121	Widen from 2 to 4 lane divided roadway	21.2	\$4,000,000	W30-17
K30-20	E/W Collector	Littlerock Dr to SH 195	Construct 4 lane w/ curb & gutter	20.9	\$2,507,522	K30-20
K15-03	SH 201	SH 195 to Killeen Airport entrance	Widen from 2 to 4 lane divided roadway	20.8	\$7,200,000	K15-03
W30-06	SH 201	At Killeen Airport entrance	Construct Interchange	20.6	\$10,000,000	W30-06
W35-09	FM 93	SH 95 to SH 36	Widen from 2 to 4 lanes, provide for a raised median	20.2	\$4,800,000	W35-09
K30-02	Rosewood Drive	Chaparral Road to Serpentine Dr	Construct 4 lane w/ median, curb & gutter	20.0	\$4,023,471	K30-02
T15-09	W Outer Loop	FM 2305 to SH 36	Widen divided roadway with curb and gutter	19.8	\$3,250,000	T15-09
K25-01	Cunningham Rd	Little Nolan Rd to Stagecoach Rd	Widen from 2 to 4 lane w/ shoulder	19.6	\$3,701,058	K25-01
B15-01	W 9th Ave	W 9th Ave to Loop 121	Construct 2 lane extension w/ curb & gutter	19.4	\$2,277,574	B15-01
H30-01	Business 190	From US 190 to Roy Reynolds Dr	Install curbs, regulate driveways, grading & drainage improvements	19.3	\$4,763,196	H30-01
W35-03	SH 195	FM 3470 to Chaparral Rd	Reconstruct to 4 lane freeway with frontage road	19.2	\$30,800,000	W35-03
H30-08	Bus. US 190	At FM 3219	Redesign Intersection	18.8	\$500,000	H30-08

W30-15	Loop 121	I-35 to US 190	Widen from 2 to 4 lane divided roadway	18.7	\$9,000,000	W30-15
C30-01	FM 116	Copperas Cove city limit to end of 5 lane segment	Widen from 2 lane to 5 lane with curb and gutter	18.7	\$2,000,000	C30-01
K30-22	Robinette Road	Watercrest to US 190	Construct 4 lane w/ median (future lane), curb & gutter	17.8	\$1,193,536	K30-22
T25-09	Temple Outer Lp (Moores Mill/Old Howard Roads)	I-35 to SH 36	Widen from 2 to 4 lane w/ shoulder	17.8	\$14,250,000	T25-09
W30-03	SH 201 Extension West	FM 2657 to SH 195	Construct 2 lane of ultimate 4 lane divided roadway on new location, construct interchange at FM 2657	17.6	\$30,400,000	W30-03
C35-01	Extension of FM 116	Coryell County Line to SH 201	Upgrade the current Ivy Pass Rd and Ivy Mountain Rd to FM status with accompanying surface improvements	17.4	\$9,490,000	C35-01
X30-01	FM 2657	0.1 mi South of CR 4744 to Burnet County	Widen from 2 lane to 4 lane divided roadway	17.4	\$3,820,290	X30-01
W30-13	FM 2484	FM 1670 to IH 35	Widen from 2 to 4 lane divided roadway	17.3	\$6,000,000	W30-13
T15-04	N East Loop 363	IH 35 to SH 36	Widen to 4 lane freeway with frontage roads	17.3	\$66,000,000	T15-04
K15-07	Trimmier	FM 3470 to Stagecoach Rd	Widen from 2 to 5 lane section w/ shoulder	16.9	\$2,704,619	K15-07
T25-02	Temple Outer Lp (Witter Ln)	FM 436 to FM 93	Construct 5 lane divided w/ curb & gutter	16.7	\$9,778,653	T25-02

	Extension)					
T30-02	Blackland/Canyon Creek Extension	Little River Rd to SH 36	Construct 4 lane divided roadway with curb and gutter	16.4	\$2,125,000	T30-02
W30-24	SH 95	FM 93 to FM 436 in Little River	Widen from 2 to 4 lane divided roadway	16.2	\$16,000,000	W30-24
B30-01	George Wilson Extension	George Wilson to FM 439	Construct 2 lane w/ shoulder	16.2	\$1,386,984	B30-01
X30-02	FM 3536	FM 2313 to Coryell County Line	Construct 2 lane w/ shoulder on new location	16.1	\$3,520,993	X30-02
K30-24	Cunningham Rd	Little Nolan Rd to US 190	Construct 4 lane w/ median, curb & gutter	16.1	\$835,841	K30-24
K30-04	Stagecoach Road	East Trimmier to Eastern City Limits	Widen from 2 to 5 lane section (managed access), curb & gutter	15.9	\$2,709,486	K30-04
W35-06	FM 2271 Extension	FM 2305 to FM 2483 along FM 2483 E to SH 317	Widen from 2 to 4 lane divided roadway	15.9	\$14,000,000	W35-06
T15-02	Kegley Rd	IH 35 to FM 2305	Widen to 4 lane, add curb and gutter	15.8	\$8,250,000	T15-02
T35-16	Hickory Rd	Stratford Drive to West FM 93	Construct 4-lane undivided roadway with curb and gutter	15.8	\$7,980,000	T35-16
T35-02	Hartrick Bluff Rd.	Waters Dairy to Little River City	Widen to divided roadway add curb and gutter	15.7	\$4,940,000	T35-02

		Limits				
T35-17	Airport Trail	Shine Branch to Central Pointe Pkwy	Construct 4-lane undivided roadway with curb and gutter	15.6	\$26,650,000	T35-17
W30-02	South Loop of Copperas Cove	US 190 west of Kempner to FM 2657	Construct 2 lane roadway w/ shoulder on new location w/ US 190 interchange	15.6	\$16,677,000	W30-02
T35-35	Poison Oak Rd	SH 317 to Kegley Rd	Extend and widen to 4 lane undivided roadway with curb and gutter	15.6	\$9,100,000	T35-35
T35-01	Waters Dairy Road	S 5th Street to S 31st Street	Widen roadway with center turn lane add curb and gutter	15.4	\$2,000,000	T35-01
T35-24	Prairie View Rd	SH 317 to Proposed Outer Loop	Widen to 4 lane and extend undivided roadway with curb and gutter	15.4	\$7,350,000	T35-24
T35-03	Airport Rd/SH 53	IH 35 to SH 317	Widen from 4 to 6 lane divided roadway with curb and gutter	15.4	\$33,000,000	T35-03
W30-01	West Loop of Copperas Cove	FM 580 1.5 mi S of FM 116 to US 190	Construct 2 lane roadway w/ shoulder on new location	15.2	\$42,000,000	W30-01
W35-04	FM 439	Roy Reynolds to FM 3219	Widen from 4 to 6 lane divided	15.2	\$11,000,000	W35-04
H30-05	Warriors Path	FM 2410 to Hwy 190	Widen from 2 to 5 lane section w/ curb & gutter	15.1	\$5,339,890	H30-05
K30-16	Bunny Trail	FM 3470 to Existing Bunny trl	Construct 5 lane section w/ curb & gutter	15.0	\$4,428,617	K30-16
T35-14	Tarver Rd	Pea Ridge Road to Kegley road	Widen from 2 to 4 lane undivided roadway with curb and gutter	15.0	\$3,600,000	T35-14

C25-05	Robertson Ave.	Mueller Street to Old Copperas Cove Rd	Construct 2 lane w/ curb & gutter	14.6	\$854,090	C25-05
H30-03	FM 3219	Business 190 to FM 439	Widen from 2 to 4 lane divided roadway	14.3	\$8,000,000	H30-03
B30-02	Shanklin Rd, W Outer Lp	IH 35 to FM 1670	Construct 4 lane facility	14.3	\$8,100,000	B30-02
K30-07	Platinum Dr	Siltsone Ip to Chaparral Rd	Construct 4 lane w/ curb & gutter	14.1	\$2,387,073	K30-07
T35-05	Cedar Creek	SH 317 to Old Howard Rd	Widen from 2 to 4 lane undivided roadway with curb and gutter	14.1	\$8,910,000	T35-05
H30-07	FM 3481	FM 2410 to FM 2484	Widen from 2 to 4 lane divided roadway	14.1	\$13,109,435	H30-07
K30-10	W.S. Young	Stagecoach to Chaparral Road	Construct 4 lane w/ median, curb & gutter	14.0	\$3,879,906	K30-10
K30-12	Trimmier Road	Stagecoach to Chaparral	Construct 5 lane divided w/ curb & gutter	14.0	\$3,939,522	K30-12
W35-10	FM 935	FM 935 E of Troy at Turkey Rd to I-35	Construct 2 lane roadway with shoulders on new location	14.0	\$4,800,000	W35-10
T35-36	S 5th St. Interchange to S 1st St.	SE HK Doggen Loop to Avenue M	Extend and widen from 4 to 6 lane divided roadway with curb and gutter	13.7	\$14,600,000	T35-36
K30-08	Cunningham Rd	Stagecoach to Chaparral Road	Construct 4 lane w/ median, curb & gutter	13.7	\$3,294,696	K30-08
T30-01	Temple Outer Loop	IH 35 to FM 93 & SH 36 Junction	Construct 4 lane divided roadway with shoulder	13.5	\$26,500,000	T30-01

T35-20	Lower Troy Rd	Berger Rd to French Ave	Extend and widen from 2 to 4 lane undivided roadway with curb and gutter	13.4	\$13,650,000	T35-20
T35-22	Gun Club Road	Bottoms East Road to Proposed Outer Loop	Construct 4-lane undivided roadway with curb and gutter	13.4	\$14,820,000	T35-22
T35-23	Bottoms Rd	FM 438 to Bottoms East Rd	Widen from 2 to 4 lane undivided roadway with curb and gutter	13.4	\$8,050,000	T35-23
K25-07	Twin Creek Dr	FM 439 to Lake Rd at 60th St	Extend 5 lane divided w/ curb & gutter	13.3	\$1,708,181	K25-07
W25-04	SH 53	E loop 363 to FM 3117	Widen from 2 lane to 4 lane divided roadway	13.3	\$12,000,000	W25-04
T15-03	West Outer Loop	FM 817 to FM 2305	Widen from 2 to 4 lane w/ curb & gutter	13.2	\$8,250,000	T15-03
K30-09	Cunningham Rd	Chaparral to Slawson Road	Construct 4 lane w/ median, curb & gutter	13.2	\$3,795,957	K30-09
K30-13	Chaparral Road	SH 195 to FM 3481	Widen from 2 to 4 lane divided roadway	13.2	\$16,709,511	K30-13
C35-03	Sidewalk	US 190 to Martin Walker Elementary School	Construct a 5 foot pedestrian sidewalk	13.0	\$1,000,000	C35-03
K25-06	60th St	Hilliard Ave to Schwald Rd	Construct 5 lane section w/ shoulder	13.0	\$7,117,419	K25-06
K30-15	Little Rock Rd	Fm 3470 to E/W Collector	Construct 4 lane w/ curb & gutter	12.9	\$1,249,503	K30-15
T35-30	Old Hwy 95	FM 93 to Little River City Limits	Widen from 2 to 4 lane undivided roadway with shoulder	12.8	\$3,510,000	T35-30

T35-09	E French Ave	N 24th Street to NE HK Dodgen loop	Extend and add curb and gutter	12.6	\$3,000,000	T35-09
K30-11	W.S Young	Chaparral to FM 2484	Construct 4 lane w/ median, curb & gutter	12.6	\$14,322,438	K30-11
T35-08	Wendland Rd	Loop 363 to Moores Mills Rd	Widen from 2 to 4 lane with curb and gutter	12.4	\$3,780,000	T35-08
T35-18	Tower Road Extension W	MLK to Proposed Red Barn Extension	Extend and widen from 2 to 4 lane undivided roadway with curb and gutter	12.4	\$19,380,000	T35-18
T35-34	W Nugent Ave	IH 35 to NW HK Dodgen Loop	Widen from 2 to 4 lane undivided roadway with curb and gutter	11.9	\$3,400,000	T35-34
T35-26	Luther Curtis Rd	IH 35 to Bottoms Rd	Widen from 2 to 4 lane undivided roadway with shoulder	11.7	\$9,450,000	T35-26
T35-33	Enterprise Rd Extension	IH 35 to NW HK Dodgen Loop	Extend and widen to a 4 lane undivided roadway with curb and gutter	11.6	\$5,600,000	T35-33
T35-07	Mouser Rd	Loop 363 to Airport Trl	Widen from 2 to 4 lane with curb and gutter	11.4	\$3,240,000	T35-07
T35-11	Charter Oaks Dr	Midway Drive to Leon River	Widen from 2 to 4 lane undivided roadway with curb and gutter	11.4	\$2,000,000	T35-11
T35-19	Red Barn Lane	FM 3117 to FM 438	Extend and widen from 2 to 4 lane undivided roadway with shoulder	11.4	\$22,400,000	T35-19
H30-06	Warriors Path Ext	US 190 to FM 439	Construct 5 lane divided w/ curb & gutter	11.3	\$2,256,891	H30-06
T25-01	Pea Ridge Rd	SH 36 to Charter Oak Drive	Extend pavement to 2 lane section with center turn lane	11.3	\$2,110,758	T25-01
B30-03	Outer Loop	Shanklin Rd to	Construct 2 lane w/ shoulder	11.1	\$7,770,762	B30-03

	E	FM 436				
K30-14	Atlas Ave	SH 195 to Existing Atlas Ave	construct 4 lane with curb and gutter	11.1	\$1,897,979	K30-14
T25-12	SW Temple Outer Loop	FM 817 to FM 93	Construct 4 lane divided roadway	11.1	\$23,373,365	T25-12
K25-02	60th Street	Lake Rd to Hilliard Ave	Widen from 2 to 5 lane section w/ curb & gutter	10.9	\$2,562,271	K25-02
T35-04	FM 3117	US 190 to Rabbit Rd	Widen from 2 to 4 lane undivided roadway with curb and gutter	10.4	\$8,370,000	T35-04
T35-27	Old Howard Rd Extension	Moores Mill at Wendland Rd to Big Elm Rd	Widen from 2 to 4 lane and realign undivided roadway with curb and gutter	10.4	\$23,800,000	T35-27
T35-28	Shine Branch/FM 1237	SH 317 to IH 35	Widen from 2 to 4 lane undivided and realign roadway with shoulder	10.4	\$25,900,000	T35-28
K25-05	Old Florence Rd	FM 3470 to US 190	Widen from 2 to 5 lane section w/ curb & gutter	10.1	\$7,971,510	K25-05
T35-10	Brewster Rd	FM 1237 to Luther Curtis Rd	Construct 4-lane undivided roadway with curb and gutter	10.0	\$5,700,000	T35-10
T35-13	FM 2086	FM 438 to Creek Rd	Widen from 2 to 4 lane undivided roadway with curb and gutter	9.9	\$10,800,000	T35-13
T35-15	Bottoms East Rd	IH 35 to Arthur Cemetary Rd	Widen from 2 to 4 lane roadway with shoulder	9.8	\$12,950,000	T35-15
T35-21	FM 2305	FM 2271 to Corps Parkland	Widen from 2 to 4 lane divided roadway with curb and gutter	9.8	\$4,320,000	T35-21
T35-06	FM 2409	SH 36 to FM 2601	Widen from 2 to 4 lane undivided roadway with curb and gutter	9.0	\$13,500,000	T35-06
K30-23	Florence Rd/US 190	At Jasper Road	Construct Pedestrian Bridge	8.9	\$1,193,536	K30-23

T35-12	E Young Ave	N 8th at Zenith to Apple Cider Rd	Widen to 4 lane and extend undivided roadway with curb and gutter	8.4	\$16,740,000	T35-12
T35-25	Luther Curtis Connector	FM 2409 to IH 35	Extend and widen from 2 to 4 lane undivided roadway with shoulder	8.4	\$26,600,000	T35-25
T35-32	Willow Grove Rd	Shine Branch Rd to Franklin Rd	Widen from 2 to 4 lane undivided roadway with curb and gutter	8.4	\$8,370,000	T35-32
K30-26	US 190	FM3470 to FM 2410	Reverse ramps, add U-turn and intersection improvements at FM 3470. Widen approaches to FM 2410 overpass.	44.8	\$5,400,000	K30-26