



Stewardship & Oversight Report – FY 2018

Federal Highway Administration,
Texas Division

Updated March 2019

Stewardship & Oversight Agreement

On December 8, 2015, the Federal Highway Administration, Texas Division (FHWA Texas Division) and the Texas Department of Transportation (TxDOT) executed a Stewardship & Oversight Agreement on Project Assumption and Program Oversight (S&O Agreement). This agreement sets forth the roles and responsibilities of the FHWA, Texas Division and TxDOT with respect to Title 23 project approvals and related responsibilities and Federal-aid Highway Program (FAHP) oversight activities. In early 2016, in accordance with the agreement, new TxDOT Executive Director James Bass affirmed his endorsement of the agreement by letter.

Section XI, Subsection A, of the S&O Agreement describes the TxDOT oversight and reporting requirements, including submission of a summary report within two months of the end of the federal fiscal year of all significant stewardship and oversight activities conducting during the previous fiscal year. This report is the third of the annual reports under the S&O Agreement and provides summary information on TxDOT's Fiscal Year 2018 stewardship and oversight activities. It provides data related to all TxDOT activities during the fiscal year and not only activities within which FHWA is participating.

In summary:

- TxDOT let \$7.315 billion in Fiscal Year 2018 for 1104 projects.
 - 824 statewide lets (\$5.693 billion)
 - 71 Local Public Agencies (LPAs) lets (\$256 million)
 - 3 design build lets (\$1.127 billion)
 - 206 other lets (\$239 million)
- TxDOT processed 849 construction project preliminary engineering plan sets for letting in Fiscal Year 2018
- TxDOT managed approximately 1,539 active construction projects during Fiscal Year 2018

Local Public Agencies (LPAs)

Section XI, Subsection B, of the S&O Agreement also requires that TxDOT provide an annual report documenting its fulfillment of responsibilities as a pass-through entity of FHWA funds on projects performed by local public agencies (subrecipients). The final update of that report, entitled "FY2018 Annual Report to FHWA-Texas - Local Government Projects Program (Local Public Agencies)" was submitted to FHWA-Texas on November 30, 2018.

In accordance with federal regulations, TxDOT is ultimately responsible for local public agency compliance with applicable federal laws, rules and regulations on these projects. Additional information on TxDOT's oversight of this program is included in the Subsection B report.

In summary:

- a) TxDOT provided oversight to approximately 678 LG projects with subrecipients, with total funding in the amount of approximately \$4.55 billion (including approximately \$2.44 billion in federal funds).
- b) Entering FY 2018, 81 projects with federal funds were scheduled for letting by LGs during FY 2018 with estimated total funding of \$194 million. LPAs actually let 71 projects (88%) with federal funds in FY 2018 and awarded 61 projects (75%), totalling \$155 million in construction cost. During FY 2018, TxDOT provided concurrence-in-award on 63 LPA-let projects totalling \$159 million in construction cost (13 of those projects had letting dates in FY 2017 and received TxDOT concurrence in FY 2018).
- c) During FY 2018, LGs were reimbursed approximately \$180 million in FHWA funds on highway planning and construction projects.

Key Aspects of TxDOT's Stewardship & Oversight of the Federal-Aid Highway System in Texas

Overview

During Fiscal Year 2018, TxDOT has provided effective stewardship of the Federal-aid Highway System in Texas and responsible oversight of the project delivery programs that affect the condition and performance of that system across the state.

Beyond the regular maintenance and construction activities on the Federal-aid Highway system, the primary major activity that TxDOT handled in FY 2018 was the response to Hurricane Harvey and our efforts to mitigate the storm's tremendous impact on the system. TxDOT efficiently managed roadway closures due to flooding, rapidly responded to prevent flooding, where possible, on key network corridors, handled the removal of thousands of tons of debris, and repaired or replaced countless traffic signals and damaged roadway pavements to bring the system back into service for the traveling public.

Highlights of TxDOT's Harvey response:

- In collaboration with the State Operations Center, TxDOT activated its Hurricane Response and Re-Entry Plan before Hurricane Harvey made landfall, and TxDOT activated its Emergency Operations Center (EOC) on August 24, 2017.
- TxDOT mobilized its personnel and equipment to staging areas in San Antonio and Bryan. By pre-staging both equipment and personnel, TxDOT expedited its entrance to the impacted areas as soon as it was safe for crews to enter.
 - TxDOT provides safe transportation for public evacuation and for emergency services personnel to appropriately prepare for a severe weather event.
 - TxDOT evacuation operations are triggered by the local authorities.
- An essential component of TxDOT's successful emergency preparedness and response operations is effective public communication.
 - Drivetexas.org; (more than 5.1 million site visits)
 - TxDOT Travel Information phone line (800) 452-9292 (more than 163,000 calls)
 - Media communications; and

- Dynamic message signs.
- After a hurricane makes landfall, one of TxDOT's top priorities is to clear roadways of debris for emergency response operations.
- After Harvey, as soon as it was safe for TxDOT personnel to enter the impacted areas, TxDOT crews provided 24-hour, seven-day-a-week support.
 - 5,020 employees have participated
 - 1,072,132 labor hours
- TxDOT's response to Hurricane Harvey included:
 - high water rescue support;
 - traffic sign and signal repair;
 - debris cleanup (20,820,335 cubic feet of debris removed);
 - installation of aqua dams;
 - bridge and roadway inspections/repair;
 - equipment and resources for local governments; and
 - real time roadway updates through the DriveTexas.org website.
- In the immediate aftermath of Harvey, more than 500 roadways were closed because of high water and 4,319 on-system bridges (state assets) were impacted. After floodwaters receded, in partnership with FHWA, TxDOT and its contractors inspected roads and bridges for damage and made repairs.
- TxDOT's cost estimates are:
 - Response Mobilization - \$67.4 million
 - Roadway Damage - \$112.5 million
 - TxDOT Facilities & Ferry Operations - \$10 million
 - Equipment Costs - \$6.2 million
- TxDOT performed after action reviews of the response to Hurricane Harvey.
 - TxDOT is updating its Hurricane Response Re-Entry plan to reflect the lessons learned and to improve TxDOT's response to future hurricanes.
 - TxDOT is also evaluating roadways that have repeatedly flooded during rain events to determine if the roadway should be improved to mitigate future flooding.

The safety of the traveling public is TxDOT's priority when responding to disasters. Harvey presented a formidable challenge, but TxDOT was prepared to respond. The professionalism and dedication of TxDOT employees was evident throughout Hurricane Harvey. TxDOT staff will continue to respond to this disaster in the weeks and months ahead.

Despite this tremendous challenge to our staff, construction partners and local governments, TxDOT continued to make progress in providing quality stewardship of the system.

- At the end of the fiscal year, the percentage of pavements on the Interstate System in Texas in good condition (International Roughness Index < 95) was 77% (an increase of more than 6% compared to FY 2017); while the percentage of pavements on the Interstate System in Texas in poor condition was only 1.05%. Meanwhile, TxDOT maintained the pavements on the rest of the National Highway System (NHS) in Texas at 86.07% in good condition (using TxDOT's "good or better" pavement

measure), an increase of more than 2%, with only 4.85% of the non-Interstate NHS in Texas falling in the poor condition category.

- For FY 2018, the number of structurally deficient bridges on the NHS in Texas was only 78 (an improvement of 6% compared to FY 2017), while the percent deck area of structurally deficient NHS bridges in Texas was less than 1% (0.90%).

TxDOT presents these and other performance indicators for the Stewardship & Oversight Agreement in the [Stewardship and Oversight Indicators section](#) of this report. TxDOT will continue to work with the FHWA Texas Division to ensure that these performance indicators provide meaningful information on our efforts to effectively and responsibly manage the Federal-aid Highway Program in Texas.

PS&E Packages

All TxDOT district offices submit their plans, specifications, and estimate (PS&E) packages for all state-let projects to the Design Division for final processing prior to letting. These PS&E packages are submitted electronically through a PDF Portfolio process (ePS&E). The submitted PS&E package includes plan sheets, standard drawings, specifications, engineer's project estimate, general notes, and supporting documentation certifying the completion or conditional completion of right of way acquisition, utility work, relocation work, and railroad work. The Design Division has been sharing the above described project oversight information with the FHWA regional office since April 2016 to assist in their project authorization process.

To improve controls on required PS&E package documentation and coordination with FHWA, TxDOT issued a policy memo August 27, 2018 on requirements and expectations of the PS&E package submittal and PS&E processing schedule deadlines to all TxDOT District Engineers. The policy requires the District Engineer to request approval from TxDOT's Chief Engineer for any projects where complete packages cannot be submitted to FHWA prior to the deadline. TxDOT's Chief Engineer then officially notifies FHWA Division headquarters. This policy is to 1) encourage accountability and consistency on the requirements of complete PS&E packages, 2) enforce deadlines and 3) improve coordination with FHWA in advance to ensure successful project authorization. To improve communication and implementation of this policy, monthly meetings are held with Design Division, Finance Division, Railroad Division, and members of TxDOT administration to review critical projects on the letting schedule.

In addition, FHWA develops a list of selected TxDOT projects for their review annually. The Projects of Division Interest (PODI) represent a selected group of TxDOT projects in which FHWA requests, from the appropriate district office, project specific information in order to perform a compliance review. The Design Division, upon receipt from FHWA, coordinates the list with the respective district offices (see attached list).

To improve project coordination and support of PODI's, Major Projects, and the final PS&E processing prior to authorization, Design Division reorganized the Division by these respective functional areas (Project Development Support Section and Final PS&E Processing Section). Quarterly meetings are also held with FHWA staff involved in both

preliminary project development and final PS&E reviews and authorization to ensure that Divisions are providing consistent support.

Railroad Agreements in PS&E Packages

The Rail Division is responsible for providing information to the districts regarding the status of the execution of the railroad agreements, which are required in the PS&E packet. This certification is done by the District and submitted to the Design Division. The districts prepare railroad certification letters for the PS&E packet, which are required for each project, whether there is a railroad within the project limits or not. There are four (4) possible Railroad certification types: 1 *No Railroad Work*, 2 *Agreement Executed-Work prior to Construction*, 3 *Agreement Executed- work during construction* and 4 *Agreement not Executed- work during construction*. In Fiscal Year 2018, TxDOT executed a total of 160 railroad agreements in support of construction and maintenance projects.

Under Item 4 in the certification letter, “Agreement not Executed- Work during Construction,” the Rail Division will determine how quickly the railroad agreement can be executed, and the district engineer will confirm that the contractor can work outside of railroad right of way until the agreement is executed without any delay to the contractor. For situations when the estimated execution date of the Railroad agreement is beyond the 3 months after letting the district works with the Design Division and a management plan is prepared and submitted to TxDOT’s Administration for approval to proceed to letting with the unexecuted agreement. This standard operating procedure will confirm approval with administration prior letting the projects and issuing a notice to proceed.

Of the 160 projects that TxDOT certified last year, TxDOT let ten (10) projects without associated agreements. The status of these ten projects is included below:

CSJ	Road Name	Expected Agreement Execution Date	Actual Agreement Execution Date
0028-03-106	US 90	9/30/2017	9/27/2017
0111-03-031	FM 521	10/31/2017	11/7/2017
0057-02-037	BU84-B	2/6/2018	7/31/2017
0039-08-100	IH 69E	2/28/2017	10/22/2018
1708-01-013	FM 1752	1/31/2018	2/16/2018
3026-01-026	FM 2986	7/31/2019	TBD
0912-72-075	Clinton Dr	7/31/2018	11/2/2018
0271-02-055	H-10	8/31/2018	TBD
1939-01-059	FM 2061	9/30/2018	11/7/2018
0177-14-010	SL 494	9/30/2018	TBD

Construction Oversight and Inspections

As part of TxDOT's oversight duties, the Construction Division conducts reviews of district operations and provides for the Quality Assurance Program for TxDOT.

Construction Oversight

The Construction Division conducted an in-depth review of selected change orders on construction projects representing all districts. In addition, Construction Division updated the Construction Contract Administration Manual, assisted with development and implementation of the prime contractor evaluation program, and developed a road user cost calculator for determination of additional project-specific liquidated damages to help ensure the timely completion of projects that have a significant impact on the traveling public.

Quality Assurance

Design-Bid-Build (DBB)

TxDOT Quality Assurance Program (QAP) for Design-Bid-Build (DBB) Projects by the Construction Division (CST), Materials and Pavements (M&P) Section: CST/M&P revised and published this document (approved by FHWA) on May 2018.

<https://www.txdot.gov/business/resources/materials.html>

Guide Schedule of Sampling and Testing for Design-Bid-Build (DBB) Projects (DBB Guide Schedule): CST/M&P revised and published this guide (approved by FHWA) in June 2018.

<https://www.txdot.gov/business/resources/materials.html>

The Construction Division, Materials and Pavements Section, reports to FHWA annually on the Independent Assurance Program, a component of the Quality Assurance Program used by districts to test and approve materials at the district level. TxDOT submitted the [annual report for 2017](#) (the most current) to FHWA for approval.

Design-Build (DB)

TxDOT Quality Assurance Program for Comprehensive Development Agreement (CDA)/Design-Build Projects with a Capital Maintenance Agreement with Three Optional 5-year Terms (DB QAP): CST/M&P revised and published this document (approved by FHWA) on August 29, 2017. <https://www.txdot.gov/business/resources/materials.html>

Guide Schedule of Sampling and Testing for Design-Build Projects by the Independent Quality Firm (IQF): CST/M&P developed and published this guide (approved by FHWA) on August 29, 2017. <https://www.txdot.gov/business/resources/materials.html>

Development of the Owner Verification (OV) Report Template and its guide: CST/M&P developed these documents in order to address FHWA's comments and recommendations on the Program Review of TxDOT's QAP for DB and Concession Projects, dated July 5, 2017. TxDOT developed the template to allow consistency on reporting and to ensure efficient reviews and approval by TxDOT and FHWA. TxDOT obtained FHWA concurrence and completed and published these documents in August 2018.

<https://www.txdot.gov/business/resources/materials.html>

QAP training for CDA/DB projects: CST/M&P started conducting Quality Management Training to all alternative delivery projects to provide an overview of TxDOT's CDA/DB Quality Assurance Program (QAP) including federal and state requirements, quality roles and responsibilities, and the QAP implementation process. TxDOT provides this training at the beginning of any new alternative delivery project and before construction starts. CST/M&P conducted four trainings for all project personnel, including DB contractor's Quality Control (QC), DB Contractor's IQF, TxDOT/General Engineering Consultant (GEC), TxDOT/Independent Assurance (IA) firm, TxDOT/Owner Verification (OV) firm, and TxDOT's project personnel. Training material is project specific, as it contains the DB contractor's organizational chart for that specific project and it describes the firms involved in the project and their roles.

New Independent Assurance Quality Plan (IAQP) document: CST/M&P developed the programmatic Independent Assurance Quality Plan (IAQP) document to provide guidelines and procedures for IA laboratories to administer the TxDOT's IA program on TxDOT CDA/DB projects in accordance with the TxDOT Quality Assurance Program for CDA/Design-Build Projects with a Capital Maintenance Agreement with Three Optional 5-year Terms (DB QAP). This document was developed and published in April 2018.
<https://www.txdot.gov/business/resources/materials.html>

Review of DB Project's OV Quarterly reports: CST/M&P provides the oversight reviews of all quarterly OV reports, before the OV report is submitted by the project team to FHWA for their review and approval.

Materials Risk Workshops: CST/M&P participates in DB project's risk workshops in conjunction with FHWA to review the project-specific risks and identify the appropriate level of TxDOT's verification testing and inspection.

Review of Construction Quality Management Plan (CQMP) and Owner Verification Testing and Inspection Plan (OVTIP): Since FHWA has delegated the review and approval of the project's CQMP and OVTIP to TxDOT, CST/M&P started assisting with the CQMP and OVTIP reviews for all DB projects. The project-specific CQMP is developed by the DB contractor's firm and the project-specific OVTIP is developed by TxDOT/OV firm.

Right-of-way Acquisition; Business, Residential, and Utility Relocation

The Right of Way Division continues to further its mission: *Proactively engage and collaborate with our district partners to provide all of our stakeholders and customers with timely and professionally delivered right of way solutions for TxDOT and the citizens of Texas.*

There are 202 employees in the Right of Way Division (ROW) and in the TxDOT districts who are responsible for the delivery of State right of way. ROW has established protocols for training and taken measures to ensure compliance with state and federal laws and regulations, including the Uniform Relocation Assistance and Real Property Acquisition Act (Uniform Act). ROW personnel monitor Local Government Agencies and consultants

acquiring right of way for compliance with the Uniform Act in acquisitions, relocations, and eminent domain.

Utility accommodations are a cost of right of way acquisition. Therefore, ROW is also responsible for developing policies and procedures related to the reimbursement of utility accommodation costs, as well as ensuring compliance with state and federal laws and regulations. Training is provided to stakeholders in the areas of utility conflict management, utility accommodation policies and procedures, and Buy America compliance.

ROW has standardized the policy and tools related to Buy America compliance. The Right of Way Utilities Manual has been revised to include instructions for implementing changes to Buy America Guidelines effective June 1, 2018; the manual clarifies when additional certification forms must be obtained from the vendor or manufacturer. Training materials have been updated to include new policy updates. The materials also include lessons learned by a root cause analysis of recent non-compliance situations to demonstrate what additional protocols are necessary to ensure compliance with Buy America. ROW expanded its training efforts directly to utility company representatives, TxDOT staff involved in utility coordination activities, and consultants across the State.

ROW changed its Outdoor Advertising section to Commercial Signs. The name change is attributed to a court ruling that found Texas statutes regulating outdoor advertising unconstitutional. *AusPro v. TxDOT*, 506 S.W.3d 688 (2016) (Tex.App.—Austin 2016, *pet. filed*). The court held that Texas Transportation Code, Chapter 391, Subchapters B and C were unconstitutional because the definition of “sign” was over inclusive, making it impossible for the court to determine which provisions applied to commercial speech and which applied to non-commercial speech. The Texas Legislature passed Senate Bill No. 2006, 85th Legislature, Regular Session, 2017, to address the decision of *AusPro*. The bill removes the unconstitutional issue from the statute by replacing outdoor advertising with commercial sign.

During Fiscal Year 2018, ROW accomplished the following:

- 1,743 parcels acquired, with 1,382 acquired by negotiation and 361 acquired by condemnation (20.7% eminent domain rate)
- 679 relocation displaces:
 - 222 residential
 - 232 Business/Farm/Non-Profit Organization
 - 225 personal property moves
- 221 Standard Utility Agreements executed
- 168 Buy America Compliance reviews on utility projects
- 41 projects had Management Plans for ROW or Utilities
- 11 Commercial Sign permits were issued for relocation (this number does not include commercial signs impacted by State highway projects)

ROW has twelve manuals related to right of way subject matter. ROW reviewed and updated all of the manuals in FY 2018. One manual was deleted because the contents were moved into other manuals. Many of the manual updates have been published, with the remaining manuals due to be published in the first half of FY 2019.

Environmental Compliance

TxDOT is in its fourth year working under the Memorandum of Understanding (MOU) between the FHWA and the department concerning State of Texas' participation in the Project Delivery Program pursuant to 23 U.S.C. 327, commonly known as the National Environmental Policy Act (NEPA) Assignment Program. TxDOT completed its fifth FHWA audit in May 2018 as required under the Assignment Program. FHWA stated at the close of in-person audit interviews in May 2018 that TxDOT is in substantial compliance of the MOU. The Environmental Affairs Division (ENV) is working with FHWA on renewing the Assignment MOU for an additional five years. The current MOU expires December 16, 2019.

Fiscal Year (FY) 2018 Federal Environmental Approvals	
Categorical Exclusions	2,764
Environmental Assessment/FONSI	13
Environmental Impact Statement/ROD	0

Key Assignment Metric: Key to the foundation of the Assignment Program is streamlining and shortening the environmental review and approval process for federal aid projects while assuring projects are environmentally compliant. Since the effective date of Assignment (December 16, 2014), the days to complete Environmental Assessments has decreased significantly. To date, there are no EISs both begun and completed during Assignment.

Assigned Federal Projects	Avg time to completion pre-assignment (2012 – Dec 2014) (days) (Baseline) *	Avg time to completion post-assignment (Dec 2014 – Oct 2018) (days)	Time Savings (days)
EA	903	648**	255
EIS	2,934	n/a **	n/a

*Baseline data derived from reviewing Environmental Assessment projects completed between 2012 and December 2014. For baseline data of Environmental Impacts Statements, the project start dates ranged from 1991 to 2006.

** Projects that began and were fully completed during NEPA Assignment. No Environment Impact Statements started after NEPA Assignment began have received a Record of Decision.

Note: In determining data, outliers were removed from data set.

TxDOT ENV calculated the average number of days to complete environmental assessments (EA) with a project decision of a Finding of No Significant Impact (FONSI), and environmental impact statements (EIS) with a project decision of a Record of Decision (ROD), both prior to Assignment (baseline) and post Assignment. The reduction in time to develop and complete an environmental document is a direct result of improved efficiencies, guidance, training,

and the authority assigned to TxDOT to make project decisions on assigned federally funded projects (NEPA Assignment).

Training: ENV provides training to department staff as well as local government, consultant, and other agency staff. In fiscal year 2018 (FY18) ENV provided training to 1,776 persons through classes such as Irrigation and Historic Preservation, Section 7 – ESA and Interagency Cooperation, Air Quality, Environmental Basics for Local Government Staff, and Maintaining Project Consistency. In addition to the broad range of training classes offered, ENV hosts an annual Environmental Conference every September, drawing staff from TxDOT, other Texas state agencies, federal agencies, local governments, metropolitan planning organizations, other state departments of transportation, and private consultants. The September 2018 conference drew 438 participants from 11 states and Washington DC.

Staffing: ENV has a total of 64 technical subject matter experts and 16 business operations staff who guide overall program activities and assist district personnel on federal aid projects.

Projects in active litigation on the basis of NEPA determination: The department is currently in active litigation on one lawsuit on the basis of the NEPA determination: Bar-J-B Co., Inc. et al. v. Texas Department of Transportation et al., filed in the United States District Court for the Northern District of Texas, Dallas Division, on March 13, 2018. This lawsuit involves the State Highway 31 project in Corsicana. The district court's denial of the plaintiffs' request for a preliminary injunction is currently on appeal to the United States Court of Appeals for the Fifth Circuit.

In a 2016 lawsuit challenging a department NEPA determination, Shudde Fath et al. v. Texas Department of Transportation et al., the United States Court of Appeals for the Fifth Circuit affirmed on July 17, 2018, the decision of the United States District Court for the Western District of Texas, Austin Division that the department had complied with all applicable federal statutes and regulations. This lawsuit involved the MoPac South project, the MoPac South intersections project, and the State Highway 45 Southwest project in Austin.

Changes or Enhancements to TxDOT's Organizational Structure

TxDOT did not have organizational changes in fiscal year 2018.

See the TxDOT organizational chart reflecting these changes [here](#).

Note: Although the separation did not take place in FY 2018, the Materials and Pavements Section of the Construction Division was reinstated as a standalone division in September 2018. This division provided information regarding the TxDOT Quality Assurance Program in this report.

Changes or Enhancements to Financial Management Systems

Enhancements to TxDOT's Oracle PeopleSoft Financial Supply Chain Management System (FSCM) Application

Through TxDOT's internal application request (AR) process, TxDOT implemented enhancements to the FSCM through a total of 29 ARs during 2018.

Module	Number of ARs
Accounts Payable	3
Purchasing	5
General Ledger	1
Security	4
Inventory	3
Project Costing	1
Asset Billing	2
Contracts	0
Accounts Receivable	4
Travel and Expense	3
FSCM	3
Total	29

Enhancements to Federal Authorization Funding Obligation System (FAFOS)

FAFOS is an internal TxDOT application that serves as platform to facilitate electronic data sharing (EDS) efforts between TxDOT and FHWA's Financial Management Information System (FMIS) 5.0. There were a total of 5 application requests during FY 2018. These enhancements to FAFOS during 2018 have increased system effectiveness and increased communication capabilities with FMIS 5.0.

Enhancements to TxDOT Project Close-Outs

The Financial Management Division's Accounting Section has improved internal processes through increased automation and refinements of the business process.

Responding to Quarterly Audits of Inactive Projects

TxDOT has made the following changes/enhancements to the process for responding to the quarterly audits of inactive projects:

- Included staff from the Financial Management Division's (FMD) Federal Aid Group in meetings on the inactive projects;
- created standardized text to be used in the justifications for actions taken on those projects;

- Provided additional information and detail in the lists sent to the responsible offices, so that interested parties can more easily identify and research specific projects;
- Provided the responsible offices with their previous responses for use in researching and updating their justifications for prior actions taken on those projects;
- Added earlier and more thorough review by FMD of the justifications submitted by responsible offices (This has helped the responsible offices understand what information is needed for a complete and valid justification); and
- Revised the criteria for assigning separate project numbers to subordinate projects to be let as a single contract—with the goal being to reduce the number of federal project numbers, the dollar amount of inactive projects, and the percentage of inactive federal funds.

Key Findings Related to Delivery of the FAHP from Internal, State, or Federal Audits and Any Related Action Plans to Ensure Compliance

The following audit reports and related action plans relevant to the delivery of the FAHP are available online at the locations listed below.

TxDOT Internal Audits Completed in Fiscal Year 2018

TxDOT Internal Audit of Design-Build Project Oversight - Issued December 2017

http://ftp.dot.state.tx.us/pub/txdot-info/aud/reports/design%20build%20project%20oversight%20audit_final%20report.pdf

TxDOT Internal Audit of Emergency Management - Issued August 2018

http://ftp.dot.state.tx.us/pub/txdot-info/aud/reports/emergency%20management%20audit_final%20report.pdf

TxDOT Internal Audit of Materials Quality Assurance – Utility Projects - Issued August 2018

http://ftp.dot.state.tx.us/pub/txdot-info/aud/reports/materials_quality_assurance-utility_projects_final_audit_report.pdf

TxDOT Internal Audit of Local Government Project Agreements – Issued February 2018

<http://ftp.dot.state.tx.us/pub/txdot-info/aud/reports/lgpa%20final%20report.pdf>

TxDOT Internal Audit of DBE and HUB Management and Reporting – Issued August 2018

http://ftp.dot.state.tx.us/pub/txdot-info/aud/reports/dbe%20and%20hub%20management%20and%20reporting_final%20report.pdf

TxDOT Internal Audit of State Infrastructure Bank - Issued June 2018

http://ftp.dot.state.tx.us/pub/txdot-info/aud/reports/sib%20audit%20report_final.pdf

TxDOT External Audits Completed in Fiscal Year 2018

Audit of Houston-Galveston Area Council Metropolitan Planning Organization

<http://ftp.dot.state.tx.us/pub/txdot-info/aud/reports/h-gac%20mpo%20final%20audit%20report.pdf>

HVJ Associates, Inc.

<http://ftp.dot.state.tx.us/pub/txdot-info/aud/reports/hvj%20associates,%20inc.%20final%20audit%20report%20response.pdf>

HVJ South Central Texas – M&J Inc.

<http://ftp.dot.state.tx.us/pub/txdot-info/aud/reports/hvj%20sctx%20final%20txdot%20audit%20report.pdf>

Texas State Auditor's Office Audits

State of Texas Federal Portion of the Statewide Single Audit Report for the Year Ended August 31, 2017

Report # 18-314

<http://www.sao.texas.gov/reports/main/18-314.pdf>

Stewardship and Oversight Indicators

This section provides performance indicator information as it pertains to the Stewardship and Oversight Agreement between the Texas Department of Transportation and the Federal Highway Administration. In coordination with FHWA Texas Division, TxDOT will review these performance indicators on an annual basis both to ensure that this annual report provides the appropriate indicators and that TxDOT is delivering FAHP projects in an effective manner.

Note: PMF in the tables below refers to results already reported in the federal Performance Management Form.

Bridge Program

Bridge work administered by TxDOT includes projects for construction of new bridges, replacement, rehabilitation, repair, and maintenance of existing bridges on the public highways, roads, and streets. The Bridge Division is responsible for administering funds allocated to Category 6 of the UTP (“Structure Replacement and Rehabilitation”). Category 6 consists of three funding programs: the Highway Bridge Program (HBP), the Bridge Maintenance and Improvement Program (BMIP), and the Railroad Grade Separation (RGS) Program.

The HBP is used for the rehabilitation or replacement of bridges classified as structurally deficient or functionally obsolete. The BMIP is used to improve and stabilize the physical condition of on-system bridges before deterioration becomes irreversible. The RGS is used to construct new on-system highway-railroad grade separation structures at existing highway-railroad at-grade crossings or for replacing existing deficient on-system highway underpasses with railroads. Each of these programs is administered in coordination with TxDOT’s 25 districts to manage the condition and performance of Texas’ more than 55,000 bridges.”

Bridge Program	FY16	FY17	FY18
Number and % of Deck Area of Structurally Deficient NHS Bridges*	60 / .86%	85 / 0.91%	78 / 0.90%
Number and % of Deck Area of Structurally Deficient Non-NHS Bridges*	805 / 1.46%	787 / 1.36%	640 / 1.30%
Number of Load Posted NHS Bridges	34	34	76
Number and % of NHS Bridges by Deck Area Classified As In Good Condition	N/A	N/A	9,151 / 49.86%

**FY16-FY17 numbers in the report are compiled using the structural deficiency criteria in effect prior to January 1, 2018. The criteria defining structural deficiency was changed by FHWA effective January 1, 2018’ however criteria that was in effect prior to January 1, 2018 was applied to determine the FY18 numbers so trend line analyses could be performed on data using consistent criteria.*

Civil Rights

Civil Rights	FY16	FY17	FY18
Fiscal Year Disadvantaged Business Enterprise (DBE) Participation Rate	\$603M	\$519M;	\$482M
Percent of Disadvantaged Business Enterprise (DBE) Goal Achieved	17.1% Achieved; 11.7% Goal	10.83% Achieved; 12.6% Goal	12.7% Achieved; 12.6% Goal
Number of ADA Complaints Received	N/A	N/A	5
Number of Title VI Complaints Received	N/A	N/A	0

Construction Contract Administration

The Construction Contract Administration program assumes the responsibilities under the FHWA's Title 23 Highways for contract awards and inspections, which include general contract administration, material testing and quality assurance, review, and inspections of Federal-aid contracts as well as final inspection/acceptance. All work must be administered in accordance with the contract specifications, terms and conditions, state and federal laws and regulations, and department policy. Proper contract administration includes: developing proper and accurate bid and contract documents, complying with contract documents and specifications, enforcing state and federal regulations, ensuring quality control by overseeing, inspecting and reviewing sampling and testing of all materials and work keeping and maintaining accurate project records, recording, verifying and preparing monthly pay estimates, negotiating and processing of change orders, supplemental agreements and other contract modifications in a timely manner.

Construction Contract Administration	FY16	FY17	FY18
Total Number of Active Construction Projects	1,634	1,569	1,539
Percent of Projects with Low Bid Within +/- 10% of Engineer's Estimate	44.12%	46.54%	51.53%
Percent of Construction Projects Completed on Budget (Within +/- 10% of the Awarded Amount)	83.69%	81.27%	83.33%
Percent of Construction Projects Completed on Time (Within + / - 10% of the Contract Time)	63.40%	63.04%	65.07%

Construction Contract Administration	FY16	FY17	FY18
Number of Projects with ROW/Utility Delay Over 30 Days	ROW only - 11; Utility only - 45; Both - 15	replaced with the below indicator	N/A
Number of Projects with ROW/Utility Delay Based On the Ready To Let Definition (Part of the ready to let definition requires that the right of way and utilities should be cleared within 90 days of the letting date. If they are not, then the project is not eligible to let unless the district submits a Management Plan (MP) indicating how the right of way or utility could be completed without interfering with the construction of the project.)		ROW only - 9 (4 req. MP); Utility only - 98 (21 req. MP); Both - 25 (10 req. MP)	ROW only - 10 (9 req. MP); Utility only - 97 (34 req. MP); Both - 10 (0 req. MP)
Average Number of Bidders Per Small, Medium and Large Projects (Small - below \$15M; Medium - in between; Large - \$50M and above) ¹	Small - 4.49; Medium - 4.83; Large - 5.64	Small - 5.22; Medium - 5.56; Large - 6.39	Small - 5.42; Medium - 5.95; Large - 6.12
Total Number of TxDOT-Employed Inspectors on Active Construction Projects	N/A	N/A	1,023
Total Number of Outsourced Inspectors on Active Construction Projects	N/A	N/A	487

Consultant Services

The Professional Engineering Procurement Services (PEPS) Division awarded 304 contracts for a grand total of \$1,555,219,923 in four procurement waves over state Fiscal Year 2018. The total expenditures for consultant services were \$853,755,729.06 for Fiscal Year 2018. TxDOT outsourced 83.45% of all Professional and Other Consultant Design Services programs in Fiscal Year 2018. TxDOT outsourced 57.72% of all Construction-related

¹ This report reflects a change in the criteria for small, medium, and large projects. These results (for all three years) represent the project sizes as reported to the Texas Transportation Commission.

Services programs in Fiscal Year 2018. These totals are inclusive of all pre-engineering and construction engineering activities for the department.

Consultant Services	FY16	FY17	FY18
% of Design Program Outsourced	79.74%	79.16%	83.45%
Percentage of Construction Management Program Outsourced	49.31%	61.00%	57.72%

Design

Design	FY16	FY17	FY18
Percent of Change Orders Resulting in Increased Cost Due to Design Errors	N/A	N/A	25.73%

Emergency Relief

Emergency Relief	FY16	FY17	FY18
Projects Eligible for ER Funding	52	12	360
Federal Funds Obligated for ER Projects	\$20.4M	\$820,857	\$79.1M
Federal Funds Reimbursed on ER Projects	\$0	\$0	\$0
Percent of ER Projects Closed-out	N/A	N/A	0%

Right-of-Way

Right-of-Way Program	4/16 - 11/16	FY17	FY18
Number of Projects with Conditional ROW Certifications	93 out of 470 (20%)	134 out of 767 (17%)	117 out of 837 (13.98%)

Railroad Highway

Railroad Highway	FY16	FY17	FY18
Number of Projects with Railroad Agreement Not Executed, Work During Construction Certificates	N/A	8 out of 189 (4%)	10 out of 160 (6.25%)

Finance Program

Finance Program	FY16	FY17	FY18
Percentage of Inactive Projects Based on Dollar Amount	Q1 - 1.45% Q2 - 0.90% Q3 - 3.95% Q4 - 1.30%	Q1 - 1.9% Q2 - 1.8% Q3 - 1.4% Q4 - 1.9%	Q1 - 1.37% Q2 - 1.71% Q3 - 1.86% Q4 - 2.34%
Number of Inactive Projects for the Local Program	Q1 - 168 Q2 - 117 Q3 - 171 Q4 - 92	Q1 - 43 Q2 - 48 Q3 - 65 Q4 - 65	Q1 - 30 Q2 - 27 Q3 - 42 Q4 - 51
Number of Inactive Projects	Q1 - 333 Q2 - 285 Q3 - 312 Q4 - 268	Q1 - 208 Q2 - 231 Q3 - 222 Q4 - 307	Q1 - 307 Q2 - 304 Q3 - 401 Q4 - 449
Average Number of Days Between Project Final Acceptance By State DOT and Project Close Out In FMIS	180 calendar days	180 calendar days	180 calendar days
Number of Request To Extend Performance End Dates	N/A	N/A	1

Pavement Program

TxDOT uses the measures described above to determine the condition of their pavements. These data are used to determine three measures of pavement conditions:

- Distress Score.
- Ride Score.
- Condition Score.

The Distress Score represents the surface condition of the pavement in terms of type and extent of the different types of distress. The score ranges from 1 to 100 with 100 representing a pavement without distress.

A Ride Score is determined from data collected by Inertial Profilers, which converts a pavement profile (roughness/smoothness) to an IRI. The IRI is converted to a Ride Score based on the Serviceability Index developed at the American Association of State Highway and Transportation Officials (AASHTO) Road Test.

The Condition Score is a combination of the Distress Score and Ride Score and represents the overall condition of the pavement. Condition Scores range from 1 to 100 with 100 being the best condition. TxDOT reports the condition of its pavements on an annual basis using these scores.

The following table provides a conversion from the Distress Score, Ride Score, and Condition Score to a “Descriptive Term” used by TxDOT to communicate the condition of pavements from a surface distress standpoint.

Distress, Ride, and Condition Score by TxDOT Descriptive Class

Descriptive Class	Distress Score	Ride Score	Condition Score
Very Good	90–100	4.0–5.0	90–100
Good	80–89	3.0–3.9	70–89
Fair	70–79	2.0–2.9	50–69
Poor	60–69	1.0–1.9	35–49
Very Poor	1–59	0.1–0.9	1–34

For FHWA performance reporting, NHS Interstate System (on-system) pavements are evaluated based on ride quality and pavement surface distress. The following table shows federal criteria for pavements designated as being in good, fair, or poor condition. A pavement section (0.1-mile in length) is classified as “good” condition if all of the metrics shown in the table below are good. The rating of a section will be “poor” if two or more metrics are evaluated as poor. All other pavement sections are given a “fair” evaluation.

NHS non-IH (both on-system and off-system) use ride quality only for evaluation. The criteria for ride quality are the same for NHS IH and non-IH.

NHS Interstate System (on-system) pavements are evaluated based on ride quality and pavement surface distress. The table below shows criteria for pavements designated as being in good, fair, or poor condition. A pavement section (0.1-mile in length) is classified as “good” condition if all of the metrics shown in the table below are good. The rating of a section will be “poor” if two or more metrics are evaluated as poor. All other pavement sections are given a “fair” evaluation.

NHS non-IH (both on-system and off-system) use ride quality only for evaluation. The criteria for ride quality are the same for NHS IH and non-IH.

Federal Requirements for Pavement Condition Thresholds

Metric		Condition Threshold		
		Good	Fair	Poor
IRI (inches/Mile) (all pavement types)		<95	95-170	>170
Cracking (%)	ACP	<5	5-20	>20
	JCP	<5	5-15	>15
	CRCP	<5	5-10	>10
Rutting (inches) (ACP)		<0.20	0.20-0.40	>0.40
Faulting (inches) (JCP)		<0.05	0.05-0.15	>0.15

Pavement Program	FY16	FY17	FY18
Percentage of Pavements on the Interstate System in Good Condition (IRI < 95)	71%	71%	77%
Percentage of Pavements on the Interstate System in Poor Condition	2%	1.61%	1.05%
Percentage of Pavements on the NHS (Excluding the Interstate System) in Good Condition; and Percentage of Pavements on the NHS (Excluding the Interstate System) in Poor Condition	85.14% / 5.75%	84.04% / 5.60%	86.07% / 4.85%

Safety Program

Safety Program	CY15	CY16	CY17
Number of Fatalities (5-year average)	3,392	3,543	3,609
Number of Serious Injuries (5-year average)	16,387	16,952	17,235
Fatality Rate (per HMVMT)(5-year average)	1.4	1.42	1.4
Serious Injury Rate (per HMVMT)(5-year average)	6.77	6.81	6.68
Total Number of Crashes	520,974	552,632	538,751
Percent of Crash Reports Filed Electronically	83.69%	88.70%	91.84%
Number of Percent Run Off Road Fatal Crashes	36.36%	35.47%	36.76%

Safety Program	CY15	CY16	CY17
Percent Intersection Fatal Crashes	23.23%	21.87%	20.65%
Percent Pedestrian Fatal Crashes (5-year average)	14%	17%	17%
Number of Bicycle Fatal Crashes (5-year average)	2%	2%	2%
Number of Work Zone Fatal Crashes (5-year average)	4%	4%	4%
Number of Rail-Highway Grade Crossing Fatal Crashes	0.51%	0.50%	0.50%
Number of Fatal Wrong-Way Crashes on Freeways	1.69%	1.56%	1.37%

Traffic Operations

Traffic Operations	CY15	CY16	CY17
Percent of the Person-Miles Traveled on the Interstate That Are Reliable			PMF
Percent of Person-Miles Traveled on the Non-Interstate NHS That Are Reliable			PMF

Utility

Utility	FY16	FY17	FY18
Number of TxDOT-led Buy America Review on Utility Projects	N/A	N/A	168

Freight

Freight	FY16	FY17	FY18
Truck Travel Time Reliability (TTTR) Index	N/A	N/A	PMF