RECORD OF DECISION

State Highway 45 Southwest
From Loop 1 to Farm-to-Market Road 1626
Travis and Hays Counties, Texas

CSJs: 1200-06-004 & 1200-07-001

TEXAS DEPARTMENT OF TRANSPORTATION

March 2015

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1.0 BACKGROUND

This Record of Decision (ROD) sets forth the basis for choosing the Selected Alternative for the State Highway 45 Southwest (SH 45SW) project in Travis and Hays counties, Texas. As described in the January 2015 Final Environmental Impact Statement (FEIS), SH 45SW is a proposed new four-lane, limited access tolled facility that will be approximately four miles long and will provide connectivity between Farm-to-Market Road (FM) 1626 and Loop 1 (MoPac).

The FEIS discusses the purpose and need (**Chapter 1.0**), the development and evaluation of alternatives (**Chapter 2.0**), the affected environment and environmental consequences (**Chapter 3.0**), the indirect and cumulative impacts (**Chapter 4.0**), identification of the preferred alternative (**Chapter 5.0**), mitigation and permitting (**Chapter 6.0**), and comments and coordination (**Chapter 7.0**).

The environmental review and documentation was developed in accordance with the Texas Administrative Code (TAC) Title 43, Part 1, Chapter 2. This project is being developed, and will be constructed, without Federal-aid funding.

1.1 LEAD AND PARTICIPATING AGENCIES

The Lead Agencies on the project are the Texas Department of Transportation (TxDOT) and the Central Texas Regional Mobility Authority (CTRMA). Participating agencies include: Barton Springs/Edwards Aquifer Conservation District, Capital Metropolitan Transit Authority, City of Austin, Hays County, Texas Historical Commission, Texas Parks and Wildlife Department, Tonkawa Tribe of Oklahoma, Travis County, and the U.S. Fish and Wildlife Service.

1.2 PROJECT HISTORY

A roadway corridor in this area has been under discussion since the early 1980s. In 1990, an EIS was approved for a project connecting IH 35 on the east to US 290 on the west that included the limits of SH 45SW as described in this ROD. The purchase of right-of-way for the project began in the late 1990s but the project was never constructed. In May, 2010 the Capital Area Metropolitan Planning Organization (CAMPO) approved the 2035 long range transportation plan for the area that included SH 45SW as a four-lane tolled parkway/freeway from MoPac to FM 1626. Planning and development for the SH 45SW EIS began in mid-2013.

1.3 PUBLIC AND STAKEHOLDER INVOLVEMENT

The SH 45SW Notice of Intent (NOI) to prepare an EIS appeared in the *Texas Register* on July 19, 2013. Agency scoping meetings were held on July 31, 2013 and December 10, 2013. Public open houses were held on October 8, 2013 and December 10, 2013. More than 60 additional

stakeholder meetings were held with different local neighborhood and community groups, organizations, major employers, chambers of commerce, interested citizens, and others throughout the project development process. See **Table 7.2-1** of the FEIS. An Environmental Listening Workshop was held on November 14, 2013 to gather information and identify any environmental issues or concerns from the community relating to the project. A project website was set up at **www.SH45SW.com**, and electronic newsletters and informational flyers were sent via email to 1,021 persons. A Twitter account was also established and used to tweet 21 messages on topics announcing the project, promoting the website, and informing the public about opportunities to learn more about and comment on the proposed project.

The Draft Environmental Impact Statement (DEIS) was approved on June 19, 2014, and its Notice of Availability (NOA) was published in the *Texas Register* on June 27, 2014. The DEIS was then made available at designated locations for public inspection for 30 days before the date of the public hearing and 15 days following the hearing (August 13, 2014) for a 45-day review and circulation period. A public hearing was held on July 29, 2014 to provide the opportunity for the public to comment on the DEIS. The public hearing was held at Bowie High School located at 4103 Slaughter Lane, Austin, Texas, which is in the immediate project area. TxDOT mailed out more than 21,000 postcards to give notice of the meeting to individuals and business in northern Hays and southern Travis counties, in addition to sending emails to elected officials and publishing notices in several newspapers. See **Section 7.5** of the FEIS. The comment period ended August 13, 2014.

In developing the FEIS and identifying the Preferred Alternative, full consideration was given to public and agency comments on the DEIS, all alternatives considered and the respective consequences, and issues related to the proposed action. Many comments centered on concerns about water quality (both during construction and operation of the roadway), and concerns were raised about the scope and completeness of the DEIS. As a result, design changes were made, including: realignment of the roadway to avoid and minimize impacts to sensitive karst features in the right-of-way; reconfiguration of the MoPac-SH 45SW interchange to improve safety, and addition of a new location for connection with the proposed Violet Crown Trail (as was coordinated with the City of Austin and the Hill Country Conservancy). The Selected Alternative is described in Section 2 of this ROD. Additionally, technical reports were made available to the public as they were completed on several subjects, including karst features (e.g. Flint Ridge Cave), karst invertebrates, soils, the Golden-cheeked Warbler, and *Eurycea* Salamanders. The FEIS was signed January 20, 2015. A NOA was published in the *Texas Register* on January 23, 2015 and the FEIS was made available for public review on the same date.

2.0 DECISION

TxDOT chooses the New Tollway on Existing State-Owned Right-Of-Way alternative (the Preferred Alternative described in **Chapter 5.0** of the FEIS) as the Selected Alternative for the SH 45SW project. This approval constitutes TxDOT's acceptance of the Selected Alternative and completes the environmental review process for the project.

2.1 DETERMINING THE SELECTED ALTERNATIVE

The Selected Alternative best serves the identified purpose and need of the project stated in **Sections 1.3** and **1.4** of the FEIS by improving system connectivity and local mobility, and by providing an alternative route to congested local roadways. The Selected Alternative is reasonable because in addition to meeting the project purpose and need, it does not displace residences or businesses, nor does it directly affect water quality protection lands (WQPLs), which are conservation lands protected for water quality purposes. Moreover, the Selected Alternative will be a toll road as described in the CAMPO *2035 Regional Transportation Plan* (RTP) (2010). See **Sections 2.3** and **2.4** of the FEIS. The Selected Alternative incorporates measures that substantially mitigate any adverse effects on the natural or human environment. See discussion in Section 3.0 of this ROD.

2.1.1 LOCATION OF SELECTED ALTERNATIVE

The Selected Alternative runs southeast from the intersection of MoPac and existing SH 45 to FM 1626 approximately one mile south of Brodie Lane. The Selected Alternative will include bridges over Bliss Spillar Road; Bear Creek; Danz Creek and the Danz Creek Split. The Selected Alternative will also connect to existing SH 45 west of MoPac; MoPac; Bliss Spillar Road; and FM 1626. The Selected Alternative meets the requirements of independent utility and logical termini in that upon completion it meets the stated project purpose without relying on the development of other projects. Furthermore, even though the project is part of an interrelated transportation network, the Selected Alternative individually addresses the transportation need described in **Section 1.4** in the FEIS.

2.1.2 DESCRIPTION OF SELECTED ALTERNATIVE

The Selected Alternative will be a four-lane, divided toll road approximately four miles long with 12-foot-wide lanes within a right-of-way that varies from 300 to 600 feet. From MoPac to Bear Creek, the roadway will have 10-foot-wide outside shoulders and nine-foot-wide inside shoulders. From Bear Creek to FM 1626, the roadway will have 10-foot-wide outside shoulders and four-foot-wide inside shoulders. All lanes will be tolled. Ramps tie into the project at either end and access is provided at Bliss Spillar Road.

As currently shown in the preliminary design plans, the Selected Alternative will include 15 water quality ponds to manage drainage, contain spills and treat roadway runoff (note: this information has been updated since the FEIS). Several water quality ponds are already located at various locations within the right-of-way. These include six existing hazardous materials traps and vertical sand filters at the existing MoPac and SH 45 facilities (one of which does not drain the project area). These would remain in place.

Sidewalks will not be provided along the access-controlled facility; however, a 10-foot-wide shared use path will parallel the roadway, primarily on the south side of SH 45SW. The shared use path will be on each side of SH 45SW south of Bliss Spillar Road. A shared use path bridge will be constructed over Bear Creek. A pedestrian underpass will be constructed north of Bear Creek to accommodate the proposed Violet Crown Trail.

The project will be constructed on approximately 312 acres of right-of-way. Approximately 161 acres of the 312 acres of right-of-way will be impacted by construction. Construction is expected to begin late 2015 or early 2016. The estimated construction cost is $76 million (note: this information has been updated since the FEIS).

2.1.3 ENVIRONMENTAL EFFECTS

Land Use

Land use in the project area should remain largely unchanged, as the Selected Alternative will be located within existing right-of-way. See **Section 3.1** of the FEIS. There is no conversion of land from non-transportation use to transportation use as a result of the construction of the Selected Alternative, and no acquisition of right-of-way is necessary. No acquisition of City of Austin water quality protection lands is required. Access to the roadway will be limited and should reduce the likelihood of development of adjacent lands. Secondary impacts to land use are expected to be minimal given the limited access from adjacent land to the project and the existence of WQPLs along most of the route. See Section 3.0 of this ROD for mitigation of impacts related to land use.

Socioeconomic Resources

As described in **Section 3.2** of the FEIS, no new right-of-way is necessary so there are no commercial or residential displacements as a result of the Selected Alternative. The Selected Alternative will not have an adverse effect on minority and low-income populations in the project area. The Selected Alternative is not anticipated to directly impact community cohesion, as it does not bisect any existing neighborhoods or displace public facilities or resources. Due to the few access points, impacts to travel patterns and access would be

focused at the three points of access to the proposed roadway (the termini at MoPac and FM 1626 and an interchange at Bliss Spillar Road). At these points, access to the area transportation network would improve as the proposed roadway is expected to improve connectivity, mobility, travel times, and provide an alternative route to congested local roadways.

As discussed in **Section 3.2** of the FEIS, calculations of travel time differences indicate that drivers who utilize the proposed roadway instead of existing local roadways would save approximately 146 hours of travel time per year based on the design year (2035) traffic. Using an estimated monetary value for personal travel to be $12/hour, a driver using the proposed roadway instead of existing roadways could save time valued at up to $1,752 annually.

The Selected Alternative is being developed as a toll road. Using estimated toll rates ranging from $0.20 to $0.30 per mile, various scenarios of the effects of tolling are presented in **Section 3.2** of the FEIS.

No significant effects to socioeconomic resources are expected from the construction and operation of the Selected Alternative. See **Section 3.2** of the FEIS for further analysis of this issue.

Geology

The geologic setting contributes to two subjects that have received substantial attention in the environmental analysis of the SH 45SW project – karst features and groundwater. Karst features and groundwater are discussed in the FEIS in **Sections 3.3** and **3.6**, respectively. The sensitive karst features in the right-of-way of the Selected Alternative include five caves, four sinkholes, and eight solution cavities. The alignment of the Selected Alternative was adjusted to avoid permanent filling or other direct impacts to the openings or surface expressions of the sensitive karst features. The surface drainage of one of the sinkholes and one of the solution cavities would be affected by the footprint of the project but no adverse effect to the features or the surface water flowing into them are expected. See Section 3.0 of this ROD for mitigation of impacts related to geology and karst features.

Flint Ridge Cave is a karst feature of exceptional concern. Flint Ridge Cave is located outside the right-of-way on City of Austin preserve land approximately 150 feet east of the SH 45SW right-of-way, or approximately 350 feet from the SH 45SW travel lanes. Flint Ridge Cave is one of 62 caves identified for protection in the Balcones Canyonlands Conservation Plan (BCCP). The BCCP is a regional habitat conservation plan approved by the U.S. Fish and Wildlife Service and managed by the City of Austin and Travis County. Flint Ridge Cave is not known to contain any federally listed threatened or endangered karst-dwelling invertebrates, but is reported to contain a spider (*Cicurina bandida*) and a beetle (*Rhadine austinica*) included in the BCCP as species of concern. The BCCP is a voluntary program and TxDOT is not currently participating in

the BCCP for the SH 45SW project. However, TxDOT performed an analysis of Flint Ridge Cave for the purpose of documenting the potential of the SH 45SW project to affect the environmental integrity of the cave (note: the term "environmental integrity" is used in the BCCP permit to describe the level of protection at which the 62 caves in the permit are to be maintained). The analysis looked at eight contributing habitat components of karst habitat developed by the U.S. Fish and Wildlife Service and found that none of the eight would be adversely affected by the construction and operation of the Selected Alternative. This report was provided to Travis County and the City of Austin to address concerns related to both Flint Ridge Cave and the BCCP.

With the avoidance and minimization measures incorporated into the project design and additional measures to be used in construction and operation of the Selected Alternative, no significant effects to geologic resources, including sensitive karst features, are expected from the construction and operation of the Selected Alternative.

Air Quality

No significant air quality impacts are expected from the construction and operation of the Selected Alternative. See **Section 3.4** of the FEIS. For a discussion of mitigation measures to be applied to minimize temporary construction-related emissions, see Section 3.0 of this ROD.

Noise

A noise analysis was completed for the project and is included in the FEIS in **Section 3.5**. Noise abatement measures were considered for six residences that will receive increased noise levels due to implementation of the Selected Alternative. However, after applying the reasonable and feasible analysis according to TxDOT policy, abatement measures were determined not feasible.

Water Quality / Edwards Aquifer

Approximately 3.4 miles of the Selected Alternative occur on the recharge zone of the Barton Springs segment of the Edwards Aquifer. As discussed in the FEIS, the aquifer is of exceptional importance because of its susceptibility to surface conditions, its use as a drinking water source, and its contribution to Barton Springs. The Texas Commission on Environmental Quality (TCEQ) regulates development that might affect the Edwards Aquifer. The intent of the TCEQ's Edwards Aquifer rules is that the existing quality of groundwater not be degraded and that public health, aquatic life and the environment are protected. The Selected Alternative is being designed to exceed the minimum standard of the Edwards Aquifer Rules of removing at least 80 percent of the incremental increase in total suspended solids (TSS). The permanent stormwater control measures incorporated into the Selected Alternative are being designed to remove at least 90% of the incremental increase in TSS. In recognizing that TSS serves as a

good indicator of other pollutants of concern, such as oil and grease and water quality in general, it is expected that these stormwater control measures would reduce other potential pollutants as well. Approval by the TCEQ of the Water Pollution Abatement Plan for the Selected Alternative is required before construction of the project can begin.

Other water quality and quantity issues considered in the choice of the Selected Alternative are the potential effects to surface water resources (e.g., Bear Creek) and flow into karst features possibly affecting karst habitat. The effort to avoid these types of impacts through location and design of the Selected Alternative as well as the effort to minimize the impact through the implementation of the project Water Pollution Abatement Plan when effects are not avoidable provide reasonable assurance that effects to these resources will be inconsequential or minimal.

As a result of incorporating water quality protection measures into the design, construction and operation of the Selected Alternative, no significant impacts are anticipated to water resources, including the Edwards Aquifer. See **Section 3.3** of the FEIS. Section 3.0 of this ROD addresses mitigation related to water quality.

Threatened and Endangered Species

The FEIS included a thorough examination of effect of the Selected Alternative on four federally listed species - the Austin blind salamander, Barton Springs salamander, black-capped vireo and golden-cheeked warbler. Golden-cheeked warbler and black-capped vireo habitat assessments and presence/absence surveys were conducted within the state-owned right-of-way in the spring of 2014. Survey results for suitable habitat and the presence of the two species within the state-owned right-of-way were negative. Further, there have been no sightings of golden-cheeked warblers or black-capped vireos within the state-owned right-of-way. No impacts to these species are anticipated as a result of the construction and operation of the Selected Alternative.

Direct, physical harm to Austin blind and Barton Springs salamanders is not expected due to the distance between known locations of these salamanders at Barton Springs and the location of the Selected Alternative. In addressing these species in the FEIS, the most attention was given to the potential of indirect effects of stormwater runoff from the project area entering the Edwards Aquifer via recharge points, flowing through the aquifer, and discharging at Barton Springs and consequently affecting the habitat of the two species. Measures to minimize harm to these salamander species correspond to the water quality protection measures associated with the Selected Alternative. As a result of incorporating water quality protection measures into the design, construction and operation of the Selected Alternative, no measureable effects

to the Austin blind salamander or the Barton Springs salamander are anticipated. See **Section 3.8** of the FEIS. Section 3.0 of this ROD addresses mitigation related to water quality.

Archeological Resources

Archeological resources were evaluated to assess the potential for the project to affect archeological historic properties or State Antiquities Landmarks in the Area of Potential Effect. See **Section 3.9** of the FEIS. No archeological resources that could provide new or important data concerning prehistory or history are expected to be impacted by the Selected Alternative. See Section 3.0 of this ROD for mitigation related to archeological resources.

Historic Resources

Project architectural historians studied the project area, consulted the Texas Historic Sites Atlas Online, and reviewed contextual background reports for the area and determined that there are no historic resources or properties in the project's area of potential effects.

Hazardous Materials

Federal, State, and Tribal databases were reviewed in general accordance with the recommended search distances and criteria to determine the presence of hazardous material in the project area. See **Section 3.11** of the FEIS. No federally listed facilities are located within the database search area, but there are nine state-listed facilities. Three more sites were collected but no evidence of those sites was found as of the date of the FEIS (January 2015). The facilities' locations and statuses are summarized in **Table 3.11-1** of the FEIS. As discussed in the FEIS, operation of the Selected Alternative has a risk of hazardous material being spilled in the event of an accident. The analysis indicates an extremely small risk of this occurrence but in the event that it should happen and the material were to leave the roadway, the spilled material would likely be captured in one of the water quality detention ponds. See Section 3.0 of this ROD for mitigation information related to hazardous material.

Visual and Aesthetic Resources

The visual and aesthetic effect of the Selected Alternative was assessed as low to moderate using a qualitative analysis method. A description of the existing visual environment is provided in **Section 3.12** of the FEIS. Constructing the roadway as a parkway, maintaining existing vegetation in the right-of-way to the extent practical during construction and having a portion of adjacent lands in conservation will contribute to a pastoral visual effect to the roadway user. See Section 3.0 of this for mitigation information related to visual and aesthetic resources.

3.0 MITIGATION AND COMMITMENTS

TxDOT has committed to several mitigation measures both during and after completion of construction in the following areas:

Land Use

Temporary short-term insignificant impacts adjacent to the roadway may occur during construction, and the contractor will obtain proper permits and approvals for any temporary work done outside the right-of-way. After completion of construction, lands affected during construction will be restored to pre-construction conditions where practicable.

Geology and Soils

Design features to minimize impacts include:

- Constructing approximately 90 percent of the roadway between FM 1626 and MoPac on fill material to minimize subsurface disturbance and facilitate directional flow of surface water runoff;
- Raising and separating with retaining walls fill areas located near the sensitive karst features;
- Narrowing the total roadway width north of Bear Creek, and constructing that part of the roadway without a median and with the travel lanes separated by a concrete barrier; and
- Placing drainage mechanisms along the median barrier and at the edge of the roadway barrier to capture roadway runoff and conveying it to a water quality treatment pond.

Three sensitive karst features' surface drainage basins will be impacted by the project, but TxDOT is minimizing impacts to those features:

- Feature F-55 (in right-of-way): a bottomless culvert will span F-55 and vegetated diversion dikes will divert water toward F-55 to maintain recharge potential;
- Feature F-23 (Hat Sink; in right-of-way): a culvert will allow water to flow from the natural drainage basin into Hat Sink and water off-site will be re-routed by a vegetated diversion dike and then to Hat Sink to maintain recharge potential; and
- Flint Ridge Cave (opening is outside right-of-way): a water quality pond outside the Flint Ridge Cave catchment basin will capture roadway runoff for treatment, and then ultimately discharge to Bear Creek and water off-site will be re-routed to Flint Ridge Cave's surface drainage area, thus maintaining the size of Flint Ridge Cave's watershed.

In each of the above recharge maintenance activities, no commingling of natural runoff and roadway runoff can occur. This is because roadway runoff is being captured and channelized via a concrete traffic barrier with inlets along the bottom, entering the water quality treatment system, and being released only after treatment is complete. In addition to these design features, erosion control techniques (such as erosion control blankets) will be used as needed to protect any geologic units that may be exposed during construction. Soil erosion and sediment control measures will be employed to minimize soil loss during project construction.

Air Quality

During the construction phase of this project, temporary increases in air pollutant emissions may occur from construction activities. The potential impacts of particulate matter emissions will be minimized by using fugitive dust control measures such as covering or treating disturbed areas with dust suppression techniques, sprinkling, covering loaded trucks, and other dust abatement controls, as appropriate.

Edwards Aquifer

Portions of the project will be located in the Edwards Aquifer Recharge Zone, so all applicable rules and requirements related to the TCEQ's Edwards Aquifer rules, including the development of a Water Pollution Abatement Plan, will be followed.

The roadway alignment and profile have been designed to avoid permanent filling or other direct impacts to the openings or surface expressions of the 17 sensitive karst features located in the right-of-way to the extent practical. Specific design elements employed to avoid or minimize impacts to these features are discussed in detail in **Section 3.6** of the FEIS. These elements include constructing two segments of the roadway totaling approximately 4,500 feet in length on fill to control direction of surface water runoff (separated from grade level by retaining walls), minimizing total roadway width north of Bear Creek, installing culverts to allow for drainage across the roadway to continue to karst features, limiting the area of disturbance, utilizing diversion dikes to compensate for reduction in sensitive features' drainage areas, and preventing natural runoff from comingling with roadway runoff before treatment.

Surface Water Resources

The project will incorporate several structural and non-structural water quality protection measures and adhere to permitting requirements to protect water quality. These requirements and measures are discussed in **Section 3.7** of the FEIS.

TxDOT will require the contractor to prepare an Environmental Compliance Management Plan (ECMP), administered by an on-site, independent compliance manager, to ensure compliance with all environmental laws and commitments. ECMP practices will include project inspection

for permit compliance, geologic inspection of trenching activities, surface water quality monitoring, and hazardous materials handling protocols. Void discovery protocols will also be established in the ECMP. If a void is discovered, assessment of the void will be conducted by a qualified geologist and coordination will be completed with TCEQ per the karst discovery protocol.

During operation and maintenance of the SH 45SW facility, water quality protection measures will be used in a series, with each in the series removing additional total suspended solids (TSS) and other pollutants. These measures will remove at least 90 percent of the TSS generated by the increase in impervious cover over the Edwards Aquifer Recharge Zone caused by the project.

A Texas Pollutant Discharge Elimination System Permit will be obtained. Temporary erosion controls will be developed and implemented in accordance to TxDOT Standard Specifications and will be in place, according to the construction plans, prior to commencement of construction, and will be inspected as required.

As mentioned above, portions of the project will be located in the Edwards Aquifer Recharge Zone so all applicable rules and requirements related to the TCEQ's Edwards Aquifer rules, including the development of a Water Pollution Abatement Plan, will apply.

The project will meet minimum control measures set by the TCEQ for its drainage system that will discharge to Municipal Separate Storm and Sewer Systems.

It is anticipated that SH 45SW will span four Section 404 (Clean Water Act) jurisdictional features within the right-of-way, and the appropriate steps will be taken to protect water quality in these areas.

Vegetation

Upon completion of construction activities associated with the project, disturbed areas will be restored and seeded according to TxDOT's Vegetation Management Guidelines. TxDOT will re-vegetate disturbed areas using a native seed mix.

Migratory Bird Treaty Act

Construction staging will be scheduled to avoid impacts to active nests of migratory birds or migratory bird breeding seasons to the maximum extent practicable, and to avoid the potential to disturb any breeding cave myotis bats.

Prior to any construction activities, particular attention will be paid to the potential for birds and bats that may be roosting in culverts and under bridges.

Between October 1 and February 15, the contractor will remove all inactive migratory bird nests from any structures that will be affected by the project, and complete any necessary vegetation clearing. In addition, the contractor will be prepared to prevent migratory birds from building nests between February 15 and October 1, per the plan sheets. In the event that migratory birds are encountered on-site during project construction, adverse impacts to protected birds, active nests, eggs, and/or young will be avoided.

Threatened and Endangered Species

Surveys will be conducted for the presence of red imported fire ants and tawny crazy ants in sites proposed to be used as sources for roadway fill material. Survey results and selection of fill sites would be approved by the TxDOT Austin District Biologist prior to material extraction.

Drill shafts will be excavated up to a depth of 25 to 35 feet. Measures to avoid impacts to groundwater quality and aquatic salamander habitat during drilling will include: 1) all equipment refueling and overnight storage will take place outside the 100-year floodplain; 2) drill shaft tailings will be removed daily to avoid backfilling the shaft; and 3) any voids encountered will be evaluated based on established criteria outlined in the FEIS.

In the event that significant subsurface voids are encountered during the construction phase, work at that location will be halted immediately and the feature will be inspected promptly by a qualified karst biologist to determine the potential of that feature to provide habitat for endangered karst invertebrates. Work at that location will not resume until the feature is verified to not provide suitable habitat for endangered karst invertebrates or until authorization to disturb the feature has been obtained.

Floodplains

The placement of bridge support structures in the floodplain would not be expected to raise flood elevations; however, the placement of new structures would require coordination with the Travis County and Hays County floodplain administrators.

Archeological Resources

In the event that unanticipated archeological deposits are encountered during construction, work in the immediate area will cease and TxDOT archeological staff will be contacted to initiate post-review discovery procedures under the provisions of the First Amended Programmatic Agreement among FHWA, TxDOT, the Texas SHPO, and the Advisory Council on Historic Preservation Regarding the Implementation of Transportation Undertakings (PA-TU), as well as the MOU (43 TAC 2.24) between the THC and TxDOT.

Hazardous Materials

Storage areas for oil and fuel used for construction equipment as well as refueling areas will be identified in the ECMP and approved prior to use of the area. CTRMA will prohibit permitted load hazardous material vehicles from driving on SH 45SW. Potential hazardous material spills will be addressed through the use of water quality ponds designed and placed to serve as hazardous materials traps.

Visual and Aesthetic Qualities

Illumination of SH 45SW will be limited to safety lighting at intersections and underpasses. This includes locations of roadway intersections, including SH 45SW and FM 1626, Bliss Spillar and the SH 45SW ramps, the Bliss Spillar ramp gores connecting to SH 45SW, and SH 45SW at MoPac. Due to the rural setting of the project, illumination will not utilize high mast lighting, but conventional height illumination standards, approximately 40 feet in height, with flat cutoff lenses, or LED fixtures, to minimize the glare emitted by the fixture. It is anticipated that underpass lighting will be required for the SH 45SW bridges over Bliss Spillar and MoPac. Light reflected from the pavement will be minimized since an asphaltic pavement surface will be used instead of concrete. Lighting along the shared use path may be installed in certain locations.

Consent Decree

SH 45SW has been planned, and will be designed, constructed and operated to be more protective of water quality than what is required under the 1990 Consent Decree between TxDOT and the Barton Springs Edwards Aquifer Conservation District (BSEACD). The Consent Decree is an agreement that includes measures that the BSEACD and TxDOT agree would result in the project being constructed in an environmentally sensitive fashion. For example, SH 45SW will incorporate modern best management practices, such as permeable friction course pavement and vegetated filter strips, to remove total suspended solids in stormwater runoff at a target rate of 90 percent removal. TxDOT has coordinated with the BSEACD at various stages of development of the EIS, and the BSEACD participated in the SH 45SW technical workgroup. TxDOT will continue to work with the BSEACD during the design of the Selected Alternative to ensure that the project is protective of water quality in the Edwards Aquifer.

4.0 MONITORING AND ENFORCEMENT

TxDOT will implement and monitor mitigation measures to reduce or eliminate adverse environmental impacts associated with the SH 45SW project. From an oversight perspective, TxDOT and CTRMA roles will include:

- TxDOT will monitor for compliance on all commitments and conditions of approval stated in the FEIS.
- TxDOT will generally oversee activities associated with this project. CTRMA will oversee the design and construction activities associated with the project through its contractors.
- CTRMA will track project commitments from inception through design, construction, and completion.

Because this project will be executed within and in the vicinity of the Edwards Aquifer Recharge zone, TxDOT is taking the additional steps of creating an environmental compliance management plan, and implementing a full complement of best management practices, as described in **Section 4.7** of the FEIS. The independent environmental compliance manager will ensure compliance with the ECMP and the incorporation of best management practices into the project as applicable.

5.0 SUMMARY OF RESPONSE TO COMMENTS

Comments received since the FEIS was made available include one agency re-submitting comments it made on the Draft EIS, several emails requesting withdrawal of the Draft EIS and one email supporting construction of SH 45SW. Responses to comments on the Draft EIS were included in the FEIS. The comment in support of the project has been noted.

6.0 CONCLUSION

Based on the analysis and evaluation contained in the SH 45SW FEIS and after careful consideration of the project purpose and the social, economic, and environmental factors and input from the public involvement process, the Selected Alternative has been approved for this project. This approval serves as TxDOT's decision that the Selected Alternative has met the environmental review requirements of 43 TAC Chapter 2 and is approved for further development and construction.

3/4/15
Date

Director, Environmental Affairs Division
Texas Department of Transportation