Flood Risk Management
- 277,000 cfs levee raise with AT&SF Bridge Modifications
- Emergency Action Plan improvements
- Levee side slope flattening to 4H:1V (Betterment @ 100% local cost)

Interior Drainage Plan
Phase I - Baker and Hampton Pump Stations; Nobles Branch Sump Improvements
Phase II - Charlie, Delta, New Trinity Portland Pump Stations

Ecosystem Restoration
- River Relocation (add meanders to approx. 8 miles of the Trinity River in the Floodway)
- Approx. 80 acre wetland in Floodway
With its 2,300 acres, the Trinity Lakes area of the Balanced Vision Plan will augment, by more than 10 percent, the city's overall green space assets, more than doubling the miles of trails and outdoor venues. No other city green space will match the variety of activities or the richness in landscape—both urban and natural—of the Trinity Lakes area.

Although the existing Trinity River floodplain is already an altered landscape and will be further altered through the construction of the project, the design intent is to create or re-create, self-sustaining, viable and high ecologically functioning landscapes that reflect the native landscapes of the region.
Dallas Floodway Project

Milestone: April 21, 2015

Jo-Ellen Darcy, Assistant Secretary of the Army (Civil Works), signs the Record of Decision

Two documents approved
- Final Environmental Impact Statement
- Final Feasibility Report

Conclusion
Dallas Floodway Project could proceed
Tonight’s Trinity Talk

- Trinity River in Dallas through the years
- Approved Modified Dallas Floodway Project
- USACE Next Steps for the Modified Dallas Floodway Project
Government Partners
Complex project with many participants, many responsibilities and one shared goal - LIFE SAFETY IS PRIORITY NO. 1.

- Corps of Engineers
- City of Dallas / NF Sponsor
- Dallas County
- North Texas Tollway Authority
- Texas Dept. of Transportation
- Fed. Highway Administration
- EPA
- FEMA
- Texas Commission on Environmental Quality
- North Central Texas Council of Governments
Upper Trinity River Watershed
Historic Context: Trinity River, Dallas, Texas

Trinity Snag Boat, 1892

Planned Port of Dallas, 1892

Trinity Flood, 1908
Historic Context: Dallas Floodway and Reclamation Project, Nov 1929

Old Confluence

New Confluence
Historic Context: Original Construction

Dallas Floodway, 30 October 1930

Trinity River Flood Stage, 12 June 1941
Historic Context: USACE Strengthening in 1950s - Today
Trinity River Flooding History

The existing Dallas Floodway can safely convey 0.067% AEP flood event (1,500-year event)

Existing Levee
Elevation 429.92

Ground Elevation about 400.00

Elevation 416.76
1% AEP (100-year event)

May 1990
Elevation 415.12
2.7% AEP (37-year event)

June 2007
Elevation 408.32
20% AEP (5-year event)

Approximate low flow elevation within the river channel
Elevation 383.30 (400 cfs)
Current Dallas Floodway Project

Legend
Levee
Pump Station
The future of the Trinity River Corridor will be a major factor in shaping the future of Dallas itself. For that reason, it is one of only six Strategic Initiatives in the city’s long-range plan - The Dallas Plan - adopted in 1984. In the years since that plan was adopted, extensive community discussion has occurred through the Trinity River Corridor Citizens Committee and various studies have been completed that address the issues it identified - flood protection, environmental management, recreation, transportation, and community/economic development. These studies have clarified the challenges associated with the Trinity River Corridor; in proposing solutions, they have also generated debate among community members who value the various components differently.

Source: 2003 Balanced Vision Plan
Dallas Floodway Project

What did the Corps of Engineers do?

- Performed extensive study of existing levee system and natural environment.

- Examined the impact of all projects anticipated between the levees in Dallas – including those not part of the Modified Dallas Floodway Project.

- Developed solutions that reduce flooding risks and improve the quality of aquatic habitat
Modified Dallas Floodway Project
Flood Risk and Ecosystem Restoration Problems

- 200,000 people at Risk, residential areas on the West side, commercial areas on the East
- $13.7 Billion investment behind the levees

FRM

- River habitats been degraded over time due to relocation of the river channel within the Dallas Floodway

ER
Modified Dallas Floodway Project

Flood Risk and Ecosystem Restoration Project Objectives

- Ensure future reliability and integrity of the floodway system reduce residual flood risk;
- Review of the City of Dallas’ Interior Drainage Plan
- Restore to the extent possible the aquatic and riparian ecosystem of the Trinity River within the boundaries of the Dallas Floodway Project.
Modified Dallas Floodway Project
Flood Risk and Ecosystem Restoration Project Criteria

► Formulate levee improvements to have the maximum net economic benefits;
► Reduction of overall life safety risk;
► Reduction of damage structures within 100-year floodplain;
► Inclusion of select IDP features not already built;

ER
► Provide uplift of habitat function following project completion.
Modified Dallas Floodway Project
Approved Plan

Flood Risk Management
- 277,000 cfs levee raise with AT&SF Bridge Modifications
- Emergency Action Plan improvements
- Levee side slope flattening to 4H:1V (Betterment @ 100% local cost)
- Interior Drainage Plan Phase I features (Baker and Hampton Pump Stations)
- Interior Drainage Plan Phase II features (Charlie, Delta, New Trinity Portland)

Ecosystem Restoration
- River Relocation (add meanders to 8-miles of the Trinity River in the Floodway)
- Approx. 80-acre wetland in Floodway
Modified Dallas Floodway Project - Approved Plan

**Total Cost - $571,592,000**
- FRM - $241,657,000
- ER - $329,935,000

**FED - $371,535,000**

**NON-FED - $200,057,000**
Benefits of the Modified Dallas Floodway Project

► Reduces the risk of river flooding.
► Reduces flooding risks related to interior drainage
► Improves environmental sustainability
► Functions as a comprehensive system
Next Steps

Corps seeks federal funding -
Congressional appropriation for first phase: levee raises, bridge modification.

Permits -
Major construction projects by others require Corps-issued Section 408 (Rivers and Harbors Act) and Section 404 (Clean Water Act) permits.

Construction-level design review -
The Corps has ongoing oversight responsibility for all projects in the floodway including review of design documents and monitoring construction.

Trinity Lakes -
The city has told the Corps this is a top priority.
“The Trinity is the future of Dallas, and we need to build irreversible momentum, to see this project through.”
- Major General Merdith W.B. (Bo) Temple, U. S. Army Corps of Engineers, May 4, 2009