



02

SETTING THE STAGE

OBJECTIVES FOR TRINITY UPTOWN
SITE ANALYSIS
SITE PHOTOGRAPHS
URBAN DESIGN CONCEPTS

OBJECTIVES FOR TRINITY UPTOWN

After years of losing retail and residential development to the suburbs, downtown Fort Worth has been experiencing a growing resurgence of people wanting to move back to the central city. These people are seeking the opportunity to work, play, learn and shop in a vital urban area. The Trinity Uptown Plan envisions providing such areas. Water features, waterfront promenades and related open spaces are used as a way to provide attractive amenities for urban family living.

Fort Worth is joining a North American city movement that is finding strategies to reconnect their citizens and downtowns with their riverfronts. In the past, rivers were treated as dump sites for waste and as dangerous places where floods occurred. This attitude created physical and psychological barriers between urban development and rivers. As a result, rivers have been channelized into sterile, controlled water bodies with limited public access and poor water quality.

Reconnecting to rivers is not only an important sustainability strategy, but also an important urban development strategy to promote compact, mixed-use urban development. With the Trinity Uptown Plan, Fort Worth can continue to be a leader in rediscovering the importance of the central city.

The Trinity Uptown Plan has been guided by the key planning objectives outlined in the following columns.

Reconnect urban Fort Worth to the Trinity River by eliminating the barrier created by the levees. Encourage activity on the water and along waterfront areas.

The new levee configuration can be accomplished with the introduction of a bypass channel. This will allow for the redevelopment of the substantially obsolete and vacant industrial area north of Downtown into a major mixed-use waterfront area centered around the confluence of the West Fork and Clear Fork of the Trinity River. The new Trinity Uptown development will assure that all waterfront and greenbelt areas have continuous public access so that all citizens can benefit from this public and private investment.

Cities that have successfully reconnected with their waterfronts have become the premier places to live and work. In San Antonio, Texas, for example, the River Walk has become very successful in attracting people to the river edge, which in turn has helped to support the many businesses that have located along side it. The River Walk creates an intimate and cool place to be in the hot climate of San Antonio. The shortcomings of River Walk are that it is a destination waterfront lacking any residential development along its edges, as well as being relatively small in size.

Providence, Rhode Island, is another example of how a waterfront can be integrated into the City's life. Here the Providence River provides beautiful walkways, opportunities for water-based activities, and a place for celebrations such as the WaterFire festival. Although some commercial and institutional uses front onto the river edge, residential uses would bring even more activity to the waterfront.

One of the most intensively developed waterfronts in North America is found in Vancouver, British Columbia. In this case, there are a variety of neighborhoods and uses over its many miles of continuous, publicly-accessible waterfront. The waterfront has become not only a powerful amenity for the people who live close to it, but also a regional draw that helps to support the businesses that locate on and near the waterfront. The attraction of living, working, playing and learning near the water's edge has promoted a diversity of water-based activities such as boat houses, and a variety of recreational uses, making water part of people's daily lives.



1. River Walk, San Antonio
2. Providence River, Rhode Island
3. False Creek North, Vancouver
4. Coal Harbour, Vancouver

Create a vital and sustainable Trinity Uptown that links Downtown, the Cultural District Area, and the Near Northside/Stockyards Districts.

The Trinity Uptown site is strategically located in the center between Downtown, the Cultural District and Northside/Stockyards. This is a unique opportunity to integrate housing into the central city. Although mixed-use developments should be encouraged throughout the central core, having a concentration of family-oriented neighborhoods close to these districts will promote a greater diversity of users for the institutions, businesses and public infrastructure. Focusing on residential development in the Trinity Uptown area will compliment and reinforce the already successful adjoining districts without diluting their respective strengths. Extending the existing street grid and trail system through the Trinity Uptown site will help to seamlessly integrate the site to the city.



Trinity Uptown linkages to the other three nodes

Provide flood protection for redevelopment areas. Ensure ecosystem restoration and water quality management are integrated into a sustainable urban environment for the enjoyment of all citizens.

The Trinity Uptown site is a part of the larger Trinity River watershed. The Plan incorporates watershed management and environmental restoration strategies that will create a sustainable urban environment. These water quality and environmental initiatives for Trinity Uptown will complement and reinforce the planning for water quality now underway at the regional level.



conceptual diagram of valley storage and environmental restoration areas

Attract over 10,000 new households to the Trinity Uptown site. Create compact mixed-use neighborhoods populated by the diverse demographic make-up reflective of Tarrant County.

Consistent with the City of Fort Worth Comprehensive Plan, the Trinity Uptown Plan will promote mixed-use family-oriented development in this area. In addition to residential developments, it is important that other community needs such as schools, community centers, neighborhood shopping and parks be provided.

It is interesting to compare the development patterns of Vancouver, British Columbia, and Fort Worth, Texas, where two very different growth patterns have taken place. Both cities have populations of approximately 550,000. In Vancouver, urban development is constrained by its proximity to the mountains, the ocean and the border. These constraints and related regional planning efforts have resulted in a denser, more compact form of development. Fort Worth, with its prairie context and lack of physical constraints, has developed in a significantly more spread-out pattern. In the diagram below, plans at the same scale show that the population of Vancouver lives in an area about a tenth the area of Fort Worth.

Studies have shown that vibrant urban life is achieved by promoting higher density, mixed-use neighborhoods. Infrastructure expenditures for cultural and environmental amenities can then be cost-effectively provided in the inner-city neighborhoods, thereby enlivening the central core at all times of the day and night.

Create a regional inter-governmental financing strategy that includes the Tarrant Regional Water District, the City of Fort Worth and Tarrant County. This financing would be matched by federal and state funds.

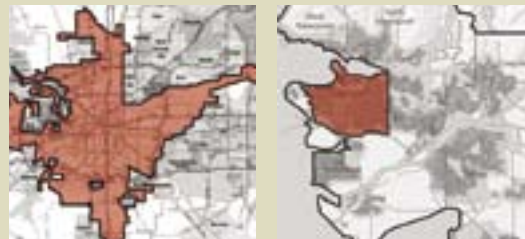
In 2003, a Tax Increment Financing (TIF) arrangement for the Trinity Uptown area was established with the agreement of the Tarrant Regional Water District, the City of Fort Worth, Tarrant County, and the Tarrant County College District. The most recent City Capital Improvement Program included \$11 million for parks and streets in the area. Tarrant County College has just acquired about 40 acres on both sides of the river near the courthouse for a downtown campus. The campus acquisition price includes funds for environmental clean-up.

Congress has authorized \$110 million of US Army Corps of Engineer funds for the project. Additional federal funds will come from the Department of Transportation (DOT), the Department of Housing and Urban Development (HUD), the Economic Development Administration (EDA), and the Environmental Protection Agency (EPA).

These financing strategies are designed to accomplish the Plan without putting any extraordinary burdens on local government budgets and local taxpayers.

Conserve, respect, and interpret the rich history of the confluence of the Trinity River, the birthplace of Fort Worth and Tarrant County.

These are tangible elements that link the site back to its natural and cultural history. It is important to create a place that continues a sense of Fort Worth as a city connected to its past.



comparative urban areas for the City of Fort Worth and the City of Vancouver, 2004



SITE ANALYSIS

LOCATION

The Fort Worth Trinity Uptown planning area is located roughly between Downtown and the Trinity Bluffs to the south, the Fort Worth and Western Railroad to the north and west, and the Trinity Bluffs and Samuels Avenue neighborhood to the east.

CLIMATE

Fort Worth is in a subtropical climate, which can result in hot and humid summer days. Shade, water, and breezes therefore become important elements in the design of waterfronts and other outdoor public spaces. Summer nights are generally pleasant, but can sometimes remain very warm and humid, so again a light breeze is important outside. The spring and fall times of the year have moderate to warm temperatures, with mostly beautiful days and nights for outdoor activity. The exception is the strong rain and wind storms that occasionally move through, but these are usually short-lived, lasting only a day or two. The winters are generally mild, but "northers" occur about twice a month, accompanied by drops in temperature, and usually last a couple of days. About two to three times during the winter, periods of snow and ice will occur, lasting about one to three days and followed by rapid melting and pleasant sunny days.

GEOLOGY

The site exists on the alluvial flood plain of the Trinity River, with underlying limestone bedrock. The general elevation of the site ranges from 530 to 535 ft above sea level, with the bedrock located 5 to 15 ft below the surface. The 8 ft to 33 ft deep flood plain deposits are made up of clays, silts, sands and gravels. The soils and underlying geology are generally suitable for the construction of mid to high-rise buildings and can support underground parking, with tanking required in some locations.

TOPOGRAPHY AND NATURAL FEATURES

The site is a flat flood plain with an average elevation at 533 ft above sea level. The bluff creates the south/southeast edge of the site and rises about 100 ft above the site at the Courthouse. To the north, the land rises more gently up from the Fort Worth and Western Railroad. Oakwood Cemetery sits on this gentle slope up to the Belmont Terrace neighborhood. North Main Street also traverses up this slope, beginning at the railroad and going up to Northside Drive. One of the iconic images of Fort Worth is the view from the Trinity Uptown site towards Downtown, with the courthouse sitting on the forested bluff and the high-rise skyline in the background. This juxtaposition of nature and buildings is a fundamental view that must be preserved and enhanced. The current river surface elevation drops from an average of 520 ft above sea level in front of Pier 1 to 505 ft in front of the Tarrant Regional Water District (TRWD) offices. These elevations have a fluctuation of +/- 30 ft from low water to flood water. Controlling these variations and establishing a constant surface elevation allow development to occur both at and adjacent to the water.



SIGNIFICANT STRUCTURES

There are several historic buildings/structures on the site which are shown on the adjacent diagram. To the extent feasible, these buildings/structures need to be retained and integrated into the new plan as they are tangible links to the history of the site. In addition to the historic buildings, there are structures and spaces that are critical to the identity of Fort Worth. These structures are noted on the diagram below and will be integrated into the plan.



LINKAGES AND VIEW CORRIDORS

There are good north-south street linkages on the site. North Main Street creates the strong ceremonial/commercial axis that connects the Trinity Uptown site both to central Downtown and to the Northside/Stockyards. Henderson Street creates another strong north-south connection, linking Northside Drive to the west side of Downtown. Both streets are major regional streets, providing connections for the site beyond its immediate context.

White Settlement Road is the only east-west street that comes into the site and connects only as far as Henderson Street. This leaves an east-west gap in the area between Henderson and North Main Street and to the freeways further east. The bluff creates a difficult barrier for road access to the east because of the significant grade change. White Settlement Road must extend through this site to provide a complete east-west connection.

The extensive Trinity River trail system connects through the site, but connections to Downtown need to be reinforced.



BARRIERS AND MAJOR INFRASTRUCTURE

The major barriers to waterfront access and development are the 5 miles of levees which restrict visual and physical access to the river. The natural bluffs create barriers for vehicular traffic to the east and south.

The Fort Worth and Western Railroad traverses southwest to north-northeast and is generally the western edge of the site. The proposed bypass channel is adjacent and parallel to this railroad because moving or closing the railroad would not be financially or environmentally cost-effective.

It is assumed that the existing overhead power lines will be relocated under the future roadways and the substations will be retained. Where the street grid is modified, it is assumed that the underground utilities will be realigned to suit. Two main sewer lines, shown on the diagram below, will remain in place due to their size and importance. The plan accommodates their alignment.



EXISTING LAND USES AND OWNERSHIP

The majority of the privately owned lands are vacant or under-utilized industrial lands. Through the years, many industries have closed or transitioned to marginally productive economic use. However, there remains some viable industries, most of which are adjacent to or close to the North Main Street corridor. The reconstruction of LaGrave Field and its vast surface parking area has a significant influence on the eastern portion of the site.

Approximately 50% of the site area is owned by the Tarrant Regional Water District and the City. This will certainly aid in the financial feasibility of the project. There are approximately 115 private property owners in the Trinity Uptown site.

There are no residential developments within the site area. The Samuels Avenue neighborhood adjoins the site atop the bluffs and there are some apartments under construction west of Henderson Street on Peach Street. The residential quality of life on Samuels Avenue and all adjoining areas will be substantially improved by the Trinity Uptown project.



- river
- highlands
- forested area

- major buildings
- significant structures/buildings
- plaza
- bridges

- major city streets
- secondary city streets
- major view corridors
- vehicular access points

- overhead powerlines
- substation
- railway
- levees
- sewer

- City of Fort Worth
- TRWD
- cemetery
- Tarrant County College
- park



1



4



2



5



3



6

1. railway bridge over the West Fork

2. view looking northwest at the confluence of the Clear Fork and West Fork

3. the Trinity River east of the North Main Street bridge showing the levee as a barrier to the Trinity Uptown site

4. view over the bluff to the TXU Power Plant

5. view over Heritage Park to TXU Power Plant

6. the intersection at North Main Street, 2nd to 4th Street looking south

URBAN DESIGN CONCEPTS

Create a controlled water surface

In order to remove the levees adjacent to Downtown and to divert flood waters from the site, it is necessary to build a bypass channel with flood gates. When the flood gates close, the flood waters are diverted from the existing watercourses into the new bypass channel. Constructing a new hydraulically controlled dam east of Samuels Avenue will function to create an impounded water body with a constant elevation of 525 ft above sea level.

Together, these measures create a controlled water body that allows flood-protected walkways and buildings to be established at the water's edge at approximate elevations of 530 ft and 532 ft above sea level respectively.

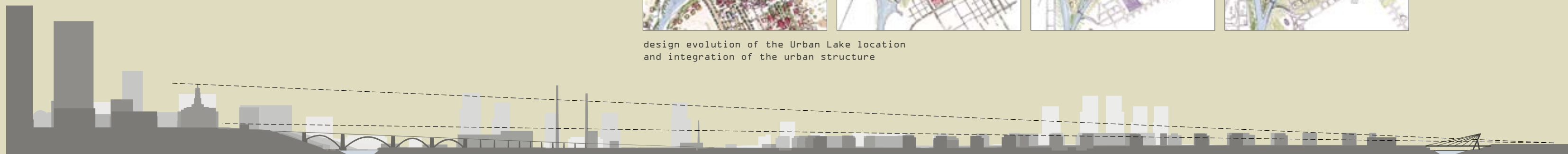


- bypass channel
- flood gates
- Samuels Avenue dam

configuration of the bypass channel and Samuels Avenue dam

Preserve views of bluff

The massing of the buildings in the area between the Urban Lake and the river will be kept to a maximum height of six stories to preserve views of the bluff from the north and from within the site. High-rise (+/- 20 stories) buildings will be concentrated at the edges of the site at the confluence points of the river. Restricting building heights to 20 stories is important to protect the iconic views of Downtown and the Courthouse on Trinity Bluff.



section showing the view corridor protecting the bluff

Create a variety of water edges similar to a river delta

The configuration of the impounded water has been one of the main challenges of the design process. The designs were inspired by Texan delta formations where water channels meander through the land, creating organically shaped land parcels. These organic forms express the forces of slow-moving water. The Trinity Uptown Plan adopted these forms to organize the water and land parcels.



options for the river delta configuration

Integrate the new levees into the urban form

Buildings that front the bypass channel will be built into the side of the levees. Street ends that connect with the top of the levees will gently slope down at 5% to the existing grade. Implementing these two measures will create a bypass channel that is fully integrated into the City and create an amenity space with desirable development lands along its edges.



section showing the integration of the levee into the building edge

Create an Urban Lake as a new focal point for the City

The new lake is created by the widening of the West Fork. This new focal area will provide the primary identity of the Trinity Uptown site. It will draw together the energy of the confluence, the refurbished TXU Power Plant site, the RadioShack site and Downtown.



design evolution of the Urban Lake location and integration of the urban structure

Create distinct mixed-use neighborhoods

The waterways are used as natural edges to define four distinct neighborhoods. Each neighborhood will have its own character and compliment of uses to accommodate daily living. Organizing the site into smaller neighborhoods will reinforce a community spirit.