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1 Community Goals & Objectives

Community goals and objectives guide the actions recommended throughout this comprehensive plan. Representatives from the City of Wharton and consultants from GrantWorks, Inc. employed several outreach strategies to gather public input including public workshops, presentations, online surveys, and interviews. The conclusions from the public outreach can be expressed as a community vision statement that describes residents' hopes for what Wharton might be like in 2028:

City of Wharton Community Vision Statement

Wharton 2028

In 2028, Wharton will be a diverse and resilient, small-town community that provides excellent amenities, a variety of job and recreational opportunities, and affordable living.

Guiding principles:

- Reduce potential flood damage by pursuing planning and land use decisions that will improve the ability of individuals, communities, economic systems, and the natural and built environment to recover from a disaster.
- Pursue land use decisions that will provide all residents living in existing and new neighborhoods with safe and convenient access to jobs, housing, and a variety of amenities.
- Maintain the character and integrity of existing neighborhoods, parks, and open space by requiring new construction to meet high quality, context-sensitive development standards.
- Pursue diverse housing development affordable to and serving the needs of all segments of the population

1.1 Key Community Outreach Efforts

Representatives from the City of Wharton and consultants from GrantWorks, Inc. employed several outreach strategies to gather public input including public workshops, presentations, online surveys, and interviews. The following sections describe in more detail the surveys and workshops used to gather community input.

Surveys

The City of Wharton and GrantWorks, Inc. invited community members to complete two surveys: the General Survey and the Parks & Recreation Survey. The surveys were provided online in both English and Spanish and publicized by the City through flyers, posting on the City website, billboards, etc.

The 18-question General Survey included general questions about Wharton's key strengths and challenges, as well as focused questions about housing, infrastructure/services, transportation, the central business district, etc. The survey was available online for approximately two months during spring 2018. Over 308 respondents completed the survey. *Appendix 1A* provides a summary of the General Survey responses.

The purpose of the 13-question Parks & Recreation Survey was to identify common recreational activities of adults and children, favorite parks, and desired improvements/additional facilities. The survey was initially distributed to Wharton ISD students during March 2018 and made available to the general public in April 2018. The Parks Survey remained open until the end of May 2018. One hundred ninety-four (194) respondents completed the Parks Survey. The demand-based assessment in *Chapter 11: Recreation & Open Space* summaries survey findings.

Workshops

The City of Wharton and GrantWorks, Inc. invited community members to participate in four public workshops. The first round of workshops, held on March 13, 2018 and March 22, 2018 at the Wharton Convention Center, aimed to document conversations between community members about their goals and aspirations for the future of Wharton. The workshop documented input from Wharton residents using an effective, established process known as the Goals Grid Method.[1]

[1] Nichols, Fred. (2000). The Goals Grid: A tool for clarifying goals and objectives.

Participants were asked to discuss the questions in *Table 1.1* and note responses on a large grid.

Table 1A: Goals Grid

Achieve	**Preserve**
What do you want in Wharton that you do not have?	What do you already have in Wharton that you want to keep?
Avoid	**Eliminate**
What do you not have in Wharton that you would like to avoid?	What do you have in Wharton that you would like to get rid of?

Appendix 1B summarizes responses from both meetings. The *Digital Appendix* includes a consolidated Goals Grid from each meeting.

The second round of workshops, held on April 4, 2018 and April 11, 2018, summarized initial findings from the first two meetings and the General Survey and asked participants to consider the goals, objective and visions of their fellow community members while completing a land use mapping exercise. Over the course of three rounds participant groups:

- Identified problem drainage areas and limited development areas;
- Considered and selected potential development types (housing, commercial, recreational) for currently semi-developed or undeveloped land in the city; and
- Selected one most desirable location for (1) increased housing density, (2) commercial concentration, (3) parkland expansion or new park development; (4) manufacturing/industrial development.

The *Digital Appendix* includes digitized thematic maps illustrating consolidated results from the second round of workshops.

1.2 Goals & Objectives

In conjunction with fieldwork and research findings, the results of the public outreach efforts inform the specific implementation plans for each area of this comprehensive plan. Each implementation plan contains long-term goals and specifically defined objectives, timelines, involved parties, and estimated costs. *Table 1.2 (next page)* summaries proposed public investment actions for the next 10 years.

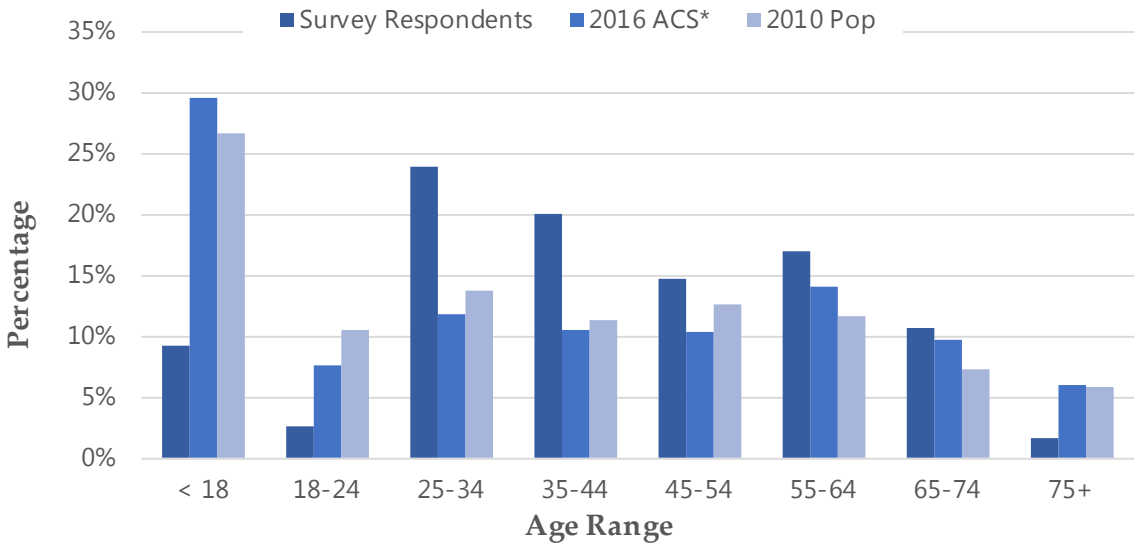
Commitment to Fair Housing

In recognition of fair housing as important to all aspects of community planning, these studies include analyses of protected classes in Wharton and of how Wharton policies, procedures, and investments impact protected classes in the City.

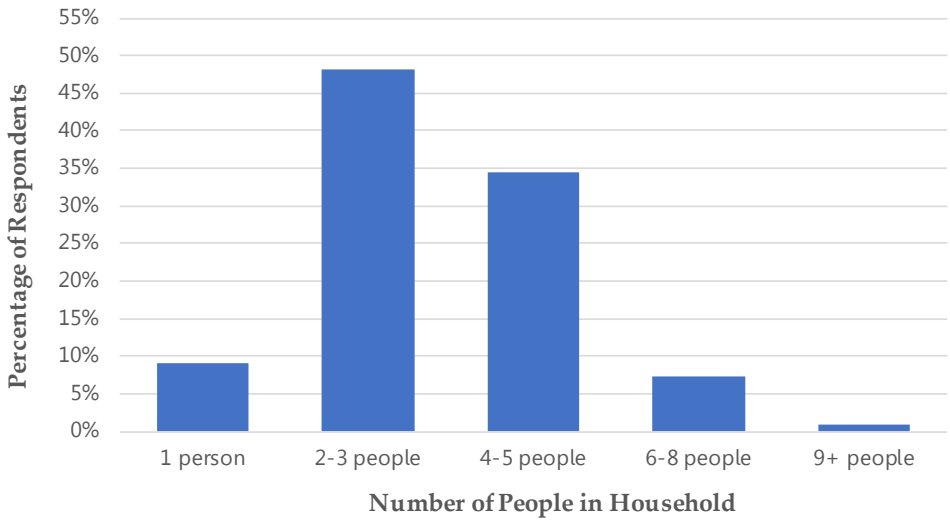
1.3 Appendix 1A: General Survey Summary

An online survey, created using Survey Monkey, was live for approximately two months in spring 2018; 308 participants filled out the 18-question online survey. The following charts summarize General Survey responses. To the extent possible, open-ended comments were consolidated into additional categories.

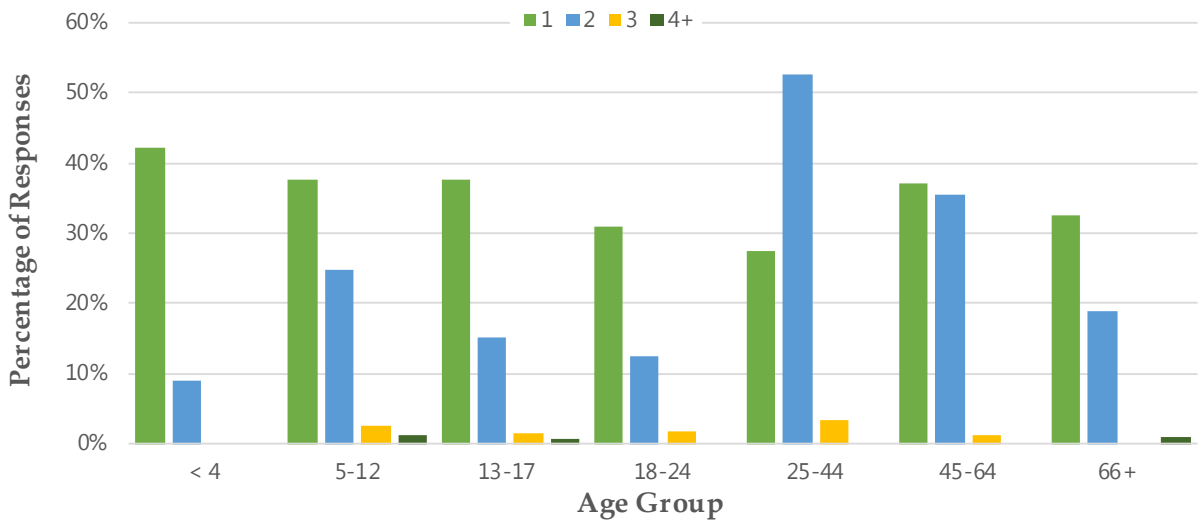
1. **Please indicate your age.**



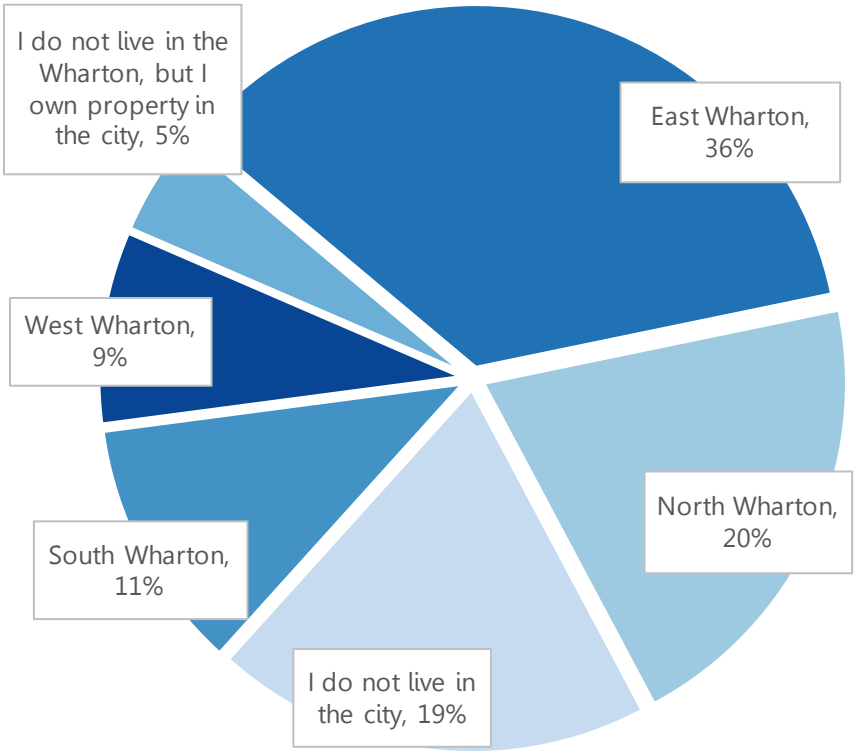
2. **How many people live in your home, including yourself?**



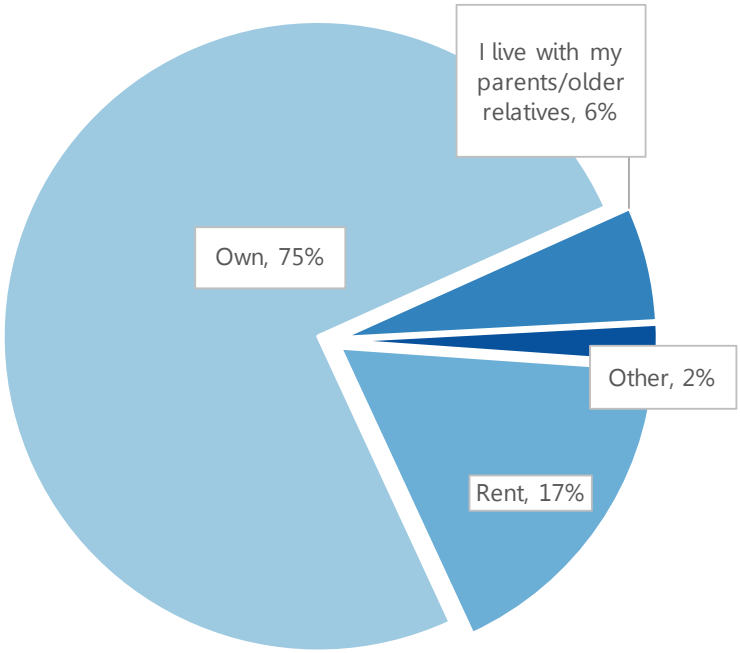
3. How many people in your home are in the following age groups, including yourself?



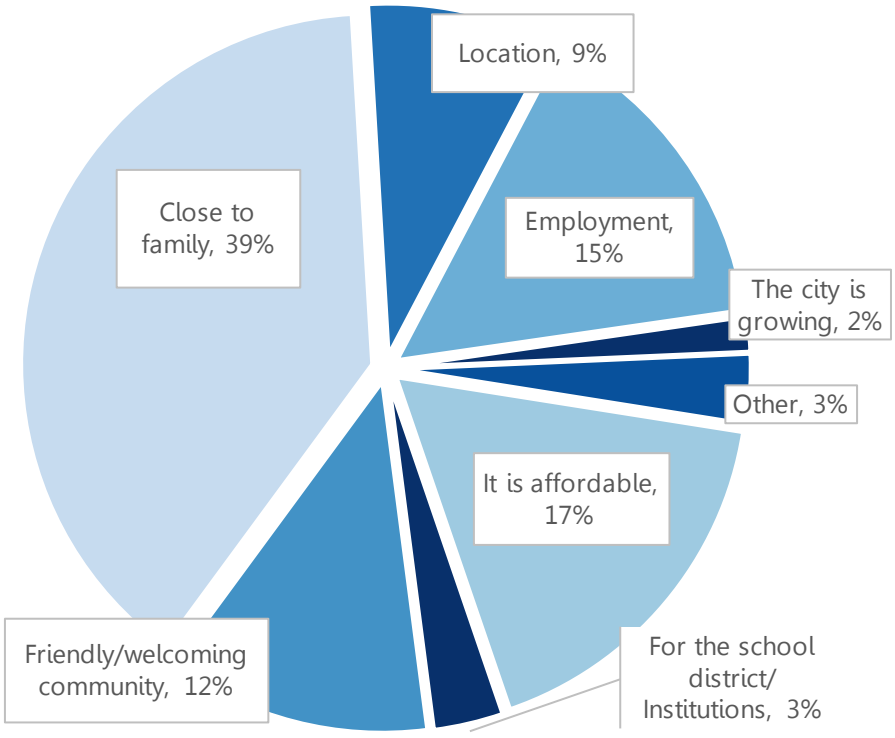
4. Where do you live?



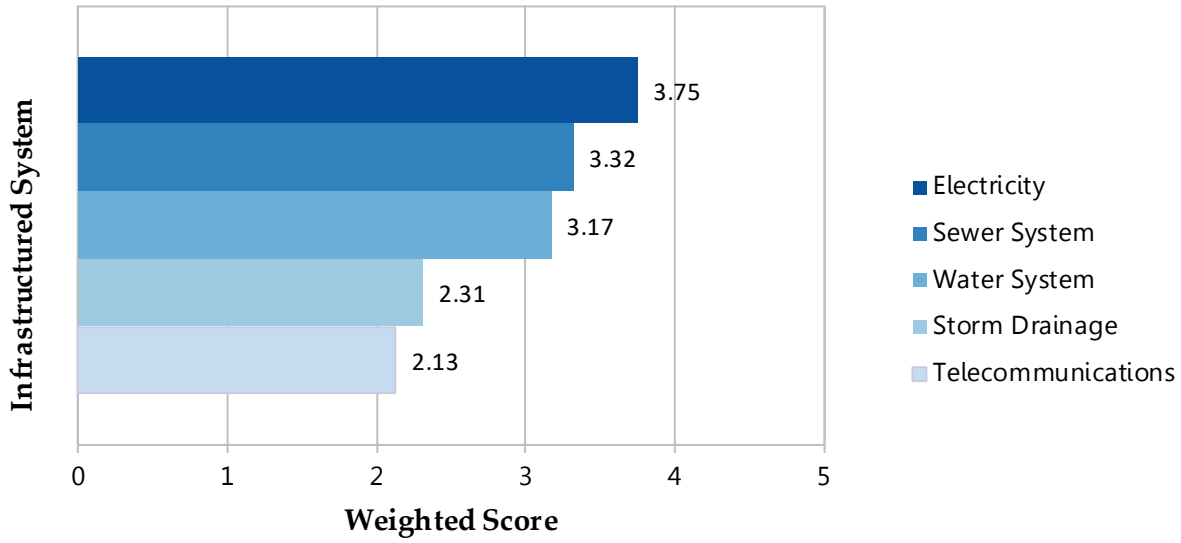
5. Do you rent or own your home?



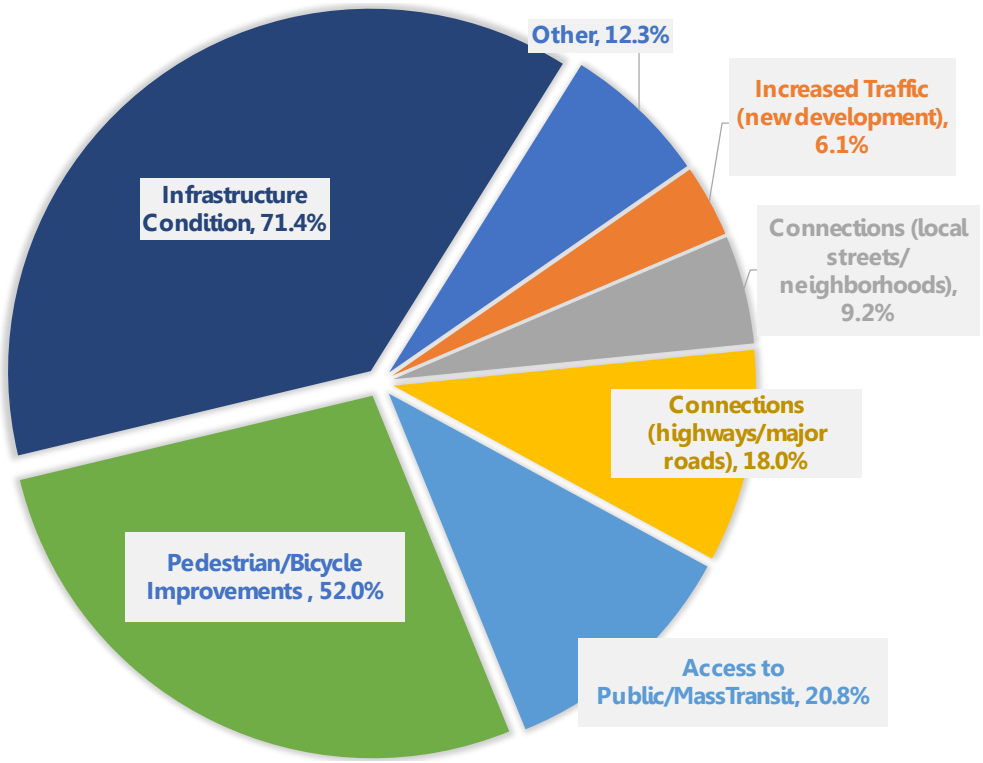
6. If you moved to Wharton from another community, why did you pick Wharton as your new home? (Select all that apply)



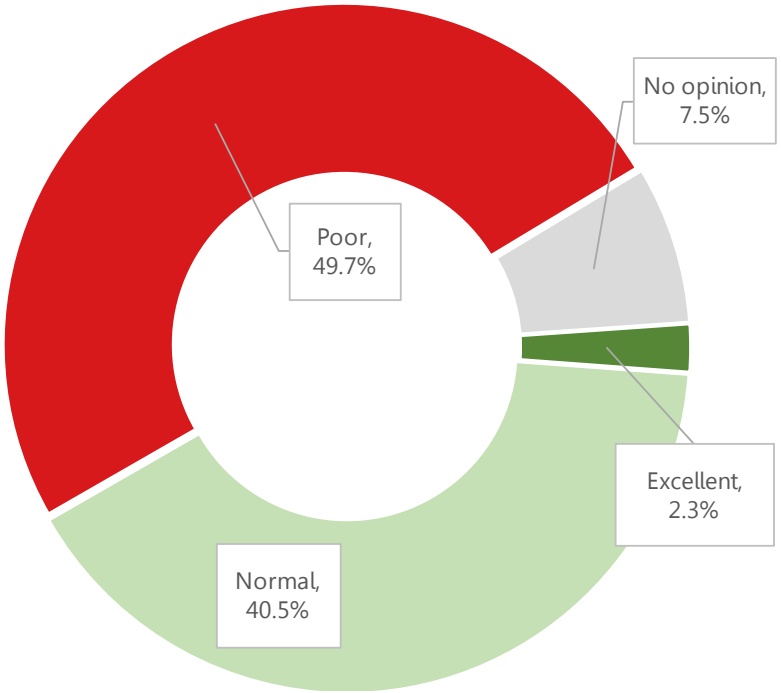
7. How would you rate the quality and dependability of the following services/systems?



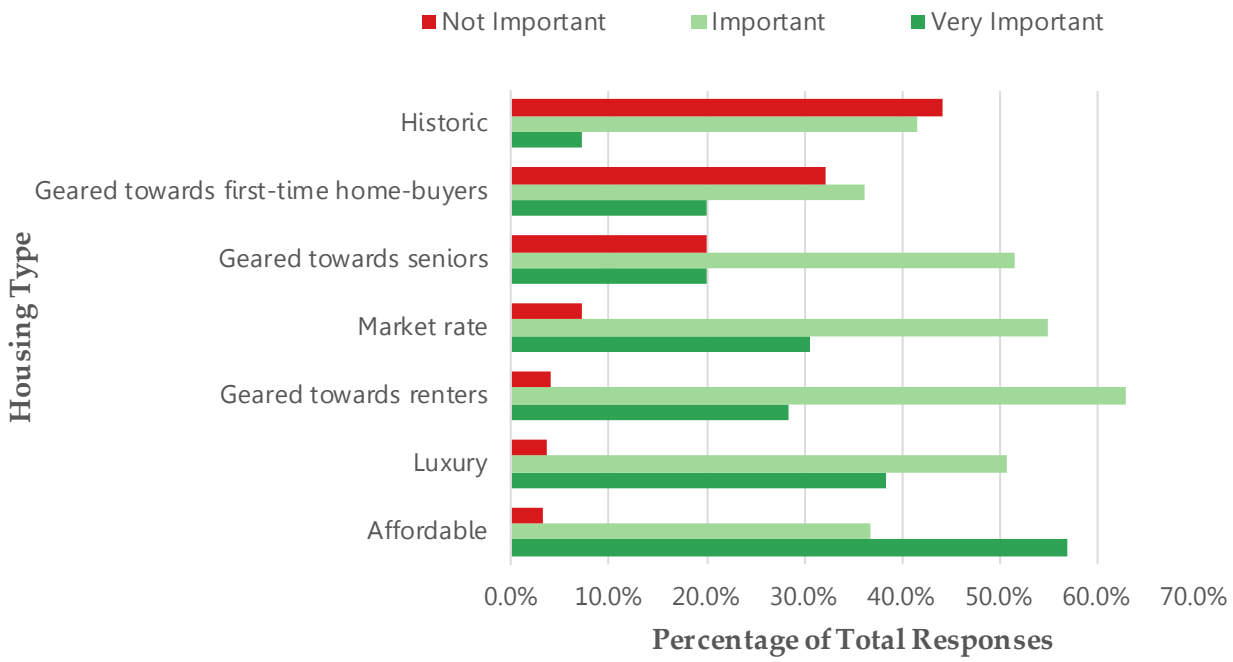
8. **In your opinion, what are Wharton's most important transportation issues (Select up to three)**

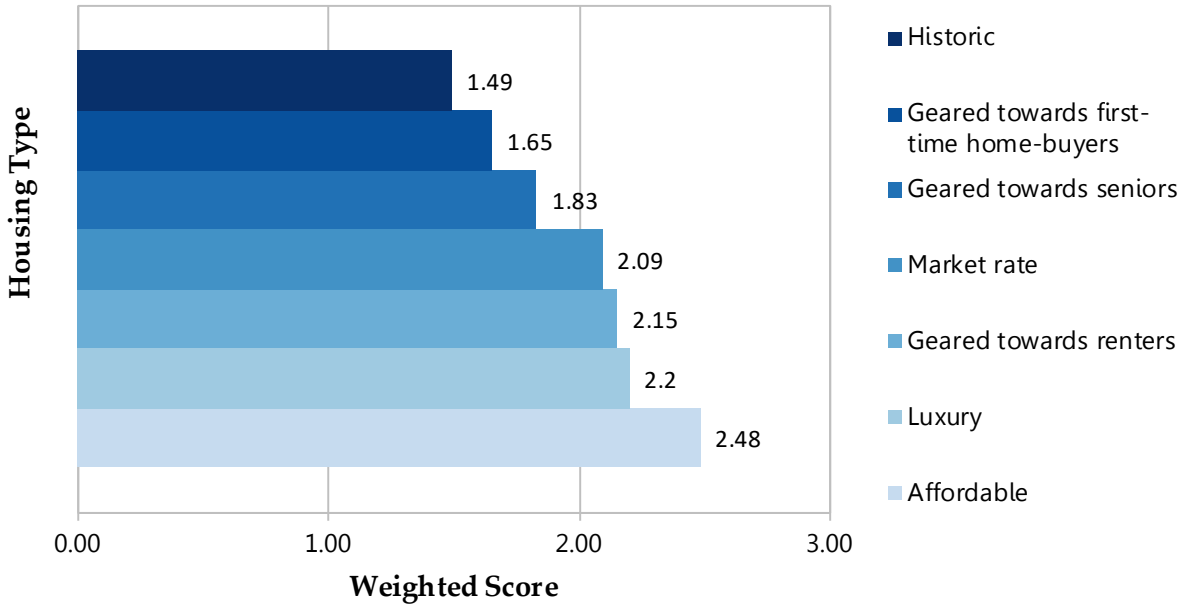


9. **How would you rate the overall condition of housing in Wharton?**

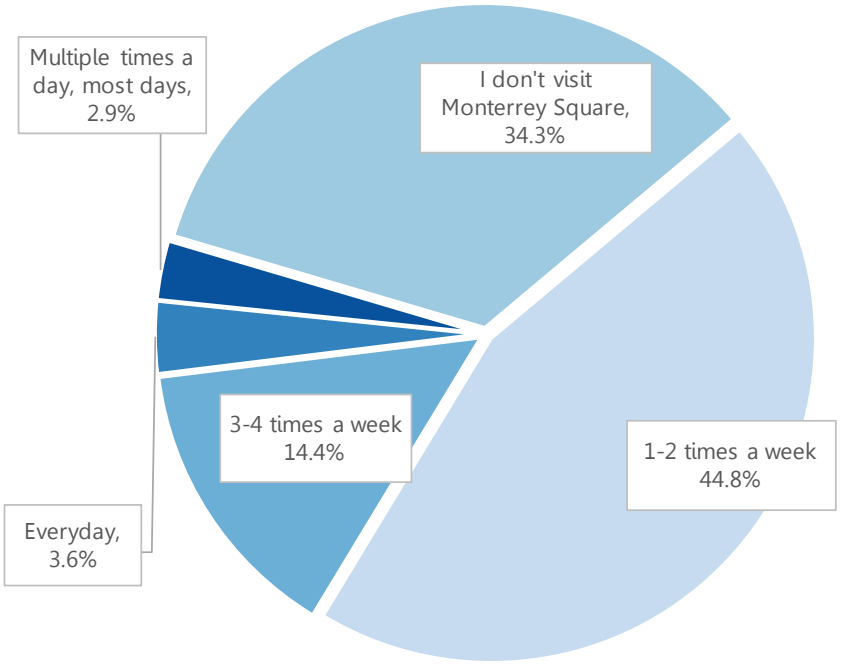


10. How would you rate the importance of the following housing types?

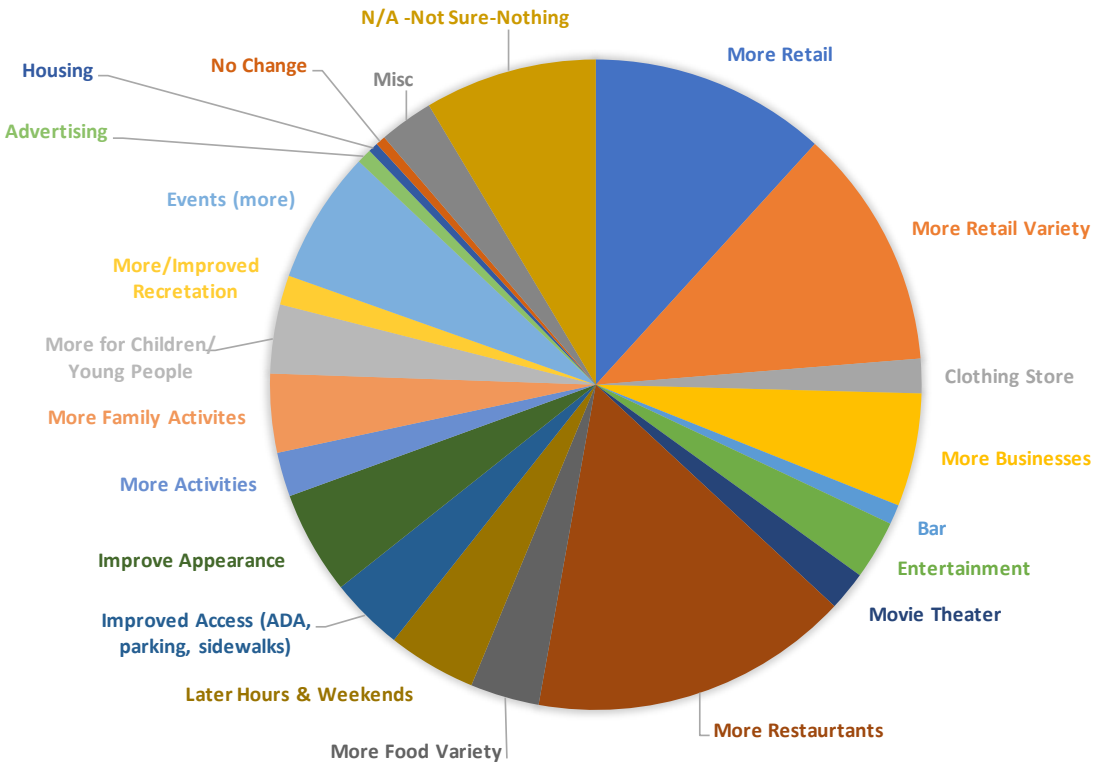




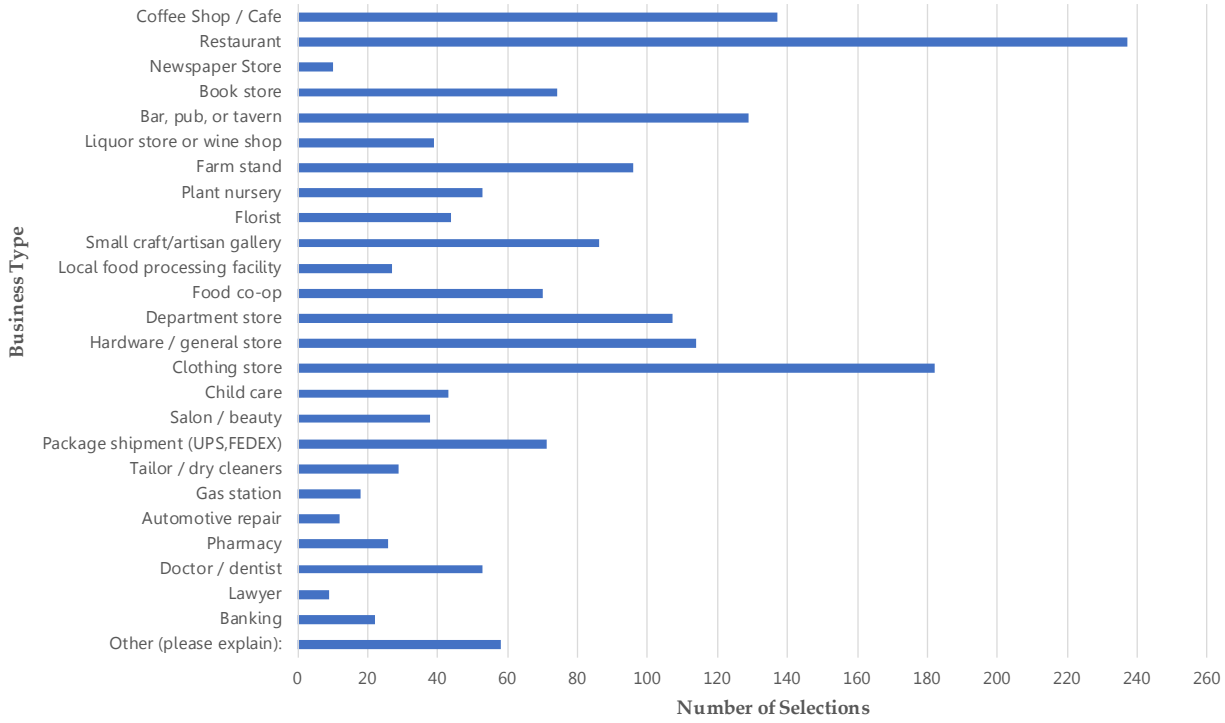
11. How often do you visit Monterrey Square (downtown Wharton) in a typical week?



12. What changes would lead you to visit Monterrey Square more often?



13. Which of the following businesses would like to have, or to have more of, in downtown Wharton?



14. Pick one word to describe Wharton today.

15. In your opinion, what are Wharton's three greatest strengths?

Question 15 was open-ended. To present a summary of the responses, reviewers created comment summary categories or codes based on common themes in the responses. Each comment summary category was then assigned a score based on the number of times the theme was referenced as one of Wharton's top three greatest strengths (+3 points each time mentioned as the #1 strength, +2 points each time mentioned the #2 strength, and +1 point each time mentioned in the #1 strength). Comments were categorized with multiple codes when appropriate.

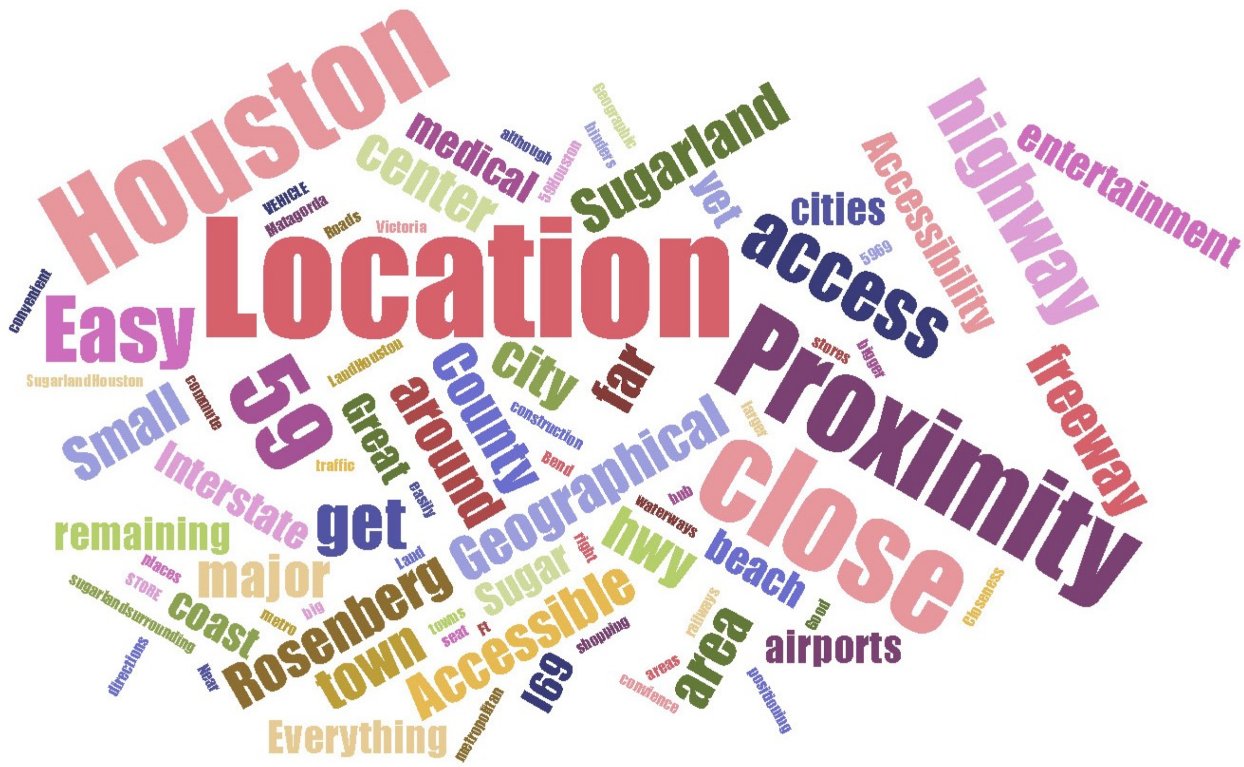
The following table lists the comment summary categories and the weighted scores. Word clouds based on individual responses in the top three comment categories follow.

Comment Summary Category	Weighted Score
Community – References to Wharton residents/community	334
Feel – References to atmosphere/Appearance (e.g. small, beautiful)	287
Location – References to proximity to thing/place in/near Wharton	210
Institutions – References to schools, churches, sports	179
Business/Economy – References to businesses (general & specific)	157
Amenities-Events – References to parks, the river, Monterrey Square, events, etc.	69
Local Government/Public Services – References to municipal government & services	69
History – References to history or historical structures/aspects	65
Affordable – References to affordable housing, transportation, goods, etc.	46
Future – Reference to potential for future development, growth, change	45

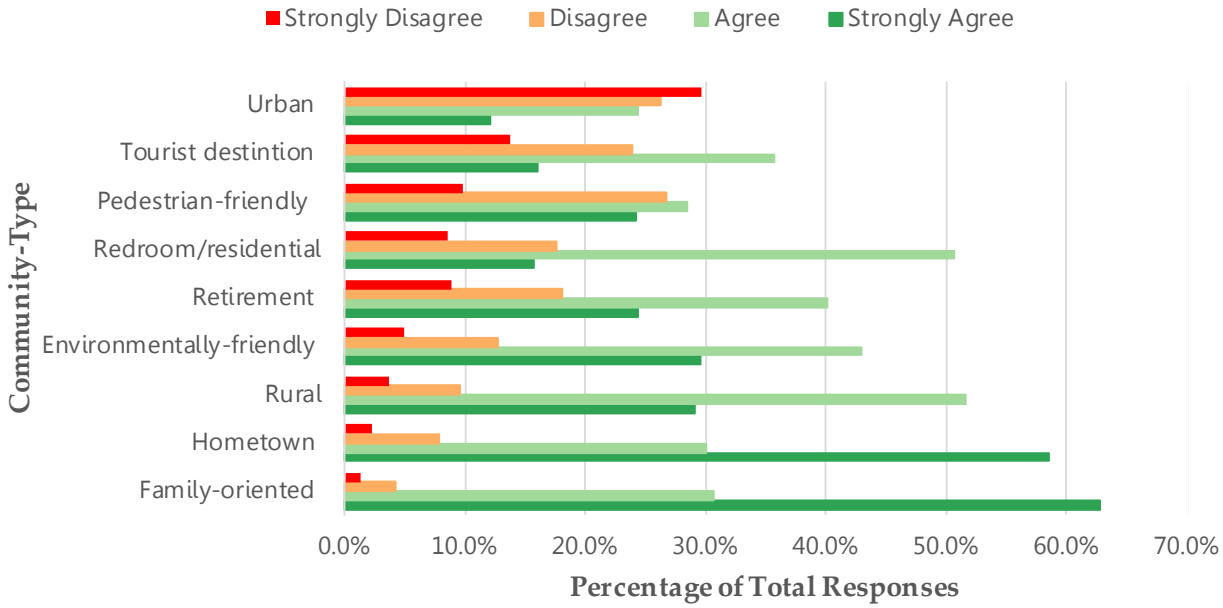
#1 – Community

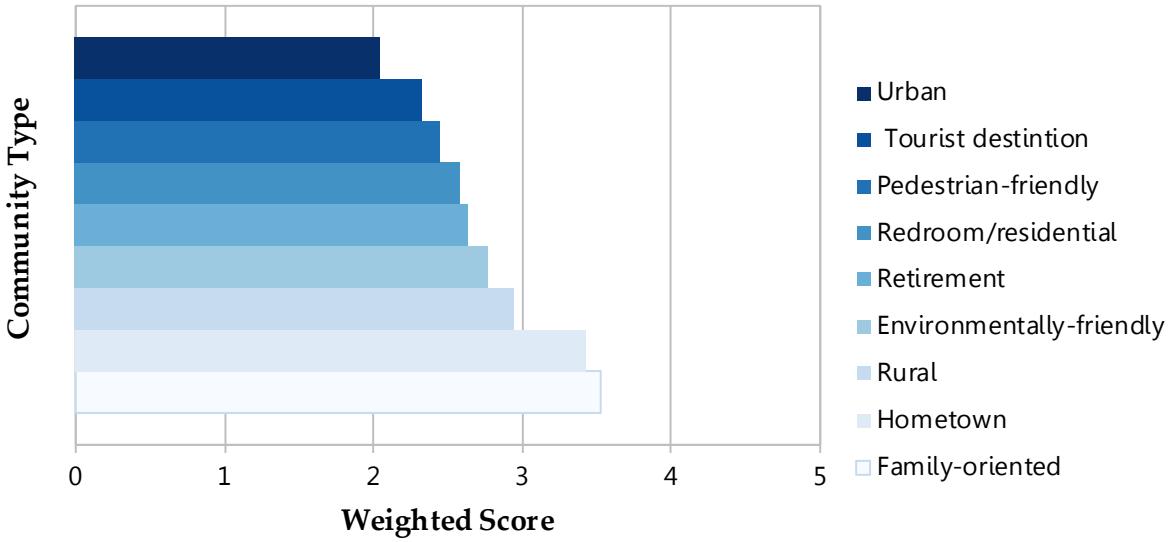
#2 – Feel

#3 – Location

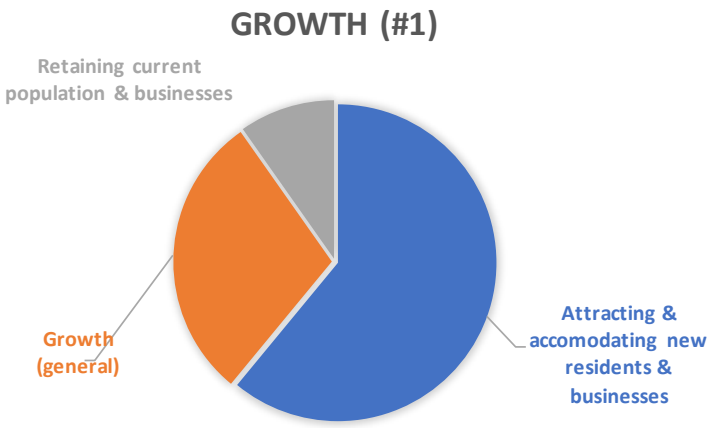

Houston
Location
Proximity
close
access
highway
Accessibility
entertainment
freeway
Sugarland
medical
center
cities
Easy
59
Small
County
city
far
around
Great
Geographical
Interstate
get
remaining
major
hwy
beach
Sugar
Rosenberg
coast
town
Accessible
airports
area
I69
Everything
yet
convenient
SugarlandHouston
LandHouston
commute
construction
traffic
Bend
easily
waterways
hub
Land
places
STORE
sugarlandsurrounding
directions
metro
big
towns
seat
Ft
shopping
railways
areas
convience
positioning
metropolitan
Near
Good
Closeness
stores
bigger
larger
right
Victoria
Roads
VEHICLE
Matagorda
although
Geographic
binders
59Houston
5969

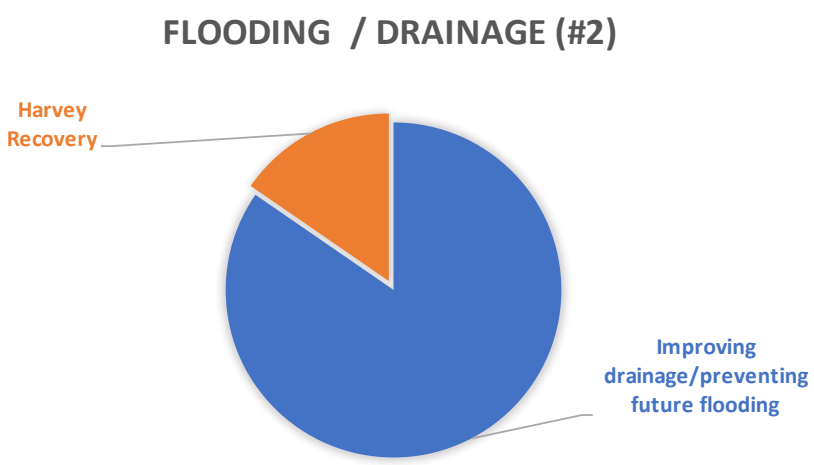
16. Please let us know how much you agree or disagree with each of the following statements about the kind of community you think Wharton should be.

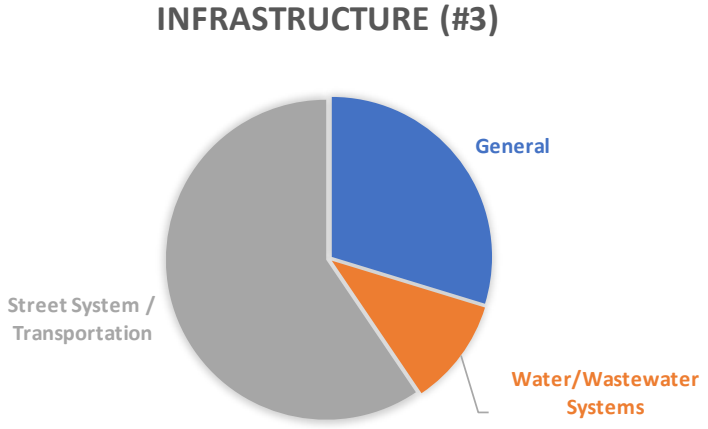




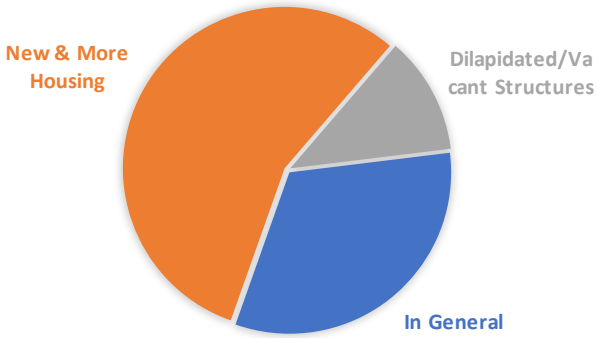
17. In your opinion, what is the greatest planning challenge facing the city of Wharton in the next 10 years?



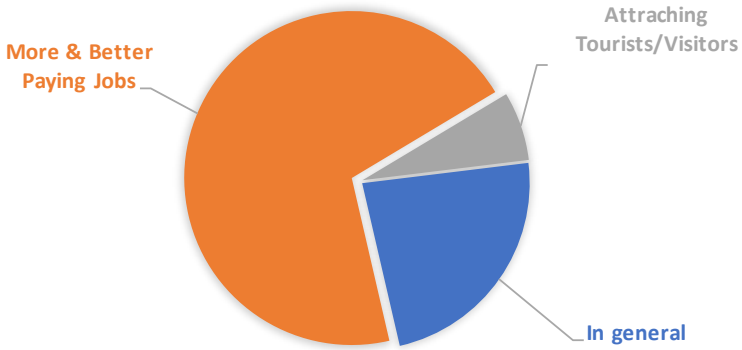




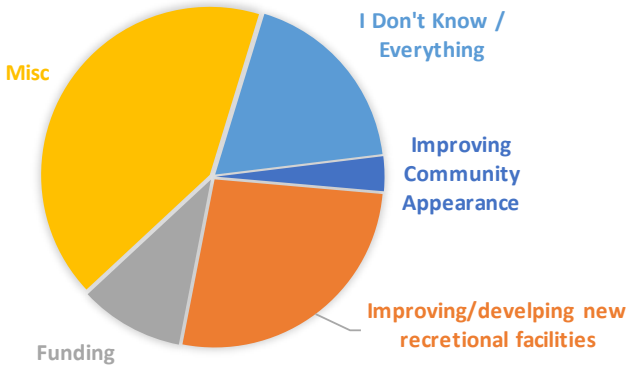
HOUSING (#4)



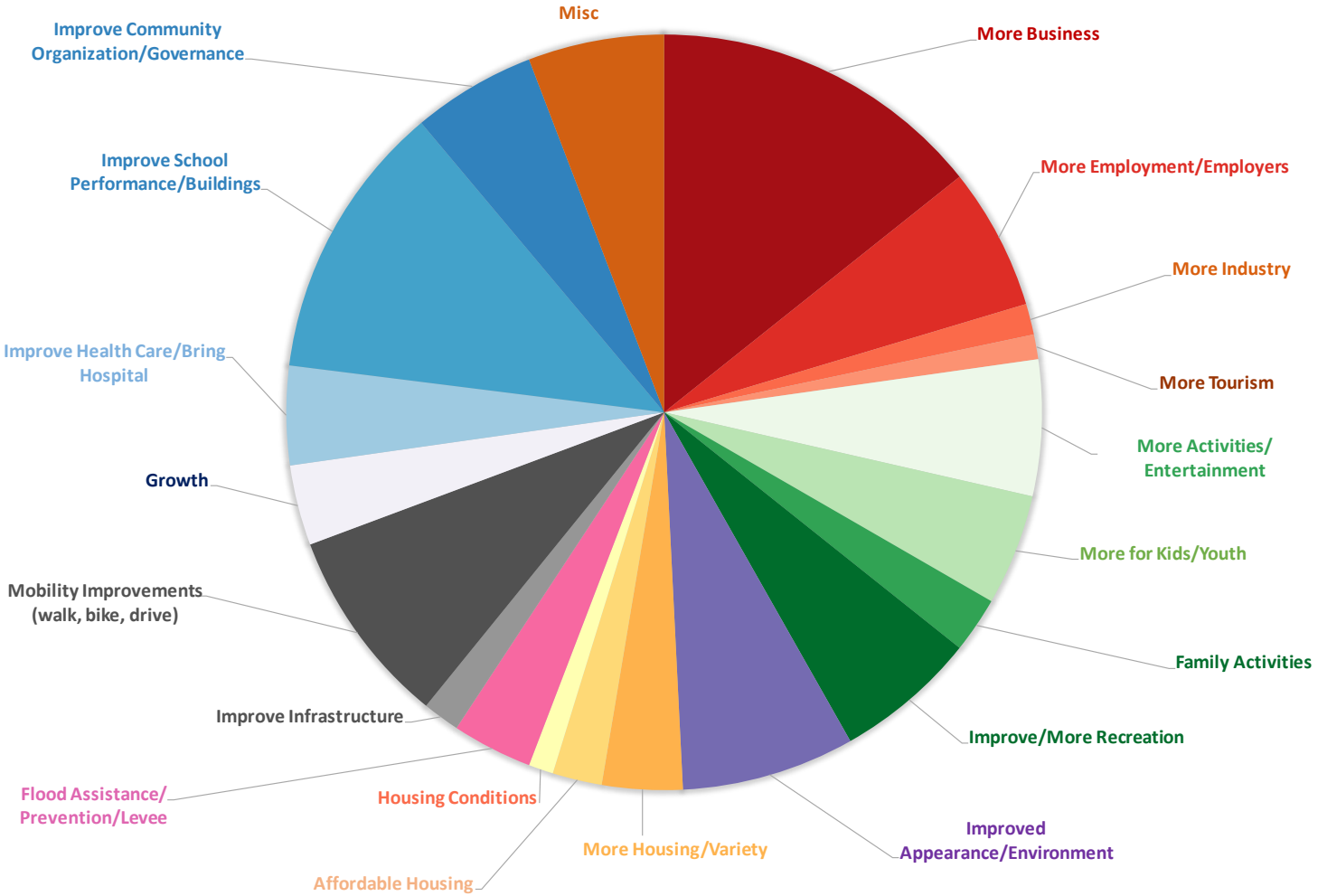
ECONOMIC DEVELOPMENT (#5)



OTHER



18. What is one major improvement or change that you would like to see in Wharton in the next 10 years?



1.4 Appendix 1B: Goals Grid Summary

The following table summarizes input from the Goals Grid public workshops held on March 14, 2018 and March 22, 2018. The *Digital Appendix* includes a consolidated Goals Grid from each meeting.

Preserve/Achieve	**Housing Goals:** ▪ Develop more housing ▪ Develop more housing options: o E.g. smaller houses, modular homes, high end homes o E.g. more multifamily options: apartments, duplexes, townhomes, quadplexes ▪ Provide a variety of affordable housing options (rental & purchase, single-family & multifamily) ▪ Develop senior housing/living (e.g. retirement community, assisted living) ▪ Upgrade the living in Wharton; upgrade apartments ▪ Expand Mobile Home Ordinance; allow mobile homes **Economic Development/Central Business District (CBD) Goals:** ▪ Achieve more job opportunities & high wage jobs ▪ Achieve diversified & vibrant economy ▪ Develop more businesses: o Entertainment (e.g. movie theater, bowling, dancing, live music) o Retail (e.g. small, neighborhood shopping, big box, clothing stores) o Food service (e.g. Restaurants, food trucks) ▪ Promote Wharton as a college town ▪ Continue festivals & events (e.g. Wine & Arts Fair) ▪ Revitalize downtown & develop for tourism **Infrastructure/Service Goals:** ▪ Preserve community outreach facilities/partnerships ▪ Preserve existing institutions (e.g. WCJC) ▪ Improve school performance/facilities, provide vocational education, hire teachers from the community ▪ Preserve & expand existing public services (police, fire, EMS) ▪ Construct water, sewer, & roads with growth ▪ Improve electrical service (power goes out for long periods of time) ▪ Improve telecommunications services (faster, better service; more towers) ▪ Obtain high quality, full-service medical facility & mental health treatment facilities ▪ Expand City-offered animal welfare services: o Large animal shelter; policy for animals during floods; animal adoption program

Flooding/Drainage Goals:

- Improve drainage/flood control
- Construct levee
- Develop more curb & gutter

Land Use Goals:

- Keep Wharton a "college town"
- Preserve feel/character of Wharton (e.g. small-town, historic charm, nice entryway into Wharton)
- Preserve West End (housing & business)
- Preserve historical & government buildings
- Improve visual appearance (e.g. more beautiful city (landscape); better lighting; better signage)
- Assist residents with demolishing dilapidated buildings & neighborhood clean up
- Increase regulation: Zoning; (un)occupied building code (blight); more aggressive code enforcement; health code enforcement
- Pursue managed growth of both population & business
- Open land for future development
- Construct shelter for disasters
- Repurpose old jail
- Construct/permit mixed-use developments
- Construct new subdivisions, more housing

Mobility/Streets/Thoroughfares:

- Make Wharton a "walkable city"; construct more sidewalks
- Improve connectivity (e.g. moving about the city & to riverfront as well as thoroughfare connectivity)
- Improve road conditions (e.g. N. Fulton, West side streets)
- Address too narrow roadways
- Develop formal program for street maintenance & improvement
- Improve transportation services (e.g. expand mass transit; Uber)
- Preserve thoroughfares
- Preserve trees & sidewalks on FM 102 from Richmond Rd to Highway 59
- Add traffic signals (Mattie Street/Spanish Camp)

Recreation & Environment:

- Maintain a "good environment" in Wharton
- Preserve pecan trees
- Expand recycling
- Preserve & improve existing parks
    - Add lighting (e.g. Croom parks, Dinosaur park);
    - Replace damaged equipment (e.g. basketball nets);
    - Improve appearance (e.g. clean/repaint);
    - Provide basketball rental machine;

	o Expand parks/trails ▪ Develop new park o City park, large park, dog park, water park ▪ Develop recreational river use o Improve connectivity to riverfront; fishing; levee with fishing ▪ Develop/improve sports facilities o (Youth) sports complex; update football stadium; baseball/softball fields; soccer field ▪ Develop recreational opportunities for all ages o Family-oriented; senior community center; recreational center – things for kids to do ▪ Develop passive recreation facilities o Big, giant pavilion ▪ Develop more trail options: o Hiking; o Bike avenue around the city; bike trails; o Walking
Avoid/Eliminate	**Housing & Community Concerns:** ▪ Substandard & vacant buildings that are beyond repair ▪ Substandard multifamily rental housing (e.g. Hay Meadows) ▪ Additional low-income housing ▪ Crime ▪ Substandard school performance ▪ Stray Animals ▪ Overcrowding ▪ Substandard lot & yard maintenance (e.g. weedy yards, trash) **Economic Development & CBD Concerns:** ▪ Non-retail businesses around Monterrey Square (e.g. church, newspaper) ▪ Improperly located adult & adult entertainment establishments (e.g. bars, game rooms, sexually-oriented businesses) ▪ Business that create environmental issues (e.g. pollution from cotton gin or refineries) ▪ Hotels, rundown motels ▪ Fast food **Mobility Concerns:** ▪ (Heavy) traffic, especially on FM 102 & because of train crossing ▪ Substandard road/street conditions **Drainage & Flooding Concerns:** ▪ Water in the city ▪ Constant flooding **Recreation & Environmental Concerns:**

	▪ Dog Parks ▪ Businesses that create environmental issues (e.g. pollution from cotton gin or refineries) ▪ Tree issues

2 Population Analysis

Comprehensive plans include estimates of current and future population because the size and rate of a community's growth affects planning for community facilities and services. Information for the population analysis comes from the United States Census Bureau, the Texas State Data Center, the Texas Water Development Board, and a survey of the community's occupied houses.

2.1 Highlights

The city of Wharton is located at the intersection of US 59 and SH 60, approximately 57 miles southwest of Houston, in the Houston-Galveston Area Council (H-GAC) region.[2] Incorporated in 1902, Wharton is a home rule city[3] with a mayor-council form of government. The city of Wharton is also the county seat of Wharton County.

The Wharton area was initially settled as a plantation community in 1846 by some of Stephen F. Austin's "Old Three Hundred" colonists. By the early 1850s, Wharton was home to settlers from across the United States and around the world. The arrival of the New York, Texas, and Mexican Railway (1881) and the Gulf, Colorado, and Santa Fe Railway (1899) further supported population growth. The population continued to expand throughout the 20th century, as did local institutions and business. By the 1980s, the city had a public library, a junior college, a local theater, and a diverse array of businesses including health care, manufacturing, and agricultural services. Wharton's population has remained relatively stable over the past 30 years, fluctuating around 9,000 residents.

Table 2A: Population (1960 – 2018)

Year	Wharton	Wharton County	State of Texas
1960	5,734	38,152	9,579,677
1970	7,881	36,729	11,196,730
1980	9,033	40,242	14,229,191
1990	9,011	39,955	16,986,540
2000	9,237	41,188	20,851,820
2010	8,832	41,280	25,145,561
2018 (estimate)	9,063		

Source: US Census Bureau, Profile of Demographic Characteristics, 1960 – 2010; GrantWorks 2018 estimate

[2] The H-GAC is a voluntary association of local governments in the 13-county Gulf Coast Planning Region of Texas. For more information visit http://www.h-gac.com/home/residents.aspx.
[3] A home rule city is a city that has adopted a home rule charter for their local governance. For more information visit https://www.tml.org/pdftexts/HRHChapter1.pdf.

During the last decade (2000-2010) Wharton's population change decreased by 4.4%, or -405 residents (*see Table 2A, previous page).* In terms of age distribution, Wharton's resident population became slightly older; residents 45 and over comprised a slightly larger percentage of the population than in 2000. Changes in Wharton's age distribution are likely the result of natural population changes – new births and/or current residents passing away - but also out-migration of previous residents, particularly young adults.

The estimated 2018 population for the city of Wharton is 9,063, a 2.6% population increase (231 residents) since 2010. The population estimate is derived from fieldwork findings (2017) regarding the number of occupied homes and the average household size in the city of Wharton according to the 2010 US Census.

This study projects that Wharton's population will experience moderate growth over the next 10 years, reaching approximately 11,120 residents in 2028.

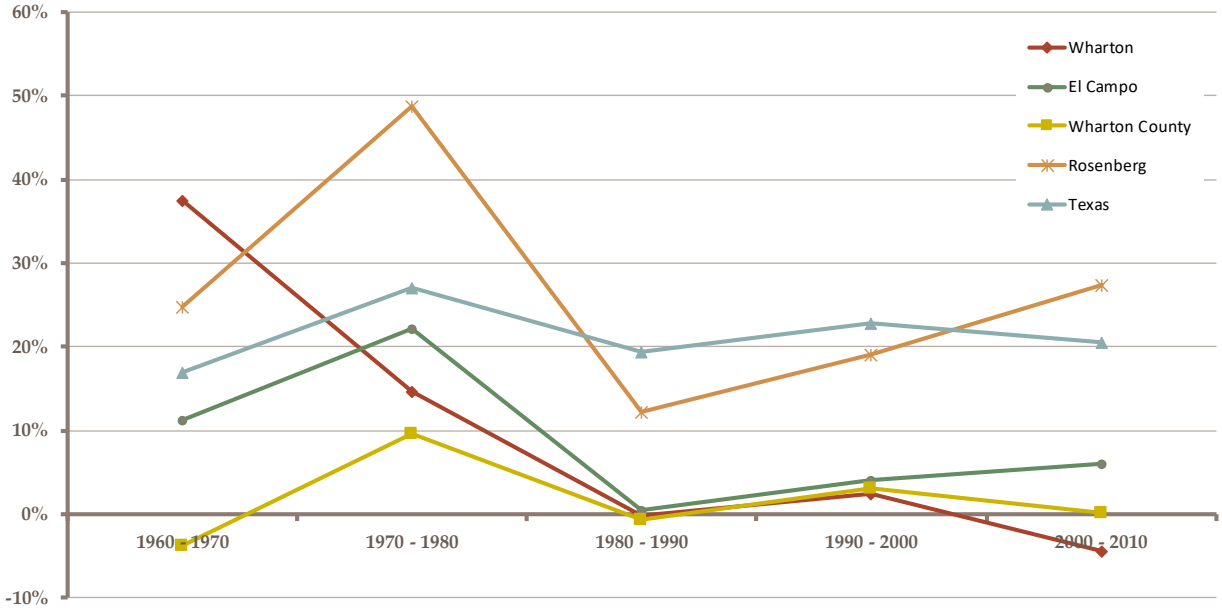
2.2 Conditions

Overall Population Changes

Chart 2A (next page) illustrates the rate and direction of population change in Wharton, Wharton County, and the state of Texas over the past five decades. As the chart demonstrates, after a period of notable growth during the 1960s, the population of the city sharply decreased and then stagnated. Average annual population growth was -0.02% between 1980 and 1990. The population grew again 1990s but was followed by a decrease in residents during the 2000s. Although initially very different, population changes in the city of Wharton and Wharton county were similar over the last three decades. These changes also reflect population changes for the state of Texas during the same period (in general trajectory, but not in rate).

Chart 2A (next page) also illustrates the rate and direction of population changes in the nearby cities of El Campo (Wharton County) and Rosenberg (Fort Bend County). El Campo is located approximately 13 miles south of Wharton at the intersection of US 59 and SH 71 and Rosenberg is located approximately 32 miles northeast, closer to Houston. As the chart demonstrates, the rate of population changes in El Campo was notably lower than changes in Rosenberg, but the trajectory of the changes were very similar. Population changes in the two cities differ from changes in the city of Wharton. Negative population change in Rosenberg and El Campo started a decade later than in Wharton. In addition, population growth was positive in both cities during the 2000s, while the population in Wharton decreased.

Chart 2A: Historical Population Change (1960 – 2010)

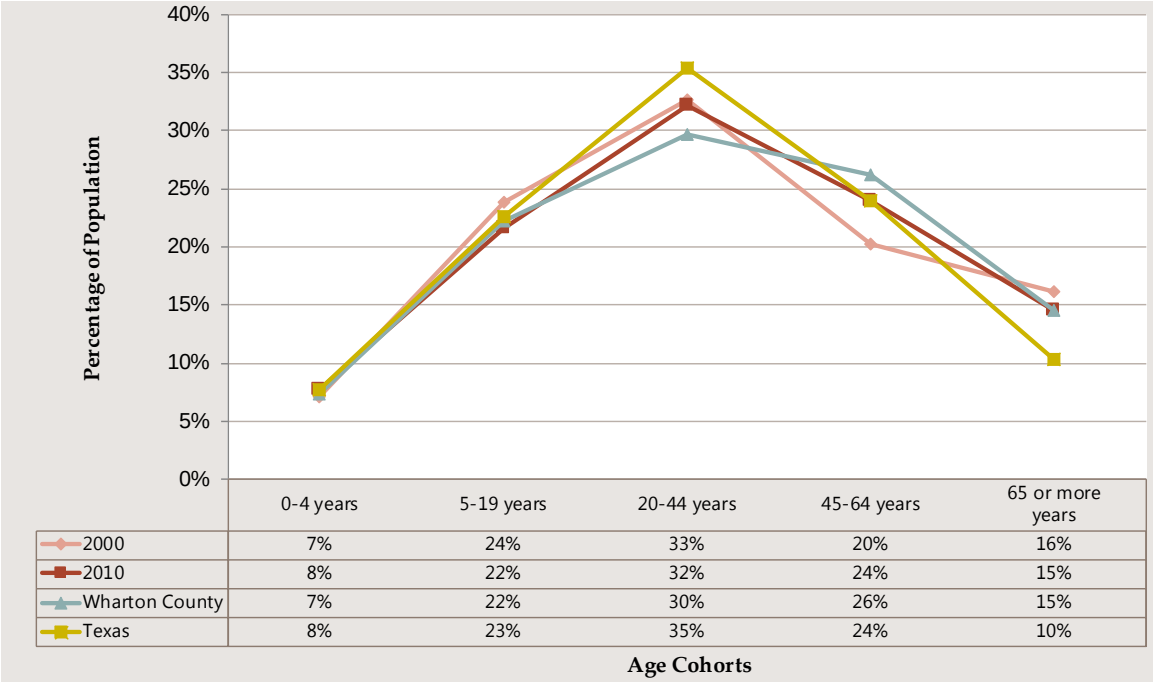


Source: 2000 and 2010 Census of Population and Housing

Age Distribution

Chart 2B (next page) illustrates age cohort distributions for Wharton (2000 and 2010), Wharton County (2010), and the state of Texas (2010). An age distribution peaked by the 20-to-44-year-old age cohort generally indicates a stable-to-expanding or "healthy" population distribution. The 2010 Texas distribution is an example of "healthy" population change. In contrast, a flatter distribution can indicate relatively stationary or declining population change. As the chart demonstrates, the city of Wharton's age distribution in 2000 was pyramid-like. Adults over 44 comprised a somewhat larger percentage of the population than residents under 20, but adults 20-to-44-years of age comprised approximately 1/3 of the population. Wharton's age distribution in 2010 was very similar but residents over 44 comprised a slightly large percentage of the population.

Chart 2B: Age Distribution (2000, 2010)



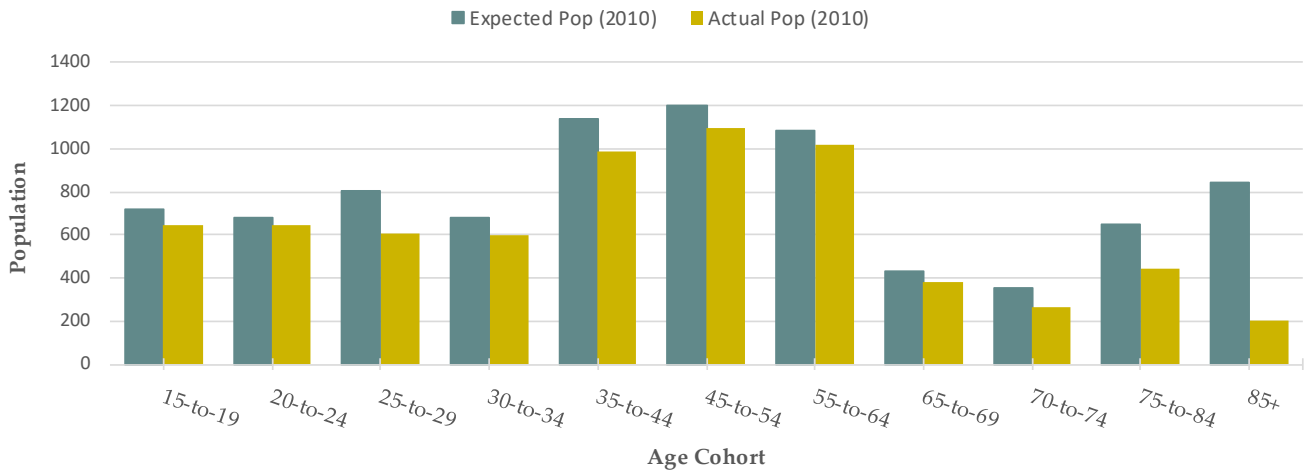
	0-4 years	5-19 years	20-44 years	45-64 years	65 or more years
2000	7%	24%	33%	20%	16%
2010	8%	22%	32%	24%	15%
Wharton County	7%	22%	30%	26%	15%
Texas	8%	23%	35%	24%	10%

Source: 2000 and 2010 Census of Population and Housing, Summary Population and Housing

Population changes are usually the result of both migration - residents moving to or leaving a city - and natural changes – new births or current residents passing away. Examining the relative impact of these factors provides more nuanced understanding of recent population change. *Chart 2C (next page)* compares the city of Wharton's expected 2010 population (organized by age group) with the actual population figures from the 2010 Census (also organized by age group). The expected population in each group is based on the aging of individuals living in Wharton in 2000. For example, the expected population of 20-to-24-year-olds in 2010 is the population that was 10-to-14 years-old in 2000. A higher than expected 2010 population suggests that new residents in the age group moved to Wharton between 2000 and 2010. In the case of residents under the age of 15, this could also indicate natural population growth (new births to parents already living in the city). A lower than expected 2010 population could be the result of a several factors, namely mortality and/or previous residents moving away.

Comparison of the actual and expected 2010 population by age group suggests that some of the residents living in Wharton in 2000 likely left or passed away over the last decade. The actual 2010 population was slightly lower than expected in each age group (see *Chart 2C*). The actual population of residents over 69 was particularly lower than expected. In addition, the actual population of residents aged 25-to-29 was notably lower than expected. It is important to note that these are only general reference figures to identify potential trends. The comparison captures only overall changes. For example, the overall number of residents in a given age group may not have changed but several residents could have moved away from Wharton and been "replaced" by new families with fewer children.

Chart 2C: Expected & Actual 2010 Population, by Age Group



Source: 2000 and 2010 Census of Population and Housing, Summary Population and Housing

Race & Ethnicity

The U.S. Census distinguishes between two minority population groups: "racial minorities" - all non-"White" residents - and "ethnic minorities" - all "Hispanic or Latino" residents. *Table 2B (next page)* provides a population profile of residents in the city of Wharton, as well as Wharton County, in terms of race and ethnicity. As the table demonstrates, racial minorities comprised a slightly higher percentage of Wharton residents in 2010 than in 2000. This change appears to result from both a decrease in the "White" population and an increase in several non-White populations, primarily in the number of residents that identify as "Other". Ethnic minorities also comprised a higher percentage of residents in 2010 compared to 2000. In terms of relative representation, the city of Wharton is more racially and ethnically diverse than Wharton County.

As shown on *Map 2A: Population Distribution 2018 and 2028* and discussed further in *Chapter 3: Housing Study*, the city of Wharton has several areas of high minority concentration. An "Area of High Minority Concentration" is defined by the State of Texas as "a census block group that consists of 65% or more of minorities".[4] Minorities include all racial and ethnic population groups other than 'White, non-Hispanic (Anglo)'". Census data is not available to map the locations of other protected classes for towns or cities with fewer than 20,000 residents. *Appendix 2A: Project Beneficiaries* includes additional data regarding racial minorities in the city of Wharton.

[4] The "65 percent threshold" is based on the definition of "an area of minority concentration" used by the Texas General Land Office in its 10/1/2012 publication**, "**Homeowner Opportunity Program Guidelines - CDBG Disaster Recovery Program - Hurricanes Ike & Dolly, Round 2."

Table 2B: Population Change by Race & Ethnicity (2000, 2010)

Characteristic	Wharton				Wharton County	
	2000		2010		2010	
	%	#	%	#	%	#
Total Population	*100%*	**9,237**	*100%*	**8,832**	*100%*	**41,280**
Race						
White	*56%*	5,203	*53%*	4,690	*72%*	29,793
Black or African American	*26%*	2,441	*27%*	2,415	*14%*	5,817
American Indian, Alaskan Native	*0.4%*	38	*0.6%*	55	*0.4%*	161
Asian	*0.7%*	66	*0.6%*	51	*0.4%*	160
Native Hawaiian / Hawaiian / Another Pacific Islander	*0.2%*	15	*0.01%*	1	*0.005%*	2
Other	*14%*	1,310	*16%*	1,410	*11%*	4,596
Two or More Races	*2%*	164	*2%*	210	*2%*	751
Ethnicity						
Hispanic or Latino	*31%*	2,871	*39%*	3,477	*37%*	15,445
Not Hispanic or Latino	*69%*	6,366	*61%*	5,355	*63%*	25,835

Note: Figures may be rounded to next whole number

Source: U.S. Census Bureau.

2.3 Population Projections, Growth Scenarios, & Forecast

Population Projections

Population projections inform federal, state, and local funding decisions about facilities such as highways, sewage treatment plants, and schools. Population projections are typically based on historical trends ranging from the population changes in the most recent decade to changes over the past century or more. While historical trends can provide valuable information, they are not the sole indicators of future growth.

Therefore, projections may also incorporate estimated changes based on factors such as public facilities, location along routes to employment centers, ability to annex surrounding areas located in the ETJ, and expected new subdivisions/developments. For Wharton, the city's proximity to Houston and the planned expansion of US-59 and conversion into I-69 require consideration.

Planners considered several population projections, based on differing methods, to help guide the planning recommendations for the city of Wharton in this comprehensive plan.

- Extrapolation of Texas State Data Center (TSDC) cohort population projections and growth scenarios for Wharton County (adjusted by the city of Wharton's relative population)
- Geometric extrapolation of recent Census data (2000, 2010)
- Linear regression analysis of Census data (1930-2010)
- Texas Water Development Board (TWDB) Municipal Water User Group Projections (2016)
- Texas Water Development Board (TWDB) Regional Water Supply Study (2017)

Appendix 2B provides a more detailed discussion of the population projection methods and findings.

Growth Scenarios

Planners considered two growth scenarios for the city of Wharton over the planning period (2018-2028). The first growth scenario assumes that population growth over the next 10 years will follow historical trends. The projected population for this scenario is based on the city of Wharton's average historical share of population growth in Wharton County from 1970 to 2010 applied to the Texas State Data Center (TSDC)'s half growth (0.5) cohort population projection for Wharton County; the half growth (0.5) pattern assumes half of the growth the county experienced between 2000 and 2010. Additional information about the TSDC's methods and alternative projections included in *Appendix 2B*.

The second scenario assumes that Wharton will experience a sizable growth increase towards the end of the planning period due to the expansion of the Houston urban area and as a result of I-69's continuing development. The projected population for this scenario is from a joint regional water supply study for the city of Wharton and the city of East Bernard completed for the Texas Water Development Board in April 2017. The study is based on an alternative projection from the TWDB intended to incorporate the anticipated influence of the Houston urban area's expansion beyond Harris county and along US-59 (TWDB projection methods further discussed in the *Appendix 2B*).

Population Forecast

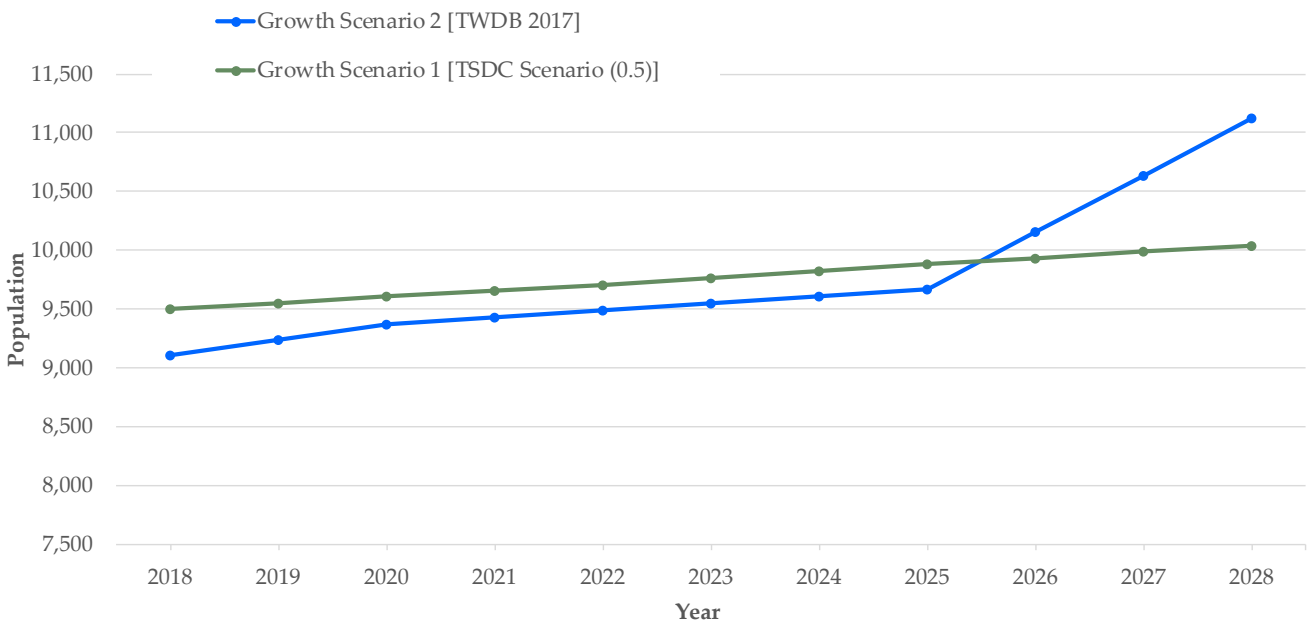
Chart 2D illustrates the population projections for both growth scenarios as well as population data from the US Census and the 2018 population estimate for this plan. The population projection for Growth Scenario 1 is based on a 22.06% share of the half growth scenario (0.5) population projection for Wharton County for 2018 through 2028. Based on this method Wharton's rounded projected 2028 population is 10,040 residents. The population projection method for Growth Scenario 2 continues the TWDB Regional K water planning projected growth for a 10-year period, after which time it assumes 5.0% linear average annual growth rate.[5] Wharton's 2028 rounded population based on the TWDB 2017 water study projection is 11,120 (see *Chart 2D*).[6]

Chart 2D: Growth Scenario Projections (2018-2038)

5 The 5% average annual growth rate is based on average annual growth of suburban cities in Harris county over the past 50 years.
6 The TWDB regional water supply study provides population projections in five-year increments, beginning with 2015. Therefore, the population figure for alternative years such as 2018 and 2028 are estimates based on average annual population changes between the five-year increments. For example, the 2018 population is based on the average annual population change between the 2015 TWDB projected population (8,726) and the 2020 TWDB projected population (9,372).

As the *Chart 2E* demonstrates, differences between the two projections are minimal for most of the planning period. In fact, Growth Scenario 2 projection does not start to notably diverge from Growth Scenario 1 until 2026. Nonetheless, planners determined that selecting a scenario that incorporates the previously mentioned growth drivers will be important for ensuring that Wharton and its residents can enjoy sufficient access to needed infrastructure and services in the future.

Chart 2E: Growth Scenario Projections (2018-2028)



Therefore, the preferred projection for this comprehensive plan is the projection based on the 2017 Texas Water Development Board projections for Wharton, Texas. This study projects that Wharton's population will experience moderate growth over the next 10 years, reaching approximately 11,120 residents by 2028.

2.4 Appendix 2A: Project Beneficiaries

Table 2A.1 contains information required by the U.S. Department of Housing and Urban Development (HUD) in the fulfillment of this planning grant. The numbers detailed for project beneficiaries below may not correspond exactly to the numbers presented in *Table 2B above*. This difference is because HUD grant programs generally require at least a 51% low-to-moderate community income level to qualify for funding. However, the Census does not collect income level data from all respondents. Instead, the Census derives incomes levels from a 1-in-6 sample and weighted to represent the total population. Race beneficiary numbers are then mathematically derived to correspond to income beneficiary numbers. When Census income level estimates seem too high, extra door-to-door surveys are conducted in communities to verify a 51% low-to-moderate income level. Because the income tabulation is slightly different for the grant application, the resulting numbers generally do not correspond to the 100% population samples represented in *Table 2A.1.*

Table 2A.1: Beneficiary Report

Total Project Beneficiaries 8,475 Male 4,201 Female 4,274

Race	Non-Hispanic	Hispanic Ethnicity Also	Total
White	2,116	3,461	5,557
Black/African American	2,491	47	2,538
Asian	19	0	19
American Indian/Alaskan Native	0	0	0
Native Hawaiian/Other Pacific Islander	0	0	0
American Indian/Alaskan Native & White	12	3	15
Asian & White	0	0	0
Black/African American & White	89	25	114
American Indian/Alaskan Native & Black/African American	0	0	0
Other Multi-Racial	41	171	212
		Grand Total	*8,475*

Income Level	No. of Persons
Very Low (at or below 30% of the AMFI)	n/a
Low (31-50% of the AMFI)	n/a
Moderate (51-80% of the AMFI)	n/a
Non-Low/Moderate (above 80% of AMFI)	n/a
Total	**8,475**
Subtotal – All Low/Mod	***4,520 (53.33%)***

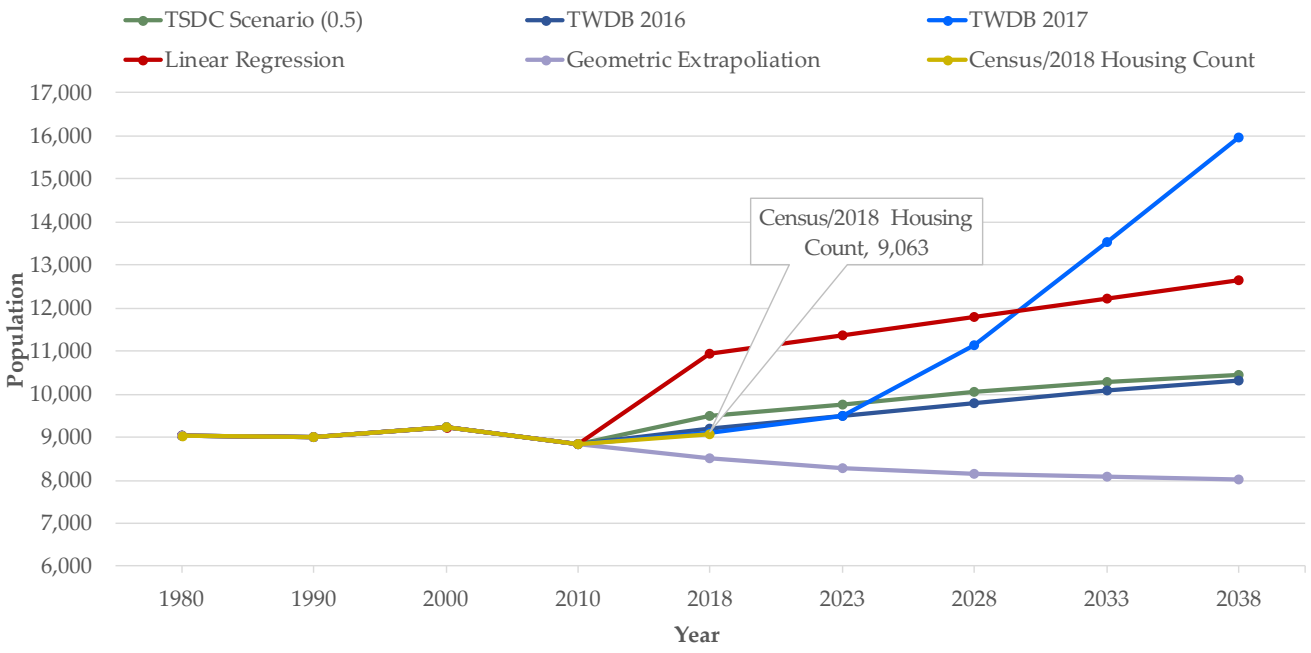
2.5 Appendix 2B: Population Projection Methods

Planners considered several population projections, based on differing methods, to help guide the planning recommendations for the city of Wharton in this comprehensive plan.

- Extrapolation of Texas State Data Center (TSDC) cohort population projections and growth scenarios for Wharton County (adjusted by Wharton's relative population)
- Geometric extrapolation of recent Census data (2000, 2010)
- Linear regression analysis of Census data (1930-2010)
- Texas Water Development Board (TWDB) Municipal Water User Group Projections (2016)
- Texas Water Development Board (TWDB) Regional Water Supply Study (2017)

Chart 2B.1 illustrates each of the above-referenced projections for the city of Wharton. The following sections describe each projection in further detail.

Chart 2B.1: Population Projection Comparison (1980 - 2038)



The following sections describe the methods informing each of the projections in more detail, as well as the reasons for selecting the preferred population projection.

Cohort Extrapolation

Population estimates identify changes to the city's population and provide a benchmark to guide population projections and forecasts. The Texas State Data Center (TSDC) periodically issues population estimates for all incorporated places in the state; the TSDC's system provides a baseline for the cohort extrapolation projection produced as part of this study. The TSDC uses a combination of the Ratio-Correlation (symptomatic), Cohort Component, and Housing Unit Methods to calculate estimates and projections.

- The **Ratio-Correlation Method** is based on factors such as county-level birth and death data, public and private school enrollment, voter registration, and vehicle registration. The method utilizes multiple regression techniques with the ratio of variable values for adjacent time periods rather than simply using the variable values themselves as independent and dependent variable.

- The **Cohort-Component Method** bases its calculations on each age group, or cohort, used in the Census process. Projections rely on data that describe county-level birth and death rates and elementary school enrollments.

- The **Housing Unit Method** employs the formula P = (H*PPH) + GQ. Where P = total population, H = occupied housing units, PPH = average number of persons per household, and GQ = population in group quarters. The TSDC housing unit method also considers building permit and demolition data in cities and counties that issue building permits. For cities and counties that do not issue building permits, the TSDC estimates housing changes using Census estimates and housing changes in nearby areas to arrive at a projection.

The TSDC produces three possible growth patterns that project population based on different assumed migration patterns. These include a projection that assumes no growth because in-migration and out-migration are equal (0.0); a pattern that assumes half of the growth the county experienced between 2000 and 2010 (0.5); and a pattern that assumes the same growth as the county experienced from 2000 to 2010 (1.0). Based on the TSDC projections, Wharton's projected population 2028 is 10,006 (0.0), 10,042 (0.5), 9,887 (1.0) (see *Chart 2B.1* for 0.5 projection).

Geometric Extrapolation

The geometric extrapolation model operates on the assumption that population will change by the same percentage in each future year as the average annual change over the base period (2000-2010). The city of Wharton's average annual growth rate during the base period was 0.96%. Wharton's projected 2028 population based on geometric extrapolation is 8,147 residents (*see Chart 2B.1).*

Linear Regression

A linear regression attempts to model the relationship between two or more variables by fitting a linear equation to the observed data. One variable is considered as an explanatory variable (time) and the other is considered as a dependent variable (population change). Linear regressions help to adjust for short term fluctuations over time to identify longer-term trends. Wharton's projected 2028 population based on a linear regression is 11,788 residents (*see Chart 2B.1).*

Texas Water Development Board

The Texas Water Development Board (TWDB) provides population projections for "Municipal Water User Groups" which include:

- Cities with a 2010 population greater than 500;
- Select Census Designated Places, such as military bases and in counties with no incorporated cities;
- Utilities (areas outside the places listed above) providing more than 280 acre-feet of municipal water per year);
- Collections of utilities with a common water supplier or water supplies (Collective Reporting Units); and
- Remaining rural, unincorporated population summarized as "County-Other".

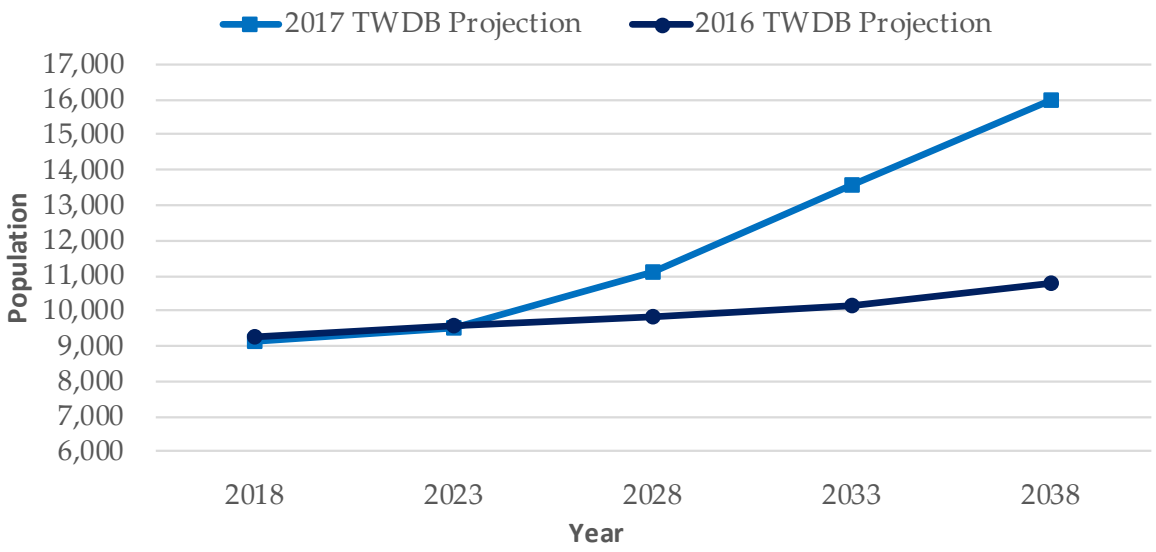
Municipal water user group ("MWUG") projections are taken from county-level projections based on projections from the Texas State Data Center (TSDC) / Office of State Demography (*see Cohort Extrapolation above*). County-level projections are based on the TSDC half-migration scenario, but alternative scenarios are selected where more reflective of anticipated growth patterns. Projections for individual MWUGs are developed by allocating growth from the county-level projections according to the following methods:

- Share of Growth – applying the MWUG's historical (2000-2010) share of the county's growth to future growth;
- Share of the Population – applying the MWUG's historical share (2000-2010) of the county population to the projected county population; and
- Constant Population – applied to military bases and other water user groups that had population decline between 2000 and 2010 in county with overall population growth.

The sum of all MWUG populations within a county is reconciled to the total county projection. The TWDB provides population projections in 10-year increments, beginning with 2020. More information about MWUG population projection methods and methodology is available at https://www.twdb.texas.gov/waterplanning/data/projections/.

The TWDB produced a population projection for the city of Wharton as part of the 2016 Region K Water Plan. However, TWDB created an alternative projection for the city of Wharton as part of a joint Regional Water Supply Study completed for the city of Wharton and the city of East Bernard in April 2017. The alternative projection is intended to incorporate the anticipated influence of the Houston urban area's expansion beyond Harris County and along US-59 to "suit the purpose of this study by providing a conservative, consistent target for evaluating future water supply alternatives". The projection continues the previous TWDB projected growth from 2015 to 2025 (roughly 0.6% annual growth), after which time a 5.0% linear average annual growth rate is assumed. The study provides population projections in five-year increments, beginning with 2015. *Chart 2B.2* compares the 2016 and 2017 TWDB population projections.

Chart 2B.2: TWDB Projections (2018 - 2038)



3 Housing Study

The Housing Study analyzes the location and condition of Wharton's housing stock. It identifies the various types of housing, including multifamily (apartments, duplexes, etc. and government-funded units), single-family (the typical house), and mobile/manufactured homes, and examines fair housing-related characteristics of the city's housing stock. The study lists issues that need to be addressed, actions municipal authorities should take, and resources available for improving local housing.

3.1 Highlights

Single-family, stick-frame housing characterizes Wharton's housing stock and most units in the city are in standard condition). In addition, the residential vacancy rate is moderate.[7] However, the city faces several challenges for maintaining and further developing a healthy housing stock. Approximately 1/3 of Wharton's housing stock is in substandard condition (i.e. deteriorating or dilapidated condition). In addition, nearly all substandard houses are occupied. Support is needed in particular for residents of deteriorating and dilapidated stick-frame houses. In relative terms, the condition of mobile/manufactured housing is worse than the other housing types; much of the mobile/manufactured housing in Wharton is in deteriorating condition. Support for housing maintenance and repair will be important for ensuring that the condition of these units does not further deteriorate. The City has two ongoing methods for assisting residents with single-family housing condition: HOME program grants and enforcement of City ordinances to make sure that housing and lots meet high standards. *Map 3A: Housing Conditions 2018* shows the location of housing by type and condition.

The City has numerous multifamily units including duplexes, triplexes, quadplexes, and apartments, mostly in standard condition. Renters occupy most of the multifamily units. However, in light of Wharton's large rental market (nearly 1/2 of the population), the City should continue to pursue additional multifamily development opportunities. The City should also further pursue affordable housing development. Although several multifamily complexes in Wharton provide additional affordable housing through income-limits and average housing costs for renters are affordable, demand for these units is very high. The City should also pursue development of affordable units for purchase.

[7] Estimated vacancy rate derived from the average of the 2010 US Census vacancy rate and the 2017 vacancy rated based on windshield observations (further discussed in *Section 3.3.).*

Average housing costs for homeowners with a mortgage in Wharton are unaffordable. Additional affordable housing, both rental and for purchase, will be important for ensuring that Wharton remains a place for residents of diverse incomes and life stages as development pressures from the expanding Houston Urban Area and the continuing I-69 construction impact land values.

On August 25, 2017, Hurricane Harvey made landfall near the Texas Gulf Coast. The Category 4 hurricane's slow movement over the next several days led to catastrophic flooding in southeast Texas. In Wharton, four days after Harvey made landfall, the banks of the Colorado River surged resulting in persistent flooding that covered areas of the city for several days. The hurricane and resulting flooding dramatically impacted structural conditions in the city, particularly in Wharton's "West End".

3.2 Context: History & Community Input

Previous Studies

Wharton has no previous housing studies. However, the Wharton Economic Development Corporation publishes relevant information under the Community Profile section to its website. The most recent report is the 2017 Community Demographic Profile which includes estimated housing units; estimated occupied housing units; average length of residence; and housing units by value and structure age. More information is available at http://whartonedc.com/our-community/community-profile/.

Community Input

Housing goals expressed by residents in *Chapter 1: Community Goals & Objectives* are:

Achieve/Preserve	Avoid/Eliminate

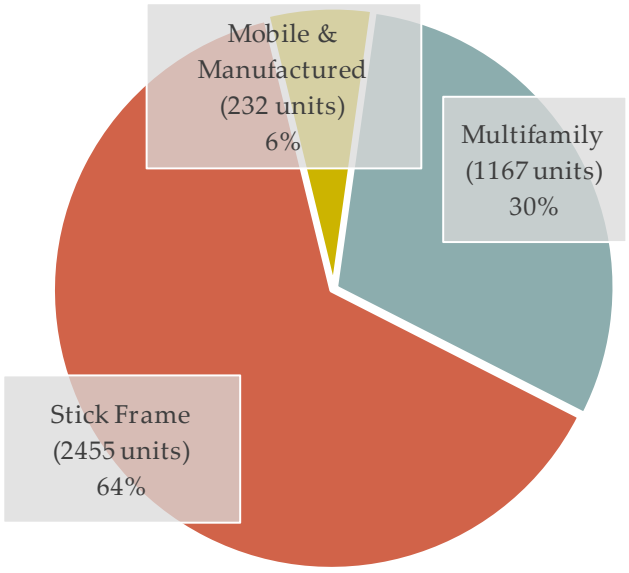
▪ Develop more housing
▪ Develop more housing options:
  o E.g. smaller houses, modular homes, high end homes
  o E.g. more multifamily options: apartments, duplexes, townhomes, quadplexes
▪ Provide a variety of affordable housing options (rental & purchase, single-family & multifamily)
▪ Develop senior housing/living (e.g. retirement community, assisted living)
▪ Upgrade the living in Wharton; upgrade apartments
▪ Expand Mobile Home Ordinance; allow mobile homes
	▪ Substandard & vacant buildings that are beyond repair
	▪ Substandard multifamily rental housing (e.g. Hay Meadows)
	▪ Additional low-income housing
	▪ Stray Animals
	▪ Overcrowding
	▪ Substandard lot & yard maintenance (e.g. weedy yards, trash)

3.3 Inventory & Forecast

Housing Condition

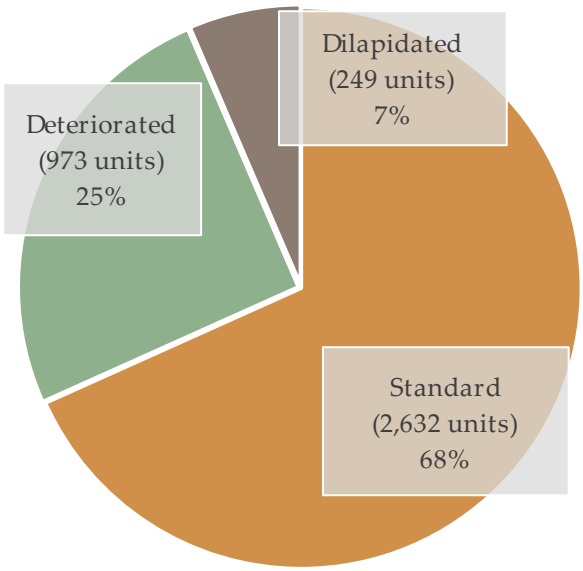
Single-family, stick-frame housing characterizes Wharton's housing stock (64%) and most units in the city are in standard condition (68%). However, Wharton faces several challenges for maintaining and further developing a healthy housing stock. Approximately 1/3 of the city's housing stock is in substandard condition (i.e. deteriorating or dilapidated condition) (*see Chart 3A and Chart 3B*). In addition, nearly all substandard homes are occupied (92%). Support is needed in particular for residents of deteriorating and dilapidated stick-frame houses; approximately 87% of occupied, substandard houses in Wharton are stick-frame structures (see *Table 3A, next page*) (*see Chart 3A and Chart 3B*).

Chart 3A: Houses by Type



Source: GrantWorks, Inc. Fieldwork 2017

Chart 3B: Houses by Condition, All Types



Source: GrantWorks, Inc. Fieldwork 2017

In relative terms, the condition of mobile/manufactured housing is worse than the other housing types. While most stick-frame and multifamily units are in standard condition (63%), most mobile/manufactured housing in Wharton is in deteriorating condition (61%) (see *Table 3A, next page*). Support for housing maintenance and repair will be important for ensuring that the condition of these units do not further deteriorate. Although less durable than well-constructed, stick-frame houses, when in compliance with HUD and building codes, manufactured houses can provide affordable, safe housing.

Table 3A: Housing Condition, Type, & Occupancy Rates

Unit Condition & Type	All Units		Occupied Units	
	#	%	#	%
Stick-Frame	**2,455**	**-**	**2,375**	**-**
Standard	*1,544*	*63%*	*1,534*	*62%*
Deteriorating	695	28%	671	27%
Dilapidated	216	9%	170	7%
Mobile/Manufactured	**232**	**-**	**218**	**-**
Standard	65	28%	65	28%
Deteriorating	*142*	*61%*	*134*	*58%*
Dilapidated	25	11%	19	8%
Multifamily (Excluding Institutional)	**1,167**		**1,032**	
Standard	*1,023*	*88%*	*906*	*78%*
Deteriorating	136	12%	122	10%
Dilapidated	8	1%	4	0%
Total Substandard Units	1,222	32%	1,120	31%
Total Units	**3,854**	**-**	**3625**	**94.1%**

Source: GrantWorks, Inc., Fieldwork 2017

The City has two ongoing methods for assisting residents with single-family housing condition: HOME program grants and enforcement of City ordinances (*see Section 3.6.2*).

Vacancy Rate

U.S. Census data from 2010 indicates that 11.7% of the houses in Wharton were vacant in 2010. Fieldwork windshield observations from 2017 indicate a 5.9% vacancy level. Active water connection data from the City of Wharton suggests a slightly higher vacancy rate – 12.6%.

Several caveats should be considered. Windshield observations are necessarily limited to observation of external and readily apparent housing characteristics and therefore may miss some units. Windshield observations may undercount vacant structures in better condition because it is easier to identify vacant housing that is deteriorating/dilapidated than vacant housing that is in standard condition. For example, several homes throughout the community had "For Sale" signs posted. Unless otherwise apparent, it was assumed that these structures were occupied. However, the possibility exists that these structures, and other structures in an externally standard condition, were in fact vacant. As a result, the vacancy rate based on windshield observations may be somewhat understated.

Considering differences in these figures, the estimated vacancy rate for this study is derived from the average of the 2010 U.S. Census vacancy rate and the 2017 vacancy rate based on windshield observations. ***Wharton's estimated residential vacancy rate is 8.8%, or approximately 1-in-12 houses.***

Vacant Structures

Vacant structure conditions somewhat reflect Wharton's overall housing stock conditions. Forty-five percent (45%) of the 229 vacant units identified during fieldwork are in substandard condition. Nearly one-quarter of the vacant units have significant problems such as holes in exterior walls, missing window panes, cracked foundation, etc. (i.e. "dilapidated condition") (see *Table 3B*). Vacant, dilapidated housing increases the risks to public health and welfare and should be removed. Particular support is needed to remove vacant, dilapidated stick-frame units. Financial and technical support will likely also be needed to improve the remaining 10% of vacant residential structures in Wharton in deteriorating condition (i.e. requiring repair beyond routine maintenance).

Table 3B: Vacant Housing Condition & Type

Unit Condition & Type	Vacant Units	
	#	%
Standard	**127**	**55%**
Stick-Frame	10	8%
Mobile/Manufactured	0	0%
Multifamily (Excluding Institutional)	117	92%
Deteriorating	**46**	**10%**
Stick-Frame	24	109%
Mobile/Manufactured	8	36%
Multifamily (Excluding Institutional)	14	64%
Dilapidated	**56**	**24%**
Stick-Frame	46	82%
Mobile/Manufactured	6	11%
Multifamily (Excluding Institutional)	4	7%
Total Substandard Units	102	45%
Total Units	**229**	**-**

Source: GrantWorks, Inc. Fieldwork 2017

These findings support one of the key housing goals identified by Wharton residents: to eliminate substandard and vacant buildings that are beyond repair.

Multifamily Housing

Fieldwork identified 1,167 multifamily units located in the city of Wharton and 10 additional units located in the ETJ (a duplex and an eight-unit apartment complex). *Table 3C (next page)* provides information about the multifamily units located within the city limits. As the table demonstrates, multifamily structures include duplexes, triplexes, quadplexes, and apartments. Most of the units are in apartment complexes that range in size from 7 to 256 total units. Approximately 88% of the units are in standard condition. In relative terms, apartment complex units are in better condition; while approximately 92% of apartment complex units are in standard condition, more than 1/2 of the units in other structure types are in deteriorating condition (57%). As *Table 3C* shows, several apartment complexes provide affordable housing in the form of income-limited units. Several complexes also provide ADA accessible units as well as units with two or more bedrooms, indicating opportunities for residents with a physical disability and families (*see Fair Housing Analysis below*). Occupancy levels are high; an estimated 89% of all multifamily units are occupied.

Multifamily structures are located throughout the city of Wharton. However, there are fewer multifamily units available west of the railroad tracks. Most of the apartment complexes are located close to schools and/or arterial roads. Due to the greater density, multifamily structures in central Wharton tend to be duplexes (see *Existing Land Use Map (4A)*). Structure ages vary. According to available Wharton County Appraisal District data, Wharton's multifamily structures were built between 1920 and 2000. However, most of the structures are 25 or more years old (93%). A small majority of the structures (46%) are 25-50 years old (i.e. built between 1993 to 1963). The average structure age is 55 years (1963). Notably, 20% of the structures are more than 75 years old (i.e. built before 1942).

Residents would like to see more housing and more housing options developed in Wharton, including a variety of multifamily housing (apartments, duplexes, townhomes, quadplexes, etc.)

Table 3C: Multifamily Housing Condition & Occupancy Rates

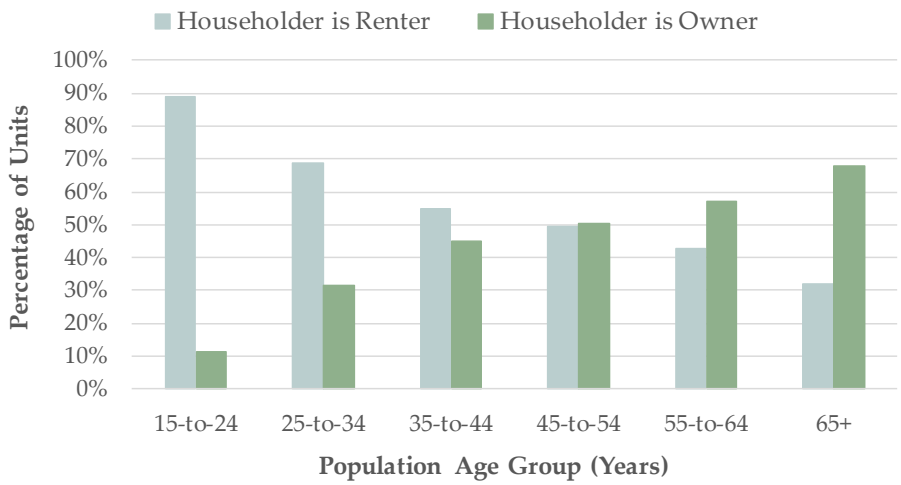
Name	Condition	# of Units	Occupied	Vacant	# Income-limited
Briar Pointe Apts.	Standard	256	164	92	-
Caney St Apts. 1	Standard	7	7	-	n/a
Caney St Apts. 2	Deteriorating	16	15	1	-
Country Club Apts.	Standard	50	49	1	-
Fountainhead PHA Apts.	Deteriorating	40	37	3	40
Heritage House Apts. A	Deteriorating	4	4	-	n/a
Heritage House Apts. B	Standard	4	4	-	n/a
Kingston Dr. Apts.	Deteriorating	24	24	-	n/a
Meadows Apts.	Standard	82	81	1	82
Mill Creek Apts.	Standard	108	105	3	-
Morning Star Apts.	Standard	40	40	-	39
Oakhaven Apts.	Standard	48	48	-	-
Pecan Village Apts.	Standard	82	80	2	81
Red River Apts.	Standard	100	94	6	-
River Bend Apts.	Standard	104	96	8	-
Speed St Apts.	Deteriorating	8	-	8	n/a
Sweetwater Apts.	Standard	56	54	2	-
Wharton Plaza Apts.	Standard	24	24	-	24
Wharton Square Apts.	Standard	40	40	-	40
Duplexes (Standard Condition)	Standard	18	16	2	n/a
Duplexes (Deteriorating Condition)	Deteriorating	26	24	2	n/a
Quadplexes (Standard Condition)	Standard	4	4	-	n/a
Quadplexes (Deteriorating Condition)	Deteriorating	12	12	-	n/a
Quadplexes (Dilapidated Condition)	Dilapidated	8	4	4	n/a
Triplexes	Deteriorating	6	6	-	n/a
Duplexes (Standard Condition)	Standard	18	16	2	-
Duplexes (Deteriorating Condition)	Deteriorating	26	24	2	n/a
Quadplexes (Standard Condition)	Standard	4	4	-	-
Quadplexes (Deteriorating Condition)	Deteriorating	12	12	-	-
Quadplexes (Dilapidated Condition)	Dilapidated	8	4	4	40
Triplexes	Deteriorating	6	6	-	n/a
Total Standard		1023	906	117	266
Total Deteriorating		136	122	14	40
Total Dilapidated		8	-	4	-
Total Multifamily Units		**1,167**			

Source: GrantWorks, Inc. Fieldwork 2017

Homeownership & Renting

Tenure in Wharton follows a trend common in most US cities; the prevalence of homeownership increases with age. *Chart 3C* organizes the total number of housing units in Wharton by the age of the householder and indicates the percentage of those units that are owner-occupied or renter-occupied. For example, much of the housing units occupied by a householder over the age of 64 are owner-occupied (68%). As *Chart 3C* demonstrates, older householders in Wharton are more likely to be homeowners and younger householders are more likely to be renters; 32% of renter-householders in Wharton are less than 35 years old. However, the shift to increased homeownership with age occurs somewhat later than expected; ownership becomes more prominent with age only among the 55-to-64-year-old householder age group.

Chart 3C: Householders, by Age, Tenure

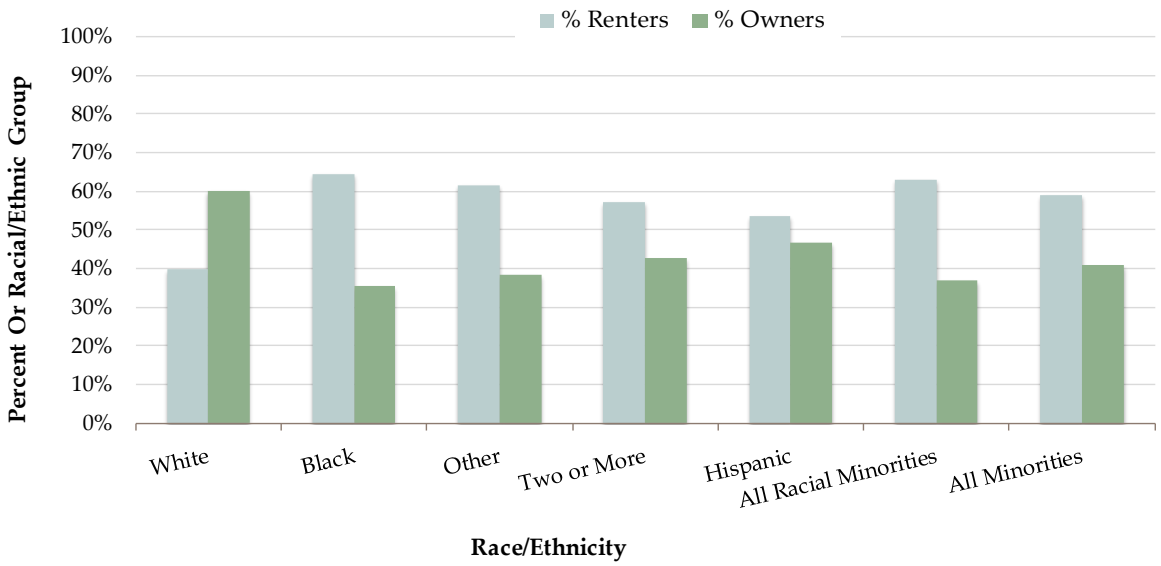


Source: Census 2010, SF1, Quick Table (QTH1)

Renter-householders and owner-householders in Wharton differ somewhat by race and ethnicity. *Chart 3D (next page)* compares householder tenure type by race and ethnicity.[8] As the chart demonstrates, while homeownership is more common among White householders, renting is more common among householders in the other racial and ethnic groups. White residents are 1.7 times more likely to own their home than Black residents and 1.6 times more likely to own their home than all racial minorities considered as a group. White residents are 1.5 times more likely to own their home than Hispanic or Latino residents.

[8] For ease of reference the chart only shows population groups with a universe greater than 45.

Chart 3D: Householders, by Race/Ethnicity



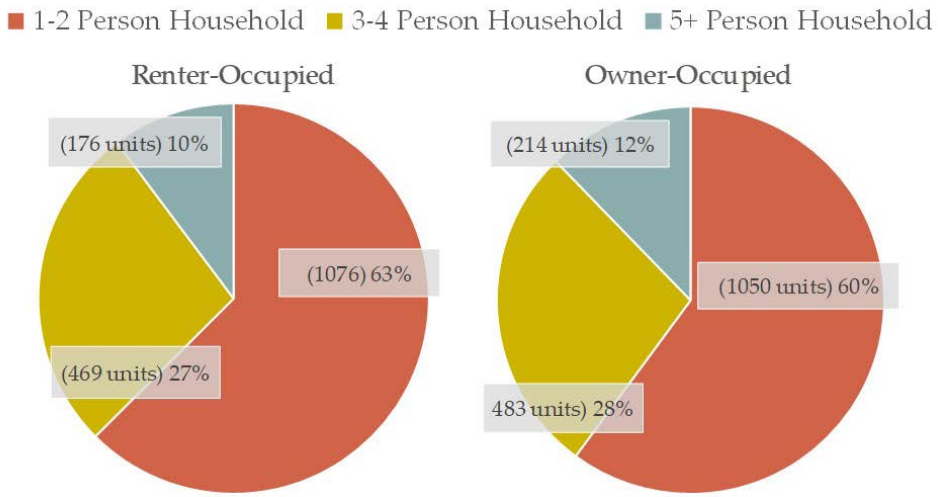
Source: Census 2010, SF1, Quick Table (QTH1)

Chart 3E (next page) compares household sizes by tenure type. As the charts illustrate, the distribution of household sizes is very similar. In both tenure categories, most households consist of two or less people and just under one-third of households consist of three-to-four people, etc. The similar distribution of household sizes in renter-occupied units suggests that renting provides an important housing option for both individuals and families in Wharton. Indeed, 2010 Census figures indicate that 56% of renting households in Wharton are Family Households.[9] Greater household sizes may also indicate multigenerational families - two or more generations living under the same roof. The prevalence of multigenerational households has increased rapidly in recent years. In 2014, 19% of the U.S. population (60.6 million people) lived in multigenerational households.[10]

Rental housing has often been characterized as a necessary option for only very specific groups, such as low-income households or individuals and young couples in transition to homeownership. As a result, rental housing has often been treated as an option of secondary importance (to homeownership). However, studies in cities throughout the U.S. have found that renting is increasingly prevalent and that renter households represent a more diverse array of individuals and life situations than previously thought. These findings have led many researchers and policy-makers to reconsider the contribution that renting can make to a healthy housing market (further discussed in *Section 3.6.3 - Key Housing Considerations).*

[9] The U.S. census defines a "Family Household" as a household that has at least one member of the household related to the household by birth, marriage, or adoption. See Census 2010 SF1 (QT-H3) for more information.
[10] http://www.pewresearch.org/fact-tank/2016/08/11/a-record-60-6-million-americans-live-in-multigenerational-households/

Chart 3E: Household Size Comparison, by Tenure



Source: Census 2010, SF1, Quick Table (QTH2)

Residents in Wharton recognize the prevalence of renting in their community and would like to see additional rental housing developments that are affordable for residents from all segments of the population.

Housing Affordability[11]

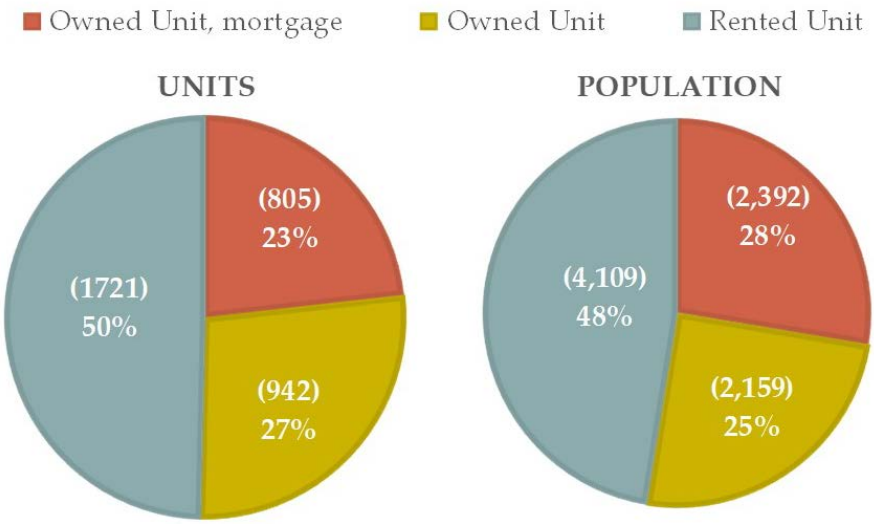
According to U.S. Census data, houses in Wharton are, on average, more affordable than those in Wharton County or in the state of Texas. The median home value in Wharton – estimated at $78,900 - is lower than the county-area and state-wide estimates. The city's median home value is approximately 74% of the median home value for Wharton County ($107,000) and approximately 55% of the median home value for Texas ($142,000). However, the median household income in Wharton – estimated at $32,243 annually - is also lower than county-area and state-wide estimates; the median annual household income in Wharton is approximately $14,202 less than the county-area estimates and $22,484 less than the state-wide estimates, or a difference in monthly income of approximately $1,200-to-$1,900 Therefore, a more appropriate measure of housing affordability in Wharton would be the percentage of the median income that is consumed by housing costs in the city.

[11] Affordability data comes from the 2012-2016 American Community Survey.

Housing expenses are conventionally considered to be affordable when they consume less than 30% of a household's monthly income. As is to be expected, the level of affordability for owner-occupied units differs depending on whether the owner has a mortgage or owns the home outright. Owner-occupied housing costs for Wharton residents *without a mortgage* consume an estimated 15% of the average income. However, owner-occupied housing costs for Wharton residents *with a mortgage* consume an estimated 36% of the average income (see *Appendix 3B*). This is a negative finding as approximately 28% of Wharton's population resides in an owner-occupied home with a mortgage or loan (see *Chart 3F*). Owner-occupied housing costs for residents with a mortgage in Wharton County consume 31% of the average income in the county.

Housing affordability in Wharton also varies by tenure.[12] Monthly housing costs for renters in Wharton are affordable but consume a greater percentage of the average income than rental costs in Wharton County; median monthly rent consumes approximately 25% of the average income in Wharton and 18% of the average income in Wharton County (see *Appendix 3B*). Renting is prominent in Wharton. Indeed, 1/2 of housing units in the city are renter-occupied (see *Chart 3F).*

Chart 3F: Housing Units & Population, by Tenure Type



Source: Census 2010, SF1, Quick Table (QTH1 and Census 2010, SF1, Total Population in Occupied Housing Units by Tenure (H11)

Housing affordability is a key housing concern for community members. Wharton residents would like to see Wharton provide a variety of additional affordable housing options. Residents also expressed a desire for additional housing for seniors (many of whom are likely to live on a fixed income). *Appendix 3B* includes detailed tables and methodology regarding housing affordability calculations.

[12] "Tenure" refers to the conditions under which land or buildings are held or occupied, for example through ownership or through renting

Fair Housing

In conjunction with acceptance of grant funds from the Texas Community Development Block Grant (TxCDBG) program of the U.S. Department of Housing and Urban Development (HUD), the City of Wharton stated that it would affirmatively further fair housing (AFFH) and uphold the 1968 Fair Housing Act. The Fair Housing Act prohibits discrimination based on disability, familial status, race, color, religion, sex, or national origin. *Table 3D* provides basic data on the availability of housing types to those protected classes. A discussion of each protected class follows the table.

Table 3D: Fair Housing Data

Housing by Type/Location (Field Survey 2017)

	Units	% of all Units in City*	ADA Accessible	2+ Bedroom**	Location
Multifamily Units (Occupied and Vacant)					
Briar Pointe Apts.	256	6.6%	-	yes	East
Caney St Apts. 1	7	0.2%	n/a	n/a	Central
Caney St Apts. 2	16	0.4%	-	13	Central
Country Club Apts.	50	1.3%	-	18	East
Fountainhead PHA Apts.	40	1.0%	n/a	n/a	West
Heritage House Apts. A	4	0.1%	n/a	24	West
Heritage House Apts. B	4	0.1%	n/a	n/a	West
Kingston Dr Apts.	24	0.6%	2	24	Southeast
Meadows Apts.	82	2.1%	n/a	n/a	North
Mill Creek Apts.	108	2.8%	16	50	Northeast
Morning Star Apts.	40	1.0%	4	yes	Northeast
Oakhaven Apts.	48	1.2%	n/a	1	East
Pecan Village Apts.	82	2.1%	-	40	North
Red River Apts.	100	2.6%	6	1	Northeast
River Bend Apts.	104	2.7%	5	-	North
Speed St Apts.	8	0.2%	-	72	North
Sweetwater Apts.	56	1.5%	n/a	n/a	North

Wharton Plaza Apts.	24	0.6%	-.-	32	Northeast
Wharton Square Apts.	40	1.0%	n/a	4	Northeast
Duplexes (Standard Condition)	18	0.5%	n/a	n/a	Throughout City
Duplexes (Deteriorating Condition)	26	0.7%	n/a	n/a	Throughout City
Quadplexes (Standard Condition)	4	0.1%	n/a	n/a	Throughout City
Quadplexes (Deteriorating Condition)	12	0.3%	n/a	n/a	Throughout City
Quadplexes (Dilapidated Condition)	8	0.2%	n/a	n/a	Throughout City
Triplexes	6	0.2%	n/a	n/a	Throughout City
Total MF Units	**1,167**	**30.3%**	**33**	**279**	
Houses (Occupied and Vacant)					
Single-family Rentals***	554	14%	n/a	278	Throughout City
Single-family Owned	2,039	53%	n/a	1,726	Throughout City
Single-family Vacant	94	2%	n/a	80	Throughout City
Total Units	**3,854**				

Housing by Race/Ethnicity (Census 2010)

Characteristic	Owned		Rented	
	#	%	#	%
Race				
White	1205	60%	799	40%
Black	342	36%	617	64%
American Indian or Alaska Native	9	45%	11	55%
Asian	8	62%	5	38%
Other	162	38%	260	62%
Two or More Races	21	43%	28	57%
Ethnicity				
Hispanic or Latino	207	47%	576	53%

Source: Census 2010, Sf-1 Data, Quick Table Hi (QTH1)

Notes: * Percentage derived from total housing units in City from Plan field survey (occupied and vacant); ** 2+ bedroom is estimated from 2012-2016 ACS Census data using minimum percentage with 90% margin of error; *** Number estimated based on total number of rentals counted in the Census minis number of apartments counted in field survey

- Disability: No recent Census disability data is available for areas with populations smaller than 65,000 residents. According to the 2012-2016 American Community Survey (ACS) approximately 14.3% of Wharton residents (estimated 1,236 residents) have some type of disability;[13] this figure is higher than the State-wide average – 11.6% of all Texans. It is not known how many single-family homes in Wharton fully meet ADA accessibility standards. However, the field survey found some homes with entrance ramps. *Appendix 3C* includes information about several organizations providing grant and loan assistance to disabled individuals.

- Familial Status: As measured by the number of bedrooms available, a variety of rental properties and houses for ownership are available to accommodate families, as well as single occupants.

- Race & Ethnicity: As shown in *Figure 3A (next page),* the minority population in several Census areas of Wharton are above 65%, which is the threshold[14] used by the State of Texas for defining an area of "minority concentration." Houses in both good and poor condition are located throughout the community. However, as the map shows, several areas of higher minority concentration (90%+) also have more housing in substandard condition (orange and red on map). There are also fewer multifamily complexes relative to other areas of the city.

[13] In the 2012-2016 American Community Survey, individuals were classified as having a disability if they had hearing difficulty, vision difficulty, cognitive difficulty, ambulatory difficulty, self-care difficulty, and/or independent living difficulty.
[14] The "65% threshold" is based on the definition of "an area of minority concentration" used by the Texas General Land Office in its 10/1/2012 publication**, "**Homeowner Opportunity Program Guidelines - CDBG Disaster Recovery Program - Hurricanes Ike & Dolly, Round 2."

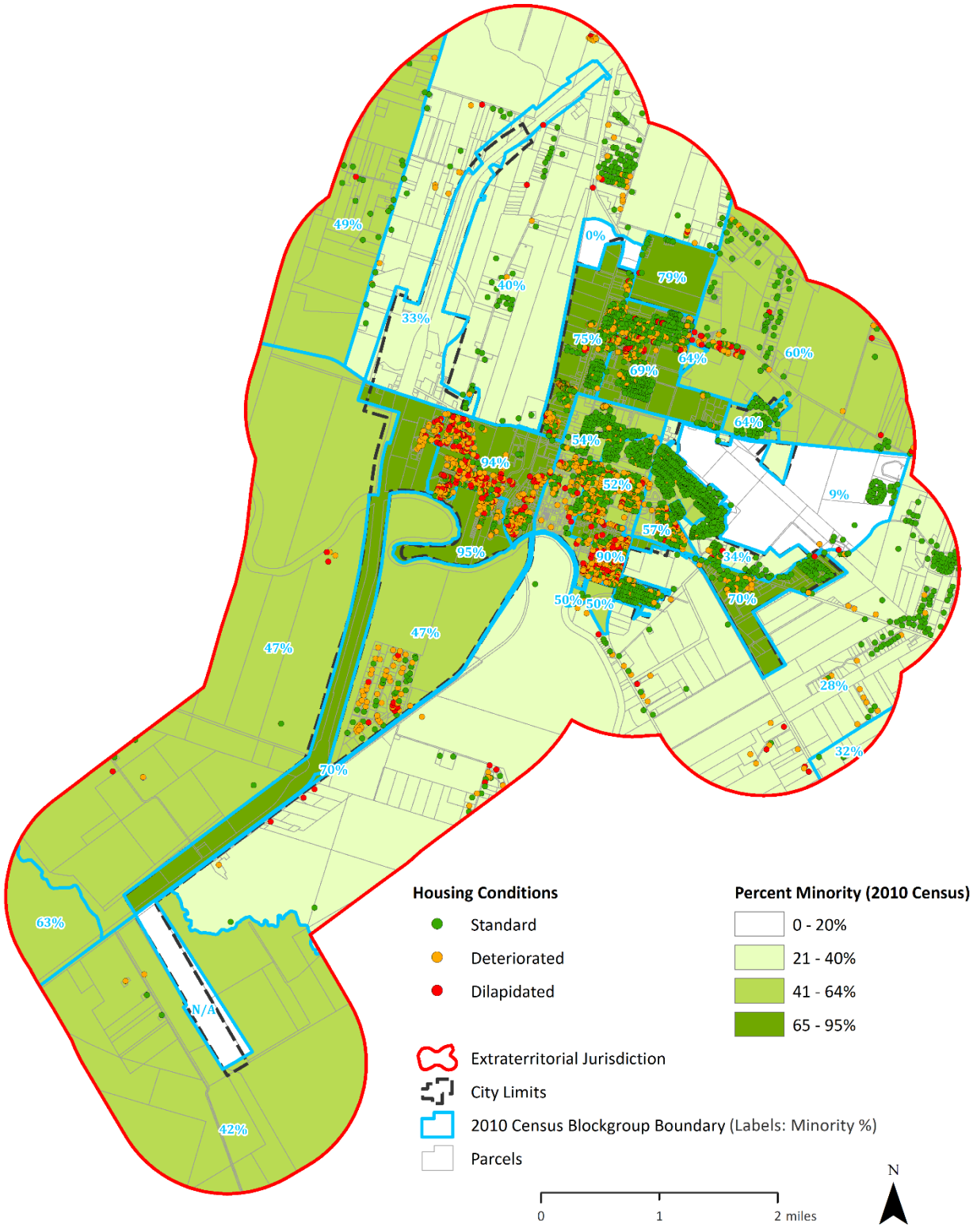


Figure 3A: Distribution of Minority Residents

3.4 Hurricane Harvey's Impact

On August 25, 2017, Hurricane Harvey made landfall near the Texas Gulf Coast. The Category 4 hurricane's slow movement over the next several days lead to catastrophic flooding in southeast Texas. In Wharton, four days after Harvey made landfall, the banks of the Colorado River surged resulting in persistent flooding that covered areas of the city for several days. The hurricane and resulting flooding dramatically impacted structural conditions in the city, particularly in Wharton's "West End".

In October 2017, volunteers from the American Institute of Architects (AIA) completed a field survey to assess the safety of the housing stock in Wharton's West End. The Safety Assessment Statistics from the AIA study included is in the *Digital Appendix* to this plan. The housing field survey for this plan was completed in May 2017, prior to Hurricane Harvey. Data and collection differences between the two surveys prevent direct, comparative findings regarding housing conditions before and after the hurricane. However, for illustrative purposes, planners developed a series of formulas to convert the AIA indicators into the GrantWorks rating schema. The *Digital Appendix* includes a short, stand-alone report describing data and collection differences, as well as conversion formulas, and findings.

The illustrative comparison identified 178 single-family homes and seven multifamily complexes initially classified as "Standard" or "Deteriorating" by GrantWorks but subsequently classified as "Dilapidated" according to the converted AIA findings. *Figure 3B* shows the location of those effected units.

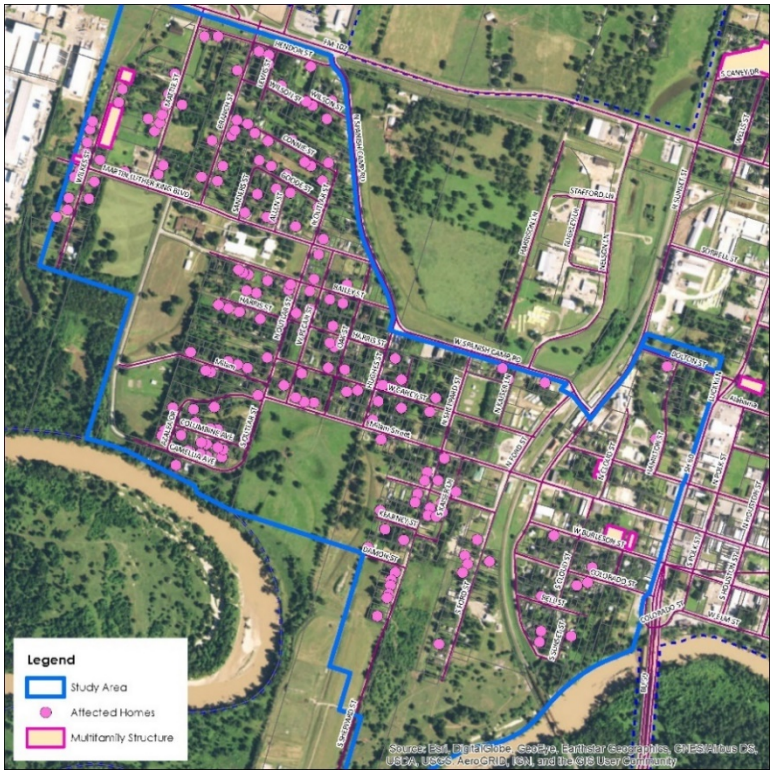


Figure 3B: West-End Houses Affected by Hurricane Harvey

3.5 Future Housing Needs

Based on a projected 2028 population of 11,120 residents, Wharton will need 1,084 new housing units to accommodate the anticipated population growth over the next 10 years. This figure includes the 68 currently vacant, dilapidated units that need removed and replaced (see *Table 3E*). Based on the goal of increasing the ratio of multifamily housing, the recommended breakdown is 763 new single-family units and 321 multifamily units. Three hundred thirty-one (331) currently occupied, substandard units will also need to removed and replaced and 831 currently deteriorating houses will need to be repaired (see *Table 3E*). Additional construction beyond the 331 replacement units may take place in lieu of rehabilitation of deteriorating homes. However, rehabilitation is often cheaper. The City should focus on assisting residents with home repair (e.g. through grant applications and dissemination of information on organizations able to assist individuals) and with removal of dilapidated structures. In addition, the City should work with area foundations, large landowners, and regional developers to identify areas for new housing and to finance and build such housing.

Table 3E: Future Housing Needs

	Single-family	Multifamily	Total
Housing 2018 and 2028			
Occupied Housing in 2018	2,593	1,032	3,625
Total Housing in 2018	*2,687*	*1,1.67*	*3,854*
Total needed in 2028	*3,416*	*1,361*	*4,777*
Future Housing Strategy (2018-2028)			
Need to repair (deteriorating homes)	695	136	831
Need to remove/replace (Occupied: dilapidated MH & SF)	323	8	331
New construction needed	763	321	1,084
Need to remove/replace (Vacant: dilapidated MH & SF) homes)	*60*	*8*	*68*

Note: SF – Strick Frame; MH – Manufactured House

3.6 Key Housing Considerations

Based on the community input and local housing data described above, the City of Wharton and its residents should focus on the following key areas related to housing: flood damage, structural condition, stock diversity and affordability, and Fair Housing Act compliance.

3.6.1 Support Flood Damage Recovery & Prevention

Approximately 256 acres of land in the Wharton city limits are located within the FEMA 100-year floodplain, though the number will change if the proposed Army Corps of Engineer levee is constructed along the Colorado River. Much of the land in the floodplain is developed for residential use.

Within the city limits, there are 1,490 single-family, residential structures and 557 multifamily units located in the floodplain.

Wharton has a long history of flooding. Since its founding in 1846, 18 major flood events, seven of which were federally declared disasters, have occurred in the city (not including Hurricane Harvey). Ultimately, flood damage prevention will require significant changes in land use and investment in mitigation infrastructure like the proposed levee. *Chapter 4: Land Use Study* and *Chapter 7: Storm Drainage Study* further address these challenges.

The City can also work to prevent future housing damage due to flooding by pursing the following strategies:

a) Continue to pursue disaster-relief-mitigation grant funding

b) Assist residents with clarifying clouded property titles

c) Consider starting a Disaster Recovery Housing Program

d) Continue to enforce the Flood Damage Prevention Ordinance

e) Promote and support NFIP participation/compliance

f) Continue CRS participation and consider additional creditable activities

g) Consider measures to limit future development in the floodplain

Continue to Pursue Disaster Relief-Mitigation Grant Funding

The City should continue to pursue grant support for disaster relief and mitigation. The Texas General Land Office (GLO) administers the Community Development Block Grant – Disaster Recovery (CDBG-DR) program for the state of Texas. In response to the damage wrought on Texas by Hurricane Harvey, the federal government allocated $5.024 Billion in disaster recovery funds to the GLO to be used for recovery in effected counties, including Wharton County.

As part of the State Action Plan the following amounts will be made available for affected communities:

- $1.048 billion for homeowner assistance, including rehabilitation and reconstruction of owner-occupied single-family homes;
- $275 million for local buyout and acquisition of houses located in the floodplain;
- $100 million to reimburse homeowners for certain out-of-pocket expenses; and
- $250 million for the rehabilitation, reconstruction, and new construction of affordable multifamily rental housing.

As a CDBG eligible community, Wharton should continue to work with the Houston-Galveston Area Council of Governments and the General Land Office to ensure that its needs are included in future funding plans.

Local Council of Governments are responsible for assembling a Methods of Distribution plan and including a local Needs Assessment – of which this Housing Study should be included – that will help Wharton secure some of the available funding needed to address its housing stock.

Grant funding is also available through the FEMA Hazard Mitigation Grant Program (HMGP) to implement long-term hazard mitigation measures that will reduce or eliminate the losses from future disasters. Projects must provide a long-term solution to a problem. In addition, a project's potential savings must be more than the cost of implementing the project. Funds may be used to protect either public or private property or to purchase property that has been subjected to, or is in danger of, repetitive damage. Examples of projects include, but are not limited to:

- Acquisition of real property for willing sellers and demolition or relocation of buildings to convert the property to open space use.
- Retrofitting structures and facilities to minimize damages from high winds, earthquake, flood, wildfire, or other natural hazards.
- Elevation of flood-prone structures.
- Development and initial implementation of vegetative management programs.
- Minor flood control projects that do not duplicate the flood prevention activities of other federal agencies.

More information about FEMA hazard mitigation grants is available at https://www.fema.gov/hazard-mitigation-assistance.

Assist Residents with Clarifying Clouded Property Titles

"Clouded title" refers to issues in a property's past that make legal ownership of that property unclear. Several situations may result in a clouded title such as unreleased liens or improperly described foreclosures. Very often, however, clouded titles may result from lack of clear inheritance, sometimes over multiple generations, and/or disagreement between multiple heirs. Lack of clear title presents a major impediment to connecting residents with State and federal housing funding.

The City should reach out to area law schools and relief assistance resource providers, such as the Rebuild Texas Fund, to obtain legal counseling for residents with clouded titles. Legal assistance may also become available through the State. After Hurricanes Dolly and Ike, the Texas General Land Office (GLO) funded the Texas Title Project to help low-income homeowners clear title to their land. As part of the project UT law students hosted a series of pro bono legal clinics. The GLO's most recent State Administered Disaster Recovery Action Plan does not include funding for a title project, but the comment period is still open and comments suggest such efforts have already been submitted.

Consider Starting a Disaster Recovery Housing Program

The City of Wharton should consider developing a disaster recovery housing program. The Rapid Disaster Recovery Housing Report, developed out of the Rapid Housing Recovery Pilot Program (RAPIDO) in the Lower Rio Grande Valley, is an excellent resource. The report was created to "…give an overarching view of the lessons learned from the RAPIDO Demonstration Project as well as findings from a comparison of other reports completed after similar disasters across the Gulf and Atlantic Coasts" (CDC Brownsville, 2015).

The report takes a view of disaster management as an "ongoing cycle of action that takes place both during and between disasters. In other words, recovery from one disaster is mitigation for the next" (CDC Brownsville, 2015). The disaster management cycle consists of four phases –mitigation, preparedness, response, recovery – each requiring ongoing planning to reduce the impact of disasters. The program emphasizes several "Key Concepts and Innovations" including: pre-disaster preparedness, pre-procurement, local focus, supportive case navigation, community empowerment, and temporary-to-permanent housing strategy.

The following extended quote from the Rapid Housing Recovery Report captures the importance of approaching disaster recovery as a perpetual planning cycle:

> "Disasters both magnify and accelerate processes already occurring in communities, such as housing turnover, gentrification, or conversions of land use from residential to commercial…. Such acceleration might not permit the extent of community input or interventions that might occur normally. Consequently, in the days, weeks, and months that follow a disaster, decisions must be made rapidly to deal with pressing immediate issues like emergency sheltering and temporary housing, rebuilding, and the restoration of community infrastructure. The pace of decision-making defies typical rational planning methods that require the collection of data and consideration of many alternatives, forcing communities to make hasty decisions that may later turn out to be ill-advised, but yet now are long-lasting if not permanent".
>
> - CDC Brownsville. (2015). "Rapid Disaster Recovery Housing Program: Policy Recommendations", pg. 05

The Rapid Disaster Recovery Housing Report consists of three documents: policy recommendations, a step-by-step technical guide for local jurisdictions, and a program comparison report. The report is available online at http://www.rapidorecovery.org/.

Continue to Enforce the Flood Damage Prevention Ordinance

Adopted on March 13, 2006 and most recently updated in December 2017, the Flood Damage Prevention Ordinance expands on the model ordinance developed by the Texas Water Development Board (TWDB). Referencing the Federal Emergency Management Agency (FEMA) study and map dated December 21, 2017, the ordinance sets standards for construction in the Special Flood Hazard Areas (SFHAs). In all SFHAs, including areas of shallow flooding, the lower floor (including basements) of new construction or substantial improvement of any residential structure (including manufactured housing) must be at least one foot or more above the Base Flood Elevation (BFE),[15] as certified by a registered professional engineer, architect, or land surveyor. In addition, all proposed new construction and substantial improvement in SFHAs must be shown to have no adverse impact on occurrence of base flood as certified by a registered professional engineer, architect, or land surveyor. All manufactured homes in SFHAs must be installed "using methods and practices which minimalizes flood damage", such as anchoring. The ordinance also regulates development outside of the floodplain. It requires that the lowest floor or all new construction and substantial improvement of any such residential (or non-residential) structures be elevated to at least 12 inches above the nearest street natural ground (whichever is higher).

Promote and Support NFIP Participation/Compliance

The City should encourage more residents to participate in the National Flood Insurance Program (NFIP). Created by the US Congress in 1986, NFIP enables property owners in participating communities to purchase federal insurance protection against flood losses.

The City of Wharton has participated in National Flood Insurance Program (NFIP) since 1976. However, relatively few residents have NFIP insurance; as of March 31, 2018, there are 761 NFIP policies in force in the city of Wharton, or roughly 51% of the occupied housing in the floodplain.[16] Many residents may not be aware that flood insurance is available, may not see the need to insure their property, or may not be aware that insurance must be purchased at least 30 days before any claim to be covered. Flood insurance is very important, especially for a community with a great deal of existing development in the floodplain like Wharton. As noted in the NFIP manual:

> "Flood insurance is a wise investment. Floods are the number-one natural disaster in the United States… Just a few inches of water can cause tens of thousands of dollars in damage. Flood damage is not covered by most standard homeowners or business insurance policies. Disaster assistance, if it is available, is typically a loan that must be repaid with interest".[17]

[15] FEMA.gov defines BFE as "The computed elevation to which floodwater is anticipated to rise during the base flood. Base Flood Elevations (BFEs) are shown on Flood Insurance Rate Maps (FIRMS) and on the flood profiles. The BFE is the regulatory requirement for the elevation or floodproofing of structures. The relationship between the BFE and a structure's elevation determines the flood insurance premium".
[16] More information available at https://www.fema.gov/national-flood-insurance-program-community-status-book and https://www.fema.gov/policy-claim-statistics-flood-insurance.
[17] Federal Emergency Management Agency. (2017). "National Flood Insurance Program Community Rating System Coordinator's Manual FIA-15/2017". https://www.fema.gov/media-library/assets/documents/8768

To promote and support NFIP participation, the City should conduct public outreach to educate residents about the need for flood insurance and information about the NFIP. Public outreach activities could include a public workshop, targeted letters to owners of property within the floodplain, or even a few sentences included in each water bill indicating where residents can obtain more information about the NFIP. Public outreach activities could also result in credit - and therefore reduced insurance premiums for residents - through the NFIP's Community Rating System (discussed below).

In addition, the City should:

a) post the FEMA Flood Insurance Rate Map (FIRM) in a visible location at City Hall; and

b) maintain records of the number of flood insurance policies in the community and identify areas that require further coverage; and

c) post information about flood damage and flood insurance on the City website (see also *Chapter 10: Economic Development).*

Continue CRS Participation & Consider Additional Creditable Activities

The City should continue participation in the National Flood Insurance Program's (NFIP) Community Rating System (CRS). The purpose of CRS is to encourage and recognize community and state activities that exceed the minimum NFIP requirements. Based on credited activities, residents in participating communities can obtain discounts of up to 45% off flood insurance premiums. There are 19 creditable activities organized under four categories: public information activities; mapping and regulations; flood damage reduction activities; and warning and response. Creditable actions included higher regulatory standards such as a freeboard requirement or a reduced trigger for substantial improvements. Other creditable actions include staff training and certification in floodplain management and public information activities such as outreach to increase NFIP insurance participation (discussed above).

The City should work with its Floodplain Administrator to increase familiarity with opportunities to obtain CRS credit and the specific criteria required to obtain credit. Wharton may already have enacted/be in the process of enacting several of these potential creditable activities. The 2017 Community Rating System Coordinator's Manual provides extensive detail about the options and requirements for obtaining CRS credit. The manual is available online at https://www.fema.gov/media-library/assets/documents/8768 and included in the *Digital Appendix* for this plan.

Consider Measures to Limit Future Development in the Floodplain

The City of Wharton should also consider measures to prevent/limit the impact of future development in the floodplain. *Chapter 4: Land Use Study* describes these alternative development types/strategies.

3.6.2 Improve Structural & Community Conditions

The City has two ongoing methods for assisting residents with single-family housing condition: HOME program grants and enforcement of City ordinances (further described below).

Substandard Housing

Community input and the findings in this study support the need to address substandard housing challenges in Wharton. Within the city limits, Wharton has 927 occupied, residential units in deteriorating condition that need renovation, 193 occupied, dilapidated units that need to be replaced, and 56 vacant, dilapidated units that need to be removed.

Common causes of house deterioration include:

- A change in financial circumstances that makes an owner unable to pay for home repairs;
- Elderly residents no longer attentive to or able to maintain their homes;
- Lack of motivation by rental property owners to maintain their properties (because of low renter expectations, desire to maximize profit, living out of town, lack of enforcement by the town, etc.); and
- Lack of pride in property.

The effects of deteriorating and dilapidated houses impact the entire community, and it is worth community investment to address the problem. Effects include:

- Health risks to residents of deteriorating and dilapidated structures;
- Downward pressure on property values; and
- Reluctance of future homeowners to move to an area with large numbers of deteriorating or dilapidated houses.

Figure 3C: Example Overgrown Yard/Dilapidated Housing

To improve the Wharton's housing stock, the City should:

a) Track the number and location of vacant, dilapidated buildings in the community;

b) Continue to enforce its Substandard Building and Structures standards;

c) Consider strategies to support voluntary and alternative dilapidated building removal; and

d) Apply for, and educate home owners about, available grants

The following sections describe these recommendations in further detail. Lack of clear property title, discussed in *Section 3.6.1,* will also limit the impact of these recommendations. The City should assist residents with clearing clouded property titles as discussed in the above section.

Track Vacant, Dilapidated Structures

Tracking vacant, dilapidated housing enables the City to have a clear understanding of both the extent of the challenge and of progress in addressing that challenge. Depending on municipal resources and needs, the tracking system could be as sophisticated as a mapped database or something as simple as a single word document or excel spreadsheet noting structure addresses and the date each vacancy was initially identified. Tracking implies regular or semi-regular updates to the database or document/spreadsheet. Updates can similarly vary based on the resources and needs of the municipality ranging from regular updates. Municipalities with less available resources for this activity could select a time each year to drive the community, identify newly vacant, dilapidated structures, and update the document/spreadsheet as needed. An up-to-date record of vacant, dilapidated housing can enable a city to make strategic decisions about its actions, such as focusing efforts on a few proximate structures or integrating demolition activities with other neighborhood improvements. Vacant, dilapidated housing records can also support grant applications. The City could also share general figures with community members as part of an educational campaign about housing conditions or to encourage support for a voluntary clean up event.

The City of Wharton does not have an established system for tracking vacant, dilapidated housing. As part of this comprehensive plan the City will receive fieldwork data collected to support each study, including housing. This data could be used to start a tracking system according to the City's resources and needs.

Continue to Enforce Substandard Buildings & Structures Standards

Local Government Code, Title 7, Subtitle A, Chapter 214 establishes a municipality's authority to regulate substandard buildings. The statutes enable a municipality to, by ordinance, require the vacation of a structure, relocation of occupants, and securing, repair, removal, or demolition of certain buildings. Such ordinance must:

- ✓ Establish minimum standards for the continued use and occupancy of all building regardless of the date of their construction.
- ✓ Provide for giving proper notice.
- ✓ Provide for a public hearing to determine whether a building complies with the ordinance standards.

In addition, in 2011 and 2012, the Texas Supreme Court released opinions on the City of Dallas v. Stewart that effect dangerous structures ordinance enforcement. Most importantly, cities must allow 30 days after an administrative nuisance declaration for an owner to appeal the declaration before enforcing the ordinance. The Texas Municipal League (TML) has prepared a detailed report on the case and its implications for municipal enforcement of substandard structures ordinances. That report is included in the *Digital Appendix* to this study and is available on the TML website (www.tml.org).

Article IV, in Chapter 18 of the City of Wharton Municipal Code establishes the Substandard Building and Structures standards. The standards establish that a building that does not meet the City's minimum standards for continued use and occupancy is a public nuisance. Generally, a building does not meet the minimum standards if it:

- is rotting, decayed, falling apart, or otherwise creates a danger to person or property;
- due to dilapidation, creates a fire menace;
- due to dilapidation, is in unsanitary condition and is likely to create disease;
- is unsecured or insufficiently secured from authorized access or constitutes a danger to the public even though secured from entry;
- is intended for human occupancy but does not meet required standards such as structural soundness, minimum floor area per occupant; sufficient water and wastewater service and facilities; safe electrical service; sufficient heating and cooling, etc. (see standards for specific details).

The standards provide for proper notice including notice of building inspection, abatement, public hearing, order to abate, penalty, to complete work. Where a building is found in violation of the minimum standards, a code enforcement official may file a complaint with the City's municipal court system; failure to appear at the hearing will result in a warrant. If the owner does not respond to or act within 15 days of notice of abatement, the inspecting official may request a public hearing before the Building Standards Commission. If the owner does not completely with an order in the allotted time, the City may complete the ordered action with associated expenses to be assessed against the property in the form of a lien. The standards also provide for the voluntary conveyance of property to the City for demolition upon approval by the city council and a determination by the council that the property has value to the city. Petitions for appeal must be filed within 30 days of an order.

Support Voluntary & Alternative Building Removal Strategies

One way that some cities have encouraged landowners to abide by dangerous structure codes without entering litigation is to include a provision in the regulating ordinance that provides City assistance with demolition to landowners who voluntarily come forward and ask for an inspection. Instead of the $5,000-to-$10,000 it can cost to demolish the structure, the property owner pays landfill costs and $500 to the City for labor and hauling. Some cities also provide no-cost demolition to homeowners who show financial inability to pay. Some small cities negotiate with their solid waste providers to include provisions such as removal of one or more dilapidated structures per year in their solid waste contract.

Home demolition is expensive and costs may prove prohibitive for municipalities and residents. The City can also facilitate ordinance compliance by allowing for demolition alternatives. Two increasingly popular alternatives to home demolition are deconstruction and house moving. Rather than bringing in heavy equipment to raze an abandoned structure before sending it to the landfill, home deconstruction specialists and salvagers take apart abandoned homes piece by piece. Their focus is collecting materials for reuse, so they limit the amount of waste that heads to the landfill. Unlike demolition, pricing for deconstruction is not always straightforward. In certain cases, salvagers will pay to remove certain materials, but they might not take everything. In other cases, deconstruction specialists will demolish the house for the right to collect the materials they want. In still other cases, deconstruction can cost significantly more than demolition. However, deconstructing a home allows the homeowner to take a significant tax deduction, often larger than the cost of deconstruction itself. The *Digital Appendix* includes an explanation of the appraisal process for donated building materials.

Certain structural moving companies maintain an inventory of commercial buildings and stick-frame and manufactured homes that they have removed from properties with the intention of reselling and relocating them. Often, structural moving companies sell their inventory at relatively affordable prices. By reselling the homes, house movers keep them out of the landfill and they give new buyers an opportunity to rehabilitate the structures.

If structural movers keep the structure, they may or may not charge for house removal. Depending on the house, they might buy it from the property owner before moving the structure. As long as the home is structurally sound enough to be moved, structural moving companies will collect homes and other buildings in all conditions.

Apply for, and Educate Home Owners about, Available Grants

The City can further support improved housing conditions by applying for grants and working to share information about available grant programs with home owners.

The City should continue to apply for grants under the HOME program. HOME is the most common grant programs for rehabilitation or replacement of single-family homes. The program is managed by the Texas Department of Housing and Community Affairs (TDHCA) and funded by the U.S. Department of Housing and Urban Affairs (HUD). Program details change year to year, but the resident must meet income limits and have clear title to the property and land, and the City may have to provide a cash or labor/materials match, depending on population size. Since 2003, the City has facilitated 24 home replacements and approximately $1.37 million in housing rehabilitation through the HOME program.

Municipal authorities should also work to share information about available maintenance grant programs with homeowners. Housing maintenance and repairs can be costly. Providing homeowners with information about home maintenance and repair grant and loan programs is a key component not only to preventing structural deterioration but also for maintaining affordability. Several programs are available to homeowners that assist with a variety of home maintenance needs such as weatherization improvements, general home repairs, and low-interest loans. Additional grant programs and resources that public officials should be aware of and should make residents aware of are listed in *Appendix 3C: Community Housing Organizations & Grant Programs.*

Manufactured Housing

Manufactured houses comprise just 6% of the city of Wharton's housing stock. However, manufactured units are more than twice as likely to be in deteriorating condition. Approximately 11% of manufactured units have significant problems such as holes in exterior walls, missing window panes, cracked foundation, etc. (i.e. "dilapidated condition"). Although less durable than well-constructed, stick-frame homes, when in compliance with HUD and building codes, manufactured houses can provide affordable, safe housing.

One of the most common complaints about manufactured houses is that their appearance negatively impacts surrounding property values. Manufactured houses are increasingly like stick-frame houses in design and, when located on single-family lots with landscaping, masonry skirts, and regular maintenance, can be near-indistinguishable from stick-frame houses.

Figure 3D: New Manufactured Home Example

Manufactured houses may also be more likely to depreciate than stick-frame houses due to factors such as location, maintenance, and purchase price. Depreciation negatively impacts local property tax revenues. A 2003 study conducted by the Consumers Union in Texas assesses which aspects of manufactured houses are most likely to lead to depreciation or appreciation in value.[18] The Consumers Union concludes that variability in manufactured house appreciation/depreciation is much higher than in stick-frame construction. However, the study finds that home owners and regulators can pursue several actions to increase the likelihood of appreciation:

- ✓ Own Land. If land ownership is not an option, rent and tenancy should be as stable as possible. Houses should be sold in place.
- ✓ Select durable homes.
- ✓ Pay fair price – and it may be that shopping for a deal in used homes is worthwhile.
- ✓ Improve demand for used houses by creating lending products to finance this market.
- ✓ Place housing in good locations and neighborhoods [increase appreciation].
- ✓ Give the home-site built visual appeal and congruence with neighborhood styles.
- ✓ Budget money for repairs.
- ✓ Consider all the aspects that lead to equity building, not just appreciation.

The effect of manufactured houses on municipal tax revenues also depends on state tax law and county appraisal district methods for depreciating manufactured housing.

[18] Study available from www.consumersunion.org and is included in the *Digital Appendix* for this plan.

Because of the dual considerations of Wharton's larger low-income population (see *Appendix 2A*) and residents' desire to improve the city's housing stock, the city of Wharton should:

a) Update and continue to enforce the Manufactured Housing, Mobile Homes, and Travel Trailers standards;

b) Assist residents with HOME program applications (discussed below) to replace manufactured houses with stick-frame construction; and

c) Over time and in conjunction with other economic development projects, consider adopting stricter ordinance standards to both improve manufactured house value and encourage more stick-frame construction.

The following sections describe these recommendations in further detail.

Update & Continue to Enforce the Manufactured Housing, Mobile Homes, and Travel Trailers Standards

Manufactured housing standards are not likely to reduce the number of manufactured houses in the city but standards are likely to improve the condition of Wharton's manufactured housing stock over time.

The Texas Manufactured Housing Standards Act, passed in June 2003, establishes manufactured housing regulations at the state level (Texas Occupations Code, Subtitle C, Chapter 1201). The standards establish an important distinction between "Mobile Homes" and "HUD-Code Manufactured Homes". This distinction is important because the structure types receive different protections under the law. For example, it is lawful for a city to prohibit the new installation of a Mobile Home within the city limits (with a few caveats), but a city may NOT prohibit the new installation of HUD-Code Manufactured Home in the city limits. The act defines the term "Manufactured Home" or "Manufactured Housing" as a" HUD-code Manufactured Home or a Mobile Home".

Chapter 38 of the City of Wharton Municipal Code establishes the Manufactured Housing, Mobile Homes, and Travel Trailers standards. The definitions in Article I of Wharton's standards follow the Texas State statutory distinctions between the terms "Mobile Home", "HUD-Code manufactured home", and "Manufactured Home". However, later standards in the article appear to provide alternative definitions. In some cases, the term "Mobile Home" is redefined "except as otherwise specifically provided" to "mean and include the term mobile home and manufactured home". Similarly, in another section "Mobile Home Park" is redefined to include "the term mobile home park, manufactured housing park, and recreational vehicle park". Article I defines a "Mobile Home Park" as "a contiguous development of land which has been planned and improved for the placement of Mobile Homes". The two latter terms (manufactured housing park and recreational vehicle park) are not defined.

Definition changes obscure the previous distinctions and could lead to confusion in the application of the standards, thereby opening the City up to potential legal challenges. The City should revise the standards using consistent terms and definitions throughout the entire chapter and seek legal counsel to ensure that the revised standards comply with statutory limitations.

Assist Residents with HOME Program Applications

The City should also support current residents interested in applying for HOME grants to obtain single-family housing to replace their manufactured houses with stick-frame construction. Priority should be given to current occupants of dilapidated manufactured houses.

HOME is the most common grant program for rehabilitation or replacements of single-family homes. The program is managed by the Texas Department of Housing and Community Affairs (TDHCA) and funded by the U.S. Department of Housing and Urban Affairs (HUD). Program details change year to year, but the resident must meet income limits and have clear title to the property and land, and the City may have to provide a cash or labor/materials match, depending on population size. Since 2003, the City has facilitated 24 home replacements and approximately $1.37 million in housing rehabilitation through the HOME program.

Community Conditions

Local Government Code, Title 7, Subtitle A Chapter 217 establishes municipal authority to regulate nuisances. The statute enables Home Rule municipalities to (1) define and prohibit any nuisance within the city limit/or within 5,000 feet outside of the limits; (2) enforce any necessary ordinance to prevent and reduce, lessen, or removal a nuisance (outside of a juridical proceeding). Chapter 34 in the City of Wharton Municipal Codes establishes the Health and Sanitation Standards. The standards establish and regulate the abatement of several nuisances including: unreasonably loud noises; accumulation or growth of weeds or brush; and junked vehicles.

Generally, the nuisance regulations:

- ✓ Define and establish the nuisance
- ✓ Establish public authority (to a specific official or department) to investigate and remedy the nuisance
- ✓ Establish procedures and requirement for:
    - o Filing a nuisance complaint
    - o Inspection of a potential nuisance
    - o Notice of violation

- Public hearing
- Appeal

- ✓ Provide for remedy including order of removal, fees, and criminal charges
- ✓ Provide for public remedy in the case of continuing violations, including lien again property and public abatement.

The City of Wharton should continue to enforce its nuisance ordinances. Suggestions for voluntary activities to encourage compliance are included in *Section 4.4.1 (Chapter 4: Land Use).*

3.6.3 Develop More Multifamily, Rental, & Affordable Housing Options

Wharton residents expressed a desire for more housing and more housing options, including multifamily housing. In addition, residents expressed a desire for a variety of affordable housing options, including rental housing. Residents currently living in dilapidated housing that needs to be replaced could also benefit from additional housing development efforts. The City should pursue the following strategies that promote a variety of housing options, affordable for diverse incomes and stages of life.

Promote Residential Infill, Especially Multifamily Housing

The City should promote infill development. One key component in affordability is costs associated with utility bills and taxes. These costs tend to rise when a city issues municipal bond debt. Bond debt is a common tool used to finance large-scale infrastructure improvements that result from growth and development. One way to limit the need for increased infrastructure costs that result from growth is to encourage residential infill development on vacant, subdivided land within the corporate limits. Since existing infrastructures systems already serve these lots, new development would not require significant infrastructure expansion and would allow the City to focus on existing system maintenance and improvements. Development should be encouraged in areas identified as semi-developed that are not located in the 100-year Floodplain. Strategies to promote infill development and a map showing the location of developable properties ideal for infill development are found in *Chapter 4: Land Use Study.*

The City should also promote multifamily housing development. A study conducted by the Urban Land Institute (ULI) finds that multifamily housing:

- ✓ Is needed and preferred by many people at a variety of life stages (individuals, new families, empty-nesters, seniors, etc.);
- ✓ Is important to the economic vitality of the larger community;
- ✓ Can help minimize traffic congestion;

- ✓ Enables a community to provide housing that is affordable to a wider range of incomes; and
- ✓ If well designed, can be an attractive and compatible addition to the community.

The ULI study is included in the *Digital Appendix* to this plan.

Additional multifamily housing options are needed in particular to support the existing rental market in Wharton. Wharton has several multifamily housing options. However, demand is high and some units are in substandard condition. Average housing costs for renters in Wharton are affordable but consume a greater percentage of average income than costs in Wharton County. Multifamily housing does not have to be exclusive to renters. Multifamily housing development could also provide an important alternative housing option for Wharton's potential home owners as multifamily housing units, such as duplexes, are often (but not always) more affordable than single-family housing.

Collect Community Information & Make It Easily Accessible

Wharton can also support development of more diverse and affordable housing options by collecting and sharing housing and community information. Wharton should keep records of housing market information such as:

- ✓ Requests made to City Hall for rental housing information;
- ✓ Records of occupancy and vacancy rates in rental housing (including RV parks and single-family houses);
- ✓ Information on land available for lease or purchase; and
- ✓ Information on utility rates and capacities.

Keeping records of inquiries about available single-family and multifamily housing opportunities would make Wharton more appealing to potential residents and housing developers. This type of basic legwork by municipal staff and residents makes a city more appealing for consideration because: a) the potential resident/developer does not have to spend as much time on research and b) such work builds trust that residents and staff members are able and willing to work with new residents or development groups.

The City should also consider regularly collecting information from residents about housing conditions. For example, the City could distribute a community survey to one neighborhood each year to maintain a better understanding of residents' housing conditions. In addition to potentially supporting grant applications and studies, record keeping and housing survey results could help the City identify key community challenges and opportunities and to work with residents on these issues. For example, the housing survey could be followed up with a workshop to educate residents about fair housing laws and available grant and loan programs that pertain to housing needs expressed in survey responses.

Community and housing information could be shared on the City website. *Chapter 10: Economic Development* discusses opportunities for further enhancing the City of Wharton website.

Network with Affordable Housing Organizations & Developers

The City should also network with affordable housing developers. Currently, Wharton may be most appealing to niche developers who work in rural Texas and in the lower-income and senior housing markets. Recruiting those developers would require networking, consulting with potential developers about their needs, and providing information about the city to as many people as possible. *Appendix 3C* describes several organizations that provide general information, grants, and loans for housing development and access to networks of housing developers including:

- ✓ Texas Affiliation of Affordable Housing Providers (TAAHP)
- ✓ Texas State Affordable Housing Corporation (TSAHC)
- ✓ Texas Department of Housing and Community Affairs (TDHCA)
- ✓ U.S. Department of Agriculture Rural Development (USDA-RD)

The City should also focus on working with developers who are eligible to apply for the Housing Tax Credit (HTC) program. The HTC program is a dollar-for-dollar reduction of federal income tax liability through the Texas Department of Housing and Community Affairs (TDHCA). The program reduces the cost to developers, allowing them to provide more affordable units at lower rates to tenants. This would increase the number of quality affordable units in Wharton. The program is competitive, so municipal participation is encouraged in the form of development support and funding contributions. More information on the program can be found on the TDHCA website (http://www.tdhca.state.tx.us/multifamily).

Continue to Work with the Wharton Housing Finance Corporation

The City of Wharton should continue to work with the recently created Wharton Housing Finance Corporation (HFC). The statutory purpose of an HFC is to assist in the development of low-to-moderate income housing and home-ownership. To support this goal HFCs, among other powers, are empowered to issue notes, bonds, and other obligations. For example, an HFC can issue tax-exempt bonds to help fund below-market-interest rate mortgages for qualifying homebuyers. An HFC can also issue tax-exempt private activity bonds to finance a qualified private project that provides some public benefit, such as an affordable rental housing development. The exemption from the federal tax results in reduced financing costs that can be attractive for private investors/developers.

3.6.1 Continue to Support Fair Housing

The City of Wharton has adopted or agreed to adopt several policies and to undertake actions to increase local awareness of fair housing issues and increase availability of housing choices to protected classes. The City must consider whether its policy and budget decisions intentionally or unintentionally sanction segregation or limit free housing choice, if it has sufficiently educated the public about the Fair Housing Act, and if it has taken proper steps to uphold the Act.

The fair housing analysis in this plan is guided by the State of Texas Analysis of Impediments and the Fair Housing Activities Statement of Texas (FHAST), both of which provide standards for analyzing fair housing in a community. The FHAST often combines reference to protected classes with reference to low-income because there is a high correlation between the two groups; therefore, the following analysis also references income-related assistance.

The City has at least three tools by which it can support fair housing:

Grant Applications

Apart from HOME (described above), many grant applications that would help residents with home repair and rehabilitation must be initiated by individuals or non-municipal organizations. Wharton's public officials and municipal staff can publicize and provide contact information for such grants. A list of grant programs and area organizations that work on housing assistance can be found in *Appendix 3C.*

Ordinance Adoption & Enforcement

The City's ordinances do not appear to contain fair housing impediments. The following review assesses how fair housing is affected by the City's standards for flood damage prevention and minimum standards for continued use and occupancy of a building.

- *Flood Damage Prevention Standards.* Wharton's Flood Damage Prevention Ordinance permits construction of structures in flood-prone areas provided that the construction meets damage-prevention and safety standards. The ordinance applies equally to all residential structures in the 100-year Floodplain. Within the city limits there are currently 1,489 single-family, residential structures and 193 multifamily units in the 100-year Floodplain.
- *Minimum Standards for Building Use/Occupancy.* House of varying condition are located throughout the City and the standards apply equally to all such housing. The standards would be improved if combined with assistance to owners who are unable to repair or replace their houses (primarily through HOME grants and other grant resources listed in *Appendix 3C*).

Policy Adoption & Community Education

The City has regularly published the following ad in its newspaper of record in conjunction with TxCDBG grants.

To promote fair housing practices, the City of Wharton encourages potential homeowners and renters to be aware of their rights under the National Fair Housing Law. Title VIII of the Civil Rights Act of 1968, as amended, prohibits discrimination against any person on the basis of race, color, religion, sex, handicap, familial status, or national origin in the sale or rental of units in the housing market. For more information on fair housing or to report possible fair housing discrimination, call the U.S. Department of Housing and Urban Development's toll-free hotline at 1-800-669-9777.

The City posts provisions of the National Fair Housing Laws and the process for filing a complaint regarding housing discrimination at City Hall.

In addition, the City should:

a) Provide at City Hall:

- Local, State, and Federal contacts for reporting a fair housing complaint.
- A copy of the City's Fair Housing policy and complaint procedures.
- A copy of the Federal Fair Housing Act.[19]

[19] Available at the Department of Justice Civil Rights Division website: www.justice.gov/crt/about/hce/title8.php

- A copy of the Texas Accessibility Standards[20] and Construction Requirements for Single-Family Affordable Housing (Texas Government Code, Section 2306.514).[21]

b) Adopt and annually update fair housing ordinances, resolutions, and policies, including:

- A Fair Housing Ordinance based on HUD model ordinances.
- A policy explicitly requiring that all non-federally funded projects in the city follow State and Federal laws regarding special-needs construction standards.
- A policy preventing the concentration of undesirable infrastructure (e.g. sewer plant, solid waste dump, etc.) in locations that would unfairly impact protected classes.
- A resolution designating April as Fair Housing Month.

c) Provide annual fair housing training to all senior municipal staff.[22]

d) Formalize a procedure for municipal staff to keep logs and records of fair housing complaints and referrals.

e) Coordinate housing grant applications with other grant applications so that housing quality in an area is improved at the same time as water, sewer, streets, and drainage.

f) Develop an anti-NIMBYism[23] action plan to disseminate timely and accurate information to residents and other concerned parties during the planning and execution of fair housing projects and developments.

[20] Available at www.tdlr.state.tx.us/ab/abtas.htm
[21] Available at www.statutes.legis.state.tx.us/Docs/GV/htm/GV.2306.htm#2306.514
[22] The Texas Workforce Commission offers a variety of training programs. Visit http://www.twc.state.tx.us/partners/fair-housing-presentations-training for further information.
[23] "NIMBY" is an acronym for "Not In My Backyard". An AntiNIMBYism action plan is intended to prevent/address misinformation that may lead to NIMBY-type sentiments about proposed new developments and fair housing opportunities.

3.7 Implementation Plan

The Implementation Plan organizes the action items recommended to address each issue identified in the above sections into a timeline for completion. The actions are prioritized and organized by date.

Table 3F: Implementation Plan: 2018-2028

Goals & Objectives	Activity Year(s)			Lead Organization	Cost Estimate	Funding Sources
	2018-2021	2022-2024	2025-2028			
Goal 3.1 *Support flood damage recovery and prevention*						
Post the FEMA Flood Insurance Rate Map (FIRM) in a visible location at City Hall and on the City website; update as needed	X			City	Staff	GEN
Start annual public outreach activity to encourage participation in NFIP		X		City	Staff	GEN, Local
Consider developing a Disaster Recovery Housing Program	X	X	X	City	Staff, Variable	GEN
Pursue legal counseling assistance to help residents clarify property titles	X	X	X	City	Variable	GEN, Local
Continue to pursue disaster relief/mitigation grant funding (CDBG-DR; HMGP)	X	X	X	City	Variable	GEN, CDBG-DR, FEMA
Continue to enforce Flood Damage Prevention Ordinance	X	X	X	City	Staff	GEN
Continue participation in the NFIP Community Rating System (CRS)	X	X	X	City	Staff	GEN
Goal 3.2 *Renovate or replace occupied, substandard housing*						
Create information resource library on housing assistance organizations at City Hall, on the City website, and at local institutions (see Appendix 3C for a list of organizations); update regularly	X			City	Staff, Local	GEN, Local
Create information resource library on grant programs at City Hall, on the City website, and at local institutions (see Appendix 3C for a list of organizations); update regularly	X			City	Staff, Local	GEN, Local
Update Manufactured Housing, Mobile Homes, and Travel Trailer standards		X		City	< $1,000 (legal)	GEN

Reconstruct at least three (3) houses per year with HOME grants	X	X	X	City	Match may cost 5-6% of total cost*	TDHCA, GEN
Goal 3.3 *Remove vacant, dilapidated structures*						
Create a log of vacant, dilapidated structures; maintain log with up-to-date information	X			City	Staff	GEN, Local
Continue enforcement of Substandard Building Ordinance; remove at least three (3) buildings per year	X	X	X	City	Variable (US Avg = $18,000)	GEN, Local
Pursue strategies to support voluntary & alternative dilapidated building removal	X	X	X	City	Staff	GEN, Local
Goal 3.4 *Continue to pursue more diverse and affordable housing developments*						
Create a marketing package to make information about Wharton easily accessible to potential developers and residents	X	X		City	Variable	GEN, EDC, Local
Continue to work with City of Wharton Housing Finance Corporation	X	X	X	City, WHFC	Variable	GEN, WHFC
Continue to collect and share information on Wharton's population & housing needs (e.g. rental housing requests, occupancy rates, demographics)	X	X	X	City	Variable	GEN, EDC, Local
Network with affordable housing organizations & developers	X	X	X	City	Variable	GEN, EDC, WHFC
Goal 3.5 *Continue to support Fair Housing initiatives*						
Formalize procedure for City staff to keep logs and records of fair housing complaints and referrals	X			City Staff	Staff	GEN
Provide annual fair housing training to all senior staff		X	X	TWC, City Staff	Staff	GEN
Develop an anti-NIMBYism action plan to disseminate timely and accurate information to residents during the planning of fair housing developments			X	City	Staff	GEN
Adopt and conduct annual reviews of ordinances, resolutions and policies that support fair housing	X	X	X	City	Staff	GEN
Keep up-to-date information on Fair Housing laws, policies, complaint procedures and ADA construction standards at City Hall and on the City website	X	X	X	City	Staff	GEN

Goal 3.6 *Attract economically stable residential development that complements Wharton's existing character*						
Adopt a Future Land Use Map	X			City	Staff	GEN
Update Subdivision Ordinance to ensure that new developments meet heightened design/construction standards and both connect with and complement existing development in Wharton	X			City	<$2,000 (legal)	GEN
Establish schedule for regular review of Future Land Use map and Subdivision Ordinance	X			City	Staff	GEN
Consider adopting a Zoning Ordinance to ensure appropriate separation between residential and nonresidential uses	X	X	X	City	<$2,000 (legal)	GEN

GEN = Municipal funds; **CDBG-DR** = Community Development Block Grant Disaster Recovery program; **EDC** = Economic Development Corporation; **FEMA** = Federal Environmental Management Agency hazard mitigation/disaster recovery grants; **Local** = donations of time/money/goods from private citizens, charitable organizations, and local businesses; Staff = Staff time**;** **TDHCA** = Texas Department of Housing and Community Affairs;

*Current HOME grant match is 1% per each 1,000 residents over 3,000 people; HOME rules and match requirements are subject to change

3.8 Appendix 3A: Detailed Housing Data

An exterior/windshield survey of all residential buildings in Wharton was conducted in June 2017 to determine the physical condition of each housing unit in the city and extraterritorial jurisdiction (ETJ). A housing unit can be a single-family detached house, a mobile/manufactured house, or a multifamily unit such as an apartment, condominium, or townhome). The survey rated the condition of each housing unit on a scale from "standard" to "dilapidated" as defined in *Table 3A.1.*

Table 3A.1: Housing Condition Survey Classifications & Criteria

	Criteria
Standard	Few or no minor visible exterior defects such as: • cracked, peeling, or missing paint • cracked, sagging, rotting, or missing siding, steps, porch planks, or other wooden surfaces • cracked or broken window panes • cracked masonry, brick, or mortar surfaces • missing or damaged roof shingles • small rust spots on mobile homes Generally meets local building codes No detriment to health and safety present
Deteriorating	Few visible exterior defects requiring repair beyond routine maintenance such as: • missing or damaged wooden surfaces that could cause injury if walked upon or leaned against • missing window panes • badly deteriorated window frames • major holes in exterior walls, up to one (1) foot across and/or penetrate through the interior walls • roof missing many shingles or has holes up to six (6) inches across • chimney bricks missing • extensive rusting, joint separation on mobile home exterior Rehabilitation is economically feasible
Dilapidated	Fails to provide safe shelter Several of the major defects listed under Deteriorating Any major structural damage such as: • sagging foundation • sagging roof • slanted or tilted exterior walls • missing doors • collapsed chimney or porch • fire or severe water damage Rehabilitation is not economically feasible All non-HUD Code (pre-June 15, 1976) mobile homes are considered dilapidated

Occupancy and vacancy were determined by a visual inspection of each house. Each house was checked for: wired electric meter, yard maintenance, intact blinds and/or visible furniture, undamaged or secured windows, and the condition of yard furniture. *Table 3A.2* tabulates the complete survey results.

Table 3A.2: Housing Data from Windshield Survey

	Type / Condition	Occupancy	City	ETJ	Total Region
Stick-frame	**Standard**	Occupied	1534	401	1935
		Vacant	10	0	10
	Deteriorating	Occupied	671	85	756
		Vacant	24	2	26
	Dilapidated	Occupied	170	23	193
		Vacant	46	12	58
	Total (Occupied)		2,375	509	2,884
	Total (Vacant)		80	14	94
	Subtotal - Stick-frame Homes		*2,455*	*523*	*2,978*

	Type / Condition	Occupancy	City	ETJ	Total Region
Mobile & Manufactured	**Standard**	Occupied	65	46	111
		Vacant	0	0	0
	Deteriorating	Occupied	134	63	197
		Vacant	8	0	8
	Dilapidated	Occupied	19	14	33
		Vacant	6	4	10
	Total (Occupied)		218	123	341
	Total (Vacant)		14	4	18
	Subtotal - Mobile/Manufactured Homes		*232*	*127*	*359*
	Subtotal – Single-family Units		*2,687*	*650*	*3,337*

	Type / Condition	Occupancy	City	ETJ	Total Region
Multifamily	**Standard**	Occupied	906	10	916
		Vacant	117	0	117
	Deteriorating	Occupied	122	0	122
		Vacant	14	0	14
	Dilapidated	Occupied	4	0	4
		Vacant	4	0	4
	Total (Occupied)		1,032	10	1,042
	Total (Vacant)		135	0	135
	Subtotal - Multifamily Homes		*1,167*	*10*	*1,177*

	Type / Condition	Occupancy	City	ETJ	Total Region
Total Housing Conditions	**Standard**	Occupied	2,505	457	2,962
		Vacant	127	0	127
		Total Standard	2,632	457	3,089
	Deteriorating	Occupied	927	148	1,075
		Vacant	46	2	48
		Total Deteriorating	973	150	1,123
	Dilapidated	Occupied	193	37	230
		Vacant	56	16	72
		Total Dilapidated	249	53	302
	Total (Occupied)		3,625	642	4,267
	Total (Vacant)		229	18	247
	Total Housing Units		3,854	660	4,514

Source: GrantWorks, Inc., 2017 Fieldwork Study

3.9 Appendix 3B: Housing Affordability Calculations

Housing units are conventionally considered to be affordable when monthly costs are less than 30% of monthly income. *Table 3B.1: Housing Tenure Data* tabulates the median monthly income, total number of owner- and renter-occupied housing units and the housing costs as a percentage of income for both renters and home owners. Average housing costs for owner-occupied units with a mortgage consume 36% of the median monthly income in Wharton.

Table 3B.1: Housing Tenure Data (2015)

		Wharton	Wharton County
Owner-occupied Units	*Total Occupied Housing Units*	*3,357*	*14,979*
	# of Units	1,613	10,138
	% of Total	48%	68%
	Monthly $ w/Mortgage (median)	$967	$1,204
	% of monthly income	**36%**	**31%**
	Monthly $ w/o Mortgage (median)	$400	$416
	% of Income	**15%**	**11%**
Rental Units	Number of Units	1,744	4,841
	% of total units	52%	32%
	Median monthly rent	$671	$699
	% of monthly income	**25%**	**18%**

** The City housing unit count is from the ACS and does not include additional houses counted in the field survey.*

Source: U.S. Census Bureau; American Community Survey 2012-2016, Tables B25003, B25058, B25088; American FactFinder <http://factfinder.census.gov>

Another affordability measure for housing and a key component of mortgage lending decisions is the price-to-income ratio. The price-to-income ratio is the disparity between median income and median housing value. It provides a measure to answer the question "Is a median priced home affordable for a median income earner?" According to a 2013 article published by Forbes, the typical median home in the U.S. costs 2.6 times as much as the median annual income.[24] *Table 3B.2* shows that Wharton's price-to-income ratio is slightly greater than that ratio for Wharton County but less that the ratio for the state. The ratio for all three geographies is considered affordable.

Table 3B.2: Median Household Income & Housing Values

	Wharton	Wharton County	State
Median Household Income	$32,243	$46,445	$54,727
Median Household Monthly Income	$2,687	$3,870	$4,561
Median Home Value	$78,900	$107,000	$142,700
Median Home Value / Median Household Income	**2.4**	**2.3**	**2.6**

3.10 Appendix 3C: Community Housing Organizations & Grant Programs

Detailed information regarding programs that serve housing needs in Wharton County and Wharton are listed below. Additional information on state and federal programs that may be useful to Wharton's residents may be found by contacting local offices and reviewing individual organizations' websites.

3.10.1 Services Currently Available/Active in Wharton

Houston-Galveston Area Council (H-GAC)

Regional planning commissions, like the H-GAC, are voluntary associations of local governments formed under Texas law. These associations address problems and planning needs that require regional attention or that cross the boundaries of individual local governments. They coordinate planning and provide a regional approach to problem-solving through cooperative action and may provide direct services at the local level.

The H-GAC conducts planning activities, applies for grants for local communities, and administrates programs such as the Area Agency on Aging; solid waste planning, coordination, and project implementation, and is an Economic Development District.

[24] "High Home Price-to-Income Ratios Hiding Behind Low Mortgage Rates" retrieved from: http://www.forbes.com/sites/zillow/2013/04/16/high-home-price-to-income-ratios-hiding-behind-low-mortgage-rates/

Organization / Office:	Houston-Galveston Area Council
Address:	3555 Timmons, Suite 120 PO Box 22777 Houston, TX 77027
Phone / Email:	(713) 627-3200
Website:	http://www.h-gac.com
Counties Served:	*Austin, Brazoria, Chambers, Colorado, Fort Bend, Galveston, Harris, Liberty, Matagorda, Walker, Waller, Wharton*

Area Agency on Aging

Local area agencies on aging (AAAs) are affiliated with the Texas Department on Aging and receive State and federal funds to help coordinate local elderly care for those over age 60. Services the agency provides include: Nursing Home Ombudsman, Benefits Counseling (legal information), Care Coordination (in-home assistance with meals, minor repair, health care, etc.), Caregiver Support Program (counseling/assistance to caregivers) and some additional services (health and wellness). The Houston-Galveston Area agency on Aging serves older Texas in the Houston-Galveston Area Council.

The Department of Health and Human Services provides an online eldercare locator that include the option for online chat at http://www.eldercare.gov/eldercare.NET/Public/index.aspx.

Organization / Office:	Houston-Galveston Area Agency on Aging
Address:	355 Timmon Lane; Suite 120 Houston, Texas 77027
Phone / Fax:	(713) 627-3200
Website:	https://www.h-gac.com/human-services/aging/
Counties Served:	*Bastrop, Blanco, Burnet, Caldwell, Fayette, Hays, Wharton, Llano, Travis, Williamson*

Organization / Office:	Wharton County Junior College (Local Senior Center)
Contact:	Caroline Osbourne, Director of Lina Salis, Program Secretary
Address:	911 Boling Highway Wharton, Texas 77488
Phone / Fax:	((979) 532-6430
Website:	https://www.h-gac.com/human-services/aging/senior-center-services.aspx#Wharton
Services	Congregate meals, home-delivered meal, transportation

3.10.2 Grants/Loans & Organizational Resources Available to the City

Texas Department of Housing and Community Affairs (TDHCA)

TDHCA is the state agency responsible for promoting and preserving homeownership, as well as financing the development of affordable rental housing. The agency has programs to build and to rehabilitate single-family and multifamily housing. The City can apply for funding to:

- Assist with multifamily unit rehabilitation projects; (Rental Housing Development Program);
- Assist renters, including veterans and persons with disabilities, with utility and security deposits (Tenant Based Rental Assistance Program, Tenant Based Rental Assistance Program for Persons with Disabilities, and the Veterans Housing Support Program);
- Provide down payment assistance to individuals who have not owned a home in three years or who are first-time home buyers (Texas HOMEbuyer Assistance Programs);
- Repair or replace substandard homes for low-to-moderate income residents (HOME Rehabilitation Program and Homeownership Assistance Program); and
- Construct home accessibility projects for disabled residents (Amy Young Barrier Removal Program)

Organization / Office:	Texas Department of Housing & Community Affairs
Address:	221 East 11th Street Austin, Texas 78701
Phone / Email:	(512) 475-3800 or (800) 525-0657 / info@tdhca.state.tx.usa
Website:	www.tdhca.state.tx.us

U.S. Department of Agriculture Rural Development (USDA-RD)

The mission of USDA-RD is to improve the economy and quality of life in rural America. USDA programs include homeownership opportunities, owner-occupied housing assistance, rental assistance, rental housing development, community development activities, business development, and technical assistance in rural areas of the State (generally considered areas with a population of less than 20,000 people). Programs include:

- Loan Program: USDA-RD Guaranteed Rural Housing Loans for Single-family Dwellings offers help for people who want to own a home but cannot pay a down payment. Low and moderate-income applicants can have closing costs associated with purchasing a house financed into the loan up to the appraised value of the property. Loans can be for new or existing homes. The Guaranteed Rural Housing Program charges a 1.5% guarantee fee that is due at closing. Generally, the program targets communities with populations of 10,000 or less in locations not closely associated with urban areas.

- Direct Loan Program: Individuals can apply for direct loans through the area offices.

- Rural Repair and Rehabilitation Loans: Used to modernize existing homes by adding bathrooms, central heating, modern kitchens, and other improvements such as driveways and foundation plantings. Individuals who meet the requirements should contact USDA directly for these loans. The USDA Rural Development Angleton Area Office accept applicants from Wharton. Some seniors may be eligible for grants of up to $7,500 for home repairs.

Programs are explained at www.rurdev.usda.gov/ProgramsAndOpportunities.html or the following offices can be contacted.

Organization / Office:	US Department of Agriculture Rural Development / Angleton Area Office
Address:	711 N. Velasco, Suite B Angleton, Texas 77515
Phone / Email:	(979) 549-0215, Ext. 4

Organization / Office:	US Department of Agriculture Rural Development / State Office
Contact:	John Kirchoff, USDA Rural Development Housing Programs Director
Address:	101 S Main Street Temple, Texas 76501
Phone / Email:	(254) 742-9770; John.Kirchoff@tx.usda.gov

Texas Affiliation of Affordable Housing Providers (TAAHP)

TAAHP is a non-profit association of affordable housing developers, financers, and designers throughout Texas. The goal of TAAHP is to "increase the supply and quality of affordable housing for Texans with limited incomes and special needs," and the organization's primary focus is on education and lobbying. The group is a good starting place for communities interested in affordable housing projects. It provides communities with networking opportunities (through conferences and newsletters) to market available land, seek financing information, and/or discuss changes to state laws that could bring more affordable housing to their cites.

Organization / Office:	Texas Affiliation of Affordable Housing Providers
Address:	221 East 9th Street, Suite 408 Austin, Texas 78701
Phone / Email:	(512) 476-9901
Website:	http://www.taahp.org/

Rural Rental Housing Association of Texas (RRHA)

RRHA is a non-profit association of professionals involved in the development and management of rental housing in rural Texas. Like TAAHP, the organization provides communities with networking opportunities and lobbying for the industry as well as technical assistance and training for housing providers.

Organization / Office:	Rural Rental Housing Association of Texas
Address:	417-C West Central Avenue Temple, Texas 76501
Phone / Email:	(254) 778-6111
Website:	http://www.rrhatx.com/index.php

3.10.3 Grants/Loans & Organizational Resources Available to Residents

Galveston County Community Action, Inc.

Galveston Community Action, Inc. is a non-profit organization that provides assistance through programs including head start, utilities assistance, and community service block grant (employment assistance, budget counseling, energy conservation training, rental assistance, municipal water assistance, etc.). GCCA's mission is to "meet the needs of low-income families throughout the four county service areas of Brazoria, Fort Bend, Galveston, and Wharton to enhance the quality of their lives by eliminating poverty and promoting self-sufficiency.

Organization / Office:	Galveston County Combined Community Action, Inc. (Wharton Outreach Center)
Address:	213 B N. Richmond Rd Wharton, Texas 77488
Phone / Email:	(979) 532-8222
Website:	http://www.gccac.org/
Counties Served:	*Brazoria, Fort Bend, Galveston, Wharton*

Texas State Affordable Housing Corporation (TSAHC)

TSAHC is a self-supporting, not-for-profit organization created by state statute in 1994 to provide safe, decent, and affordable housing for low-income Texans and other underserved populations. TSAHC provides a variety of affordable housing programs that range from First-time Homebuyer Programs for individuals and families. Programs provide low-interest financing to individuals, particularly first-time homebuyers, teachers, paid firefighters, EMS personnel, peace officers, correction of juvenile corrections officers, county jailers and public security officers. It also provides various financing options for developers of both single-family and multifamily housing, portions of which would serve low-to-moderate income tenants. Programs are listed on the agency website at www.tsahc.org. The agency can be reached at 512-477-3555 or 888-638-3555.

Aging in Place

Aging in Place is a joint program of Partners for Livable Communities and the National Association of Area Agencies on Aging. It provides regional workshops and jumpstart grants to facilitate conversations and form action plans that address issues of aging in place within a community. Past JumpStart grants have been used to create programs that assist seniors with home maintenance and lawn care, provide paratransit services to help senior residents remain an active part of their community, and create "return visit" programs where nurses/social workers visit regularly to identify possible issues that may impair the individual's ability to remain in their home. For information, contact Penny Cuff, Vice President of Programs for Partners for Livable Communities by emailing pcuff@livable.org or calling (202) 887-5990. Website: www.aginginplaceinitiative.org

Additional resources on aging in place can be found through national networks:

National Aging in Place Council (www.ageinplace.org)
Senior Resource (www.seniorresource.com/ageinpl.htm)

Texas Ramp Project

Texas Ramp Project is a non-profit agency that relies on volunteers, foundations, civic organizations, and corporate partners to build ramps for low-income elderly and disabled residents. Since it was established in 2006, the organization has built over 3,428 ramps throughout the state. The yes!organization accepts client referrals from social service agencies through its 33 service areas. Social service agencies can refer clients by submitting an online form to their respective service area. The Texas Ramp Project does not currently serve San Patricio County, but may expand operations in the future.

Organization / Office:	Texas Ramp Project / Central Administration Office
Address:	PO Box 832065 Richardson, Texas 75083
Phone / Email:	(214) 675-1230 / info@texasramps.org
Website:	http://www.texasramps.org/

Texas Association of Structural Movers (TASM)

TASM is a statewide trade organization for structural movers. Their website provides an easy to use Member Directory that is organized by region. It also provides an Online Quote Engine to send a request for services to all TASM members. The organization is a good source for helpful information about the house moving process and permitting requirements.

Organization / Office:	Texas Association of Structural Movers
Contact Name:	Joe McCullough, Executive Director
Address:	1306-A West Anderson Lane Austin, Texas 78757
Phone / Email:	(512) 454-8626 / jmccullough@assnmgmt.com
Website:	www.texashousemovers.com

The ReUse People of America

The ReUse People of America provide deconstruction services across the country. With over 20 years of experience in the deconstruction industry, they are experts in making sure that homeowners get as much salvageable material as possible. Their expertise is important because the value of the salvageable material will determine the tax deduction that a homeowner can take on the donated deconstructed materials. In addition to deconstruction services, The ReUse People of America conduct job training seminars. In the past, they have worked with cities to provide job training for unemployed and underemployed residents.

Organization / Office:	The ReUse People of America
Contact Name:	Mike Thrutchley, Deconstruction Manager, Texas Regional Office
Phone / Email:	(214) 251-2306 / mikethrutchley@thereusepeople.org
Website:	http://www.deconstructiontexas.com/
Corporate Office	9235 San Leandro Street Oakland, California 94603 (510) 383-1983 / info@thereusepeople.org

Pure Salvage Living

Pure Salvage Living is Tiny Texas Houses' salvage operation. They salvage materials from dilapidated and decaying structures before completing demolition. They can deconstruct a structure and leave the salvaged materials for the property owner, or they can keep the salvaged materials. The Pure Salvage Living website is a good source for homeowners trying to locate deconstruction professionals in their area. The website is also the best way for homeowners to have their project evaluated. It includes an online form where homeowners can input information about the size, condition and location of the structure that needs to come down, along with the desired project timeframe. Pure Salvage Living reviews deconstruction projects on a case by case basis. All fees for deconstruction must be worked out directly with Pure Salvage Living or their representatives.

Organization / Office:	Pure Salvage Living
Address	20501 East I-10 Luling, Texas 78648
Phone / Email:	(830) 875-2500
Website:	www.puresalvageliving.com

Legal Aid Services

Local legal aid organizations provide civil legal representation and advice at little or no cost to low income individuals who cannot afford a lawyer. Legal aid focuses on legal issues relating to basic needs, self-sufficiency, children and families, elderly and disability, and housing and homelessness prevention.

Texas Rio Grande Legal Aid (www.trla.org/) serves communities around Texas with legal aid in housing, family, health, public benefits, education, employment, individual rights, fair housing, and many other areas. Wharton County residents do not have access to a satellite office but should reach out to the Telephone Access to Legal Justice Program in Austin.

Organization / Office:	Texas Rio Grande Legal Aid / Austin TAJ Program
Address	4920 North I-35 (Austin Office) Austin, Texas 78751
Phone / Email:	(888) 988-9996 Austin Office: (512) 347-2700
Website:	http://www.trla.org/office

Leader Dog for the Blind

Leader Dog works to improve the mobility and independence of blind or visually impaired individuals by partnering them with a guide dog. Applicants complete a 26-day residential training program and must be 16 years or older and in good mental and physical health. The training program is located in Rochester Hills, Michigan and is offered at no cost. Room and board and transportation costs to and from the training program for clients traveling within the United States are also provided free of charge. The organization also offers orientation and mobility and GPS programs to professionals and clients. Applicants can apply online at or can download an application to print and mail.

Organization / Office:	Leader Dogs for the Blind
Address	1039 South Rochester Rd. Rochester Hills, Michigan 48307
Phone / Email:	(248) 651-9011, Toll Free (888) 777-5332, TTY (248) 651-3713 / leaderdog@leaderdog.org
Website:	http://www.leaderdog.org

Rural Rental Housing Association of Texas (RRHA)

RRHA is a non-profit association of professionals involved in the development and management of rental housing in rural Texas. Like TAAHP, the organization provides communities with networking opportunities and lobbying for the industry as well as technical assistance and training for housing providers.

Organization / Office:	Rural Rental Housing Association of Texas
Address:	417-C West Central Avenue Temple, Texas 76501
Phone / Email:	(254) 778-6111
Website:	*http://www.rrhatx.com/index.php*

4 LAND USE STUDY

The location and extent of land uses in a community affect property values, city service expenditures, traffic flow, aesthetics, and economic development potential. The Existing Land Use Map (*Map 4A*) shows land development patterns within the city limits and extraterritorial jurisdiction (ETJ).[25] The Future Land Use Map (*Map 4B*) and Land Use Study provide legal support for a City's Zoning Map, showing desired future land uses according to the Comprehensive Plan. The Future Land Use Map also helps the community plan for infrastructure to guide the desired direction of future growth.

4.1 Highlights

Approximately 60% of the land in Wharton is made up of Agriculture/Undeveloped (22%), Single-Family (18%), and Right-of-Way (21%). The next largest land-use category is Semi-developed with 12% and Institutional at 7%. Wharton has more land than usual for a city its size devoted to transportation because almost 7.75 miles of major highway (U.S. 59) run through the city. Recreational, Commercial, Industrial, Institutional and Public land uses all account for under 5%.

Residents are interested in these primary areas of land use improvement:

- Improve the visual appearance of the city, including more aggressive code enforcement, dilapidated building removal, improved landscaping, and signage;
- Preservation of the city's character including the downtown's historic origins and traditional use as a commercial center;
- Increase development within the city;
- Increase in mixed-use developments;
- An increase in overall housing along with different types of housing; more commercial development along major thoroughfares; and new recreational opportunities.

[25] The City's ETJ is the area within ½ mile of the city limits within which the City can control land development patterns through its subdivision ordinance

All of the above uses are represented in *Map 4B: Future Land Use 2028* as increased residential development – consisting of single-family, small-scale multifamily (4 units or fewer) and larger-scale multifamily – in existing residential neighborhoods and near commercial hubs; increased commercial development, including the addition of mixed-use development (commercial on the ground floor, residential on the upper floors), along and near commercial hubs; and new neighborhood and linear parks throughout the city.

4.2 Context: History & Community Input

Previous Land Use

The city of Wharton has not conducted a previous land use study.

Community Input

A detailed discussion of community input collection is located in *Chapter 1: Community Goals & Objectives.* The particular concerns expressed by residents that relate to land use are:

Achieve/Preserve	Avoid/Eliminate
▪ More Commercial Land Uses – restaurants, franchise establishments ▪ More service and retail establishments that cater to tourists and residents ▪ New city parks for residents, connect existing parks ▪ More housing of different types	▪ Vacant commercial buildings ▪ Dilapidated structures & Junked yards

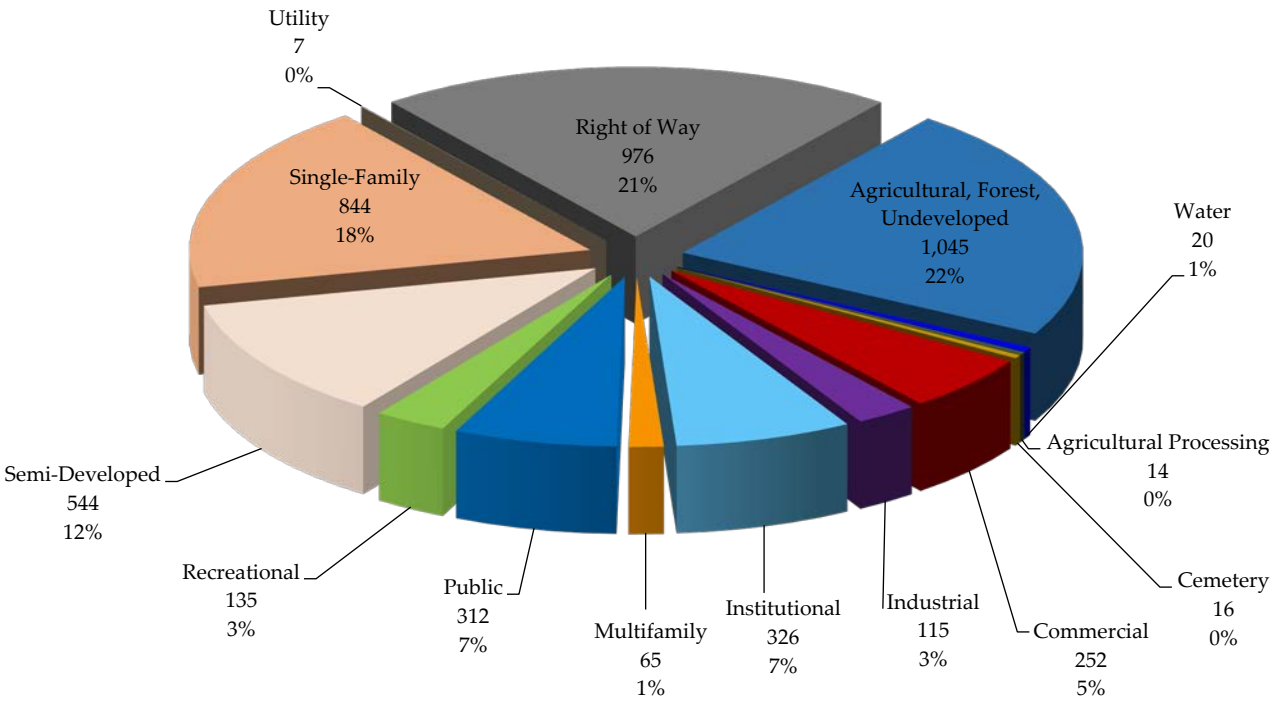
4.3 Inventory & Forecast

4.3.1 Existing Land Use

Wharton's land use in 2018 is characterized by:

- Approximately 4,670 acres in the city limits; approximately 1,590 acres semi-developed,[26] undeveloped, or agriculture.
- Approximately 844 acres of single-family residential land (an average 0.3 acres per house).
- Approximately 976 acres of right-of-way, an unusually large amount for a town Wharton's size, which is attributable to almost 7.75 miles of major highway running through the city.
- Separation of commercial, residential, and industrial land uses (see *Map 4A*). Residents do not feel that there are conflicts between land uses within the City.

Chart 4A: Land Use Percentages



Source: GrantWorks Fieldwork 2017

Definitions, detailed tables, and an explanation of the methodology used to calculate land use can be found in *Appendix 4A.*

[26] Subdivided and provided with city services, but no building on the property

4.3.2 Land Use Considerations

Environmental Factors

Environmental factors affecting construction include the Colorado River, Caney Creek, channelized streams, floodplain, and soil type. Those factors do not prevent construction, but given the extensive destruction caused by recent flooding events, future construction should be built to ensure that structures are out of or above the floodplain and that design features are installed to minimize the impact of flooding on properties.

Approximately 2,858 acres within the city limits are located in the 100-year floodplain, accounting for 61% of the city area. Floodplain property includes all types of land uses, including 24 multifamily properties and 1,561 single-family properties. Within the city limits, 1,489 single-family homes are located within the floodplain, and an additional 389 homes in the City's ETJ are located within the floodplain.

The primary limiting soil factors in Wharton are shrink-swell, the contracting and swelling of soils as moisture content changes, and depth to saturated zone. The presence of limiting factors does not prevent construction, but it can make initial development and long-term maintenance more expensive. All soils found in Wharton have the lowest buildability rating possible and thus all houses in Wharton have been constructed in areas with some soil limitations on construction of streets, small commercial buildings, or 1-3 story single-family homes.

Soil Types are illustrated in *Figure 4A* below. Detailed soil data is available through the U.S. Department of Agriculture – Natural Resources Conservation Service.[27] Floodplain construction issues are discussed in *Chapter 3: Housing Study*.

[27] http://datagateway.nrcs.usda.gov/GDGOrder.aspx

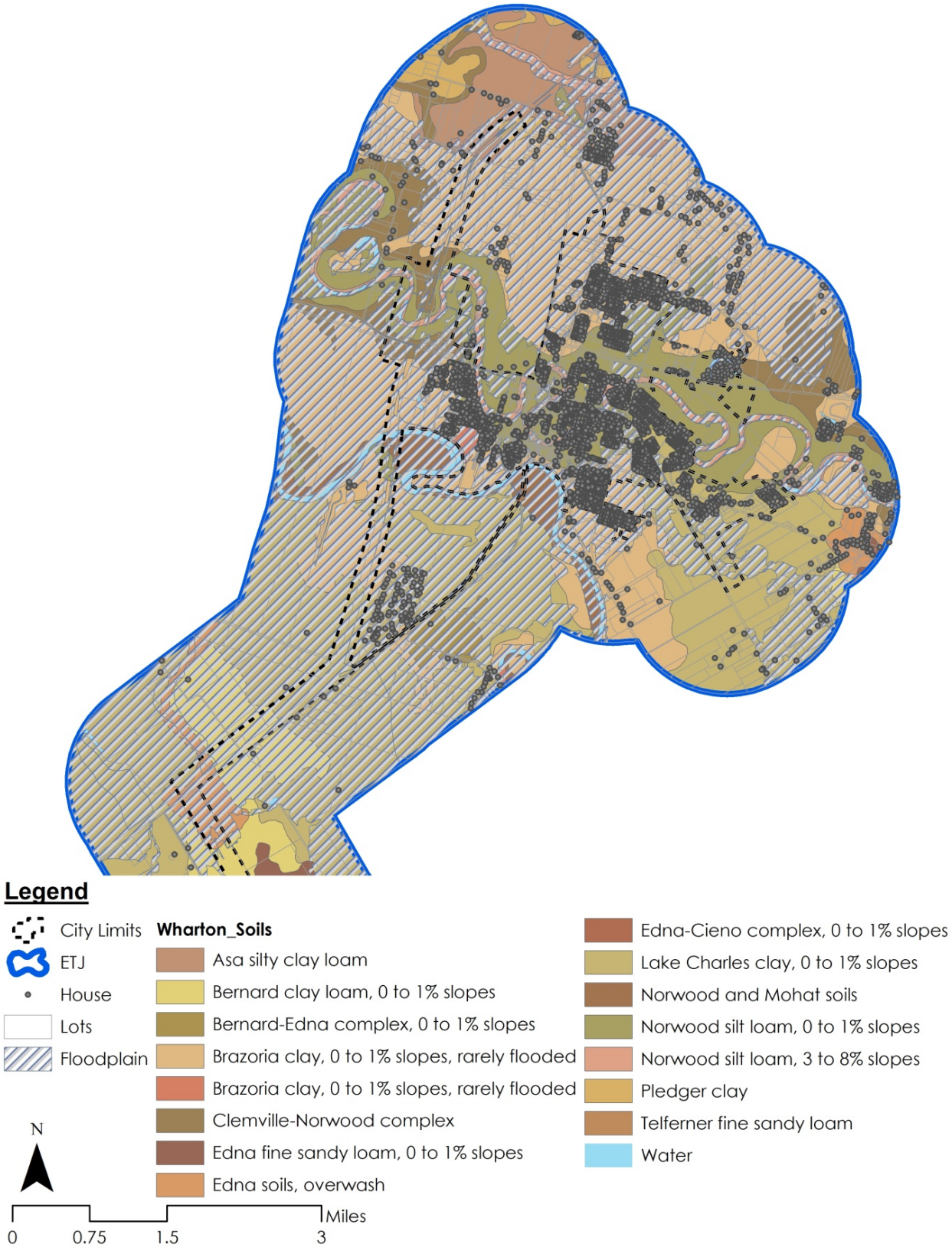


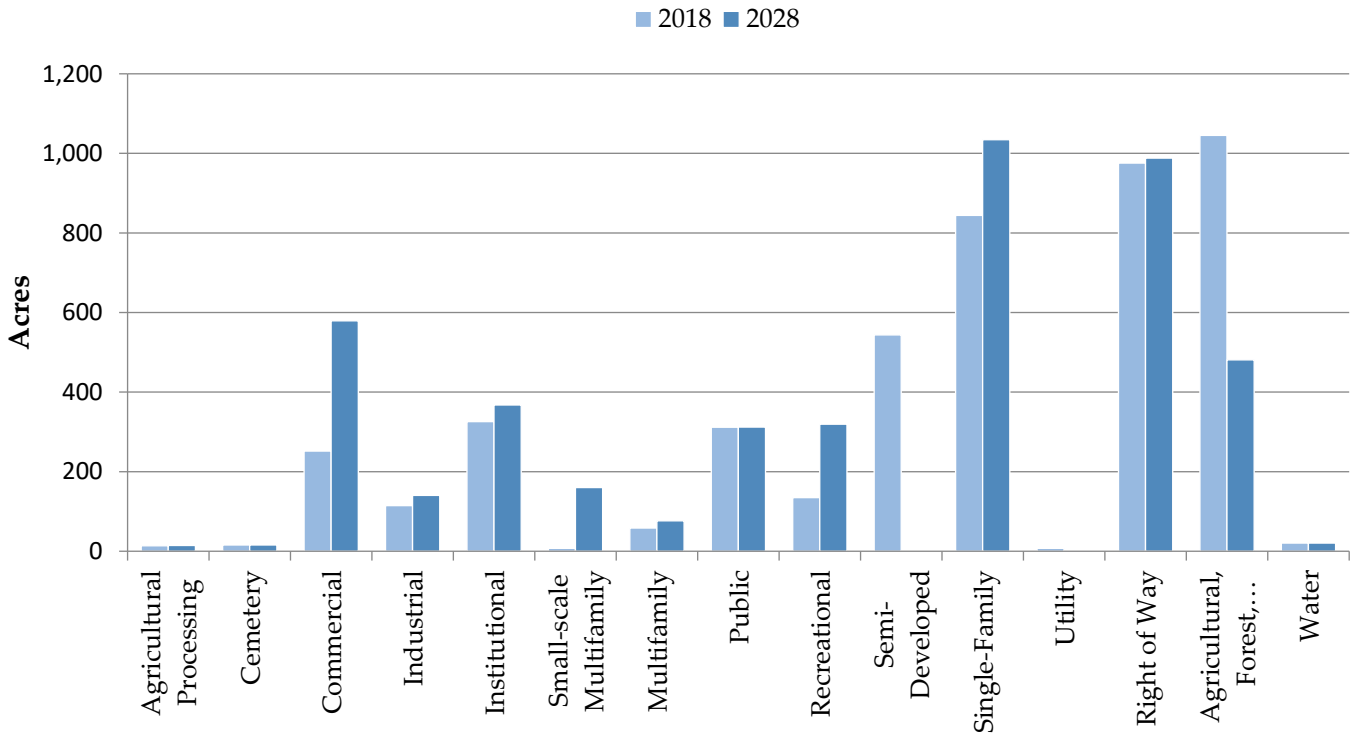
Figure 4A: Soil Types & Buildability

Future Land Use

Wharton is expected to experience some changes in land use patterns over the next 10 years based on a forecasted population increase from 9,063 to 11,120 residents (increase of 2,057). The City's proximity to Houston via US 59/IH 69 is expected to contribute to population growth over the planning period. There are no limitations on land development caused by public utilities, topography, or city facilities/utilities, though flooding remains a serious concern throughout the City.

Within the city limits, some undeveloped agricultural and semi-developed lots are likely to be developed as single-family, small-scale multifamily, large-scale multifamily, mixed-use, and commercial properties. New development in the ETJ is likely to locate in parcels adjacent to the central city and along the freeways. All changes are shown on *Map 4B*.

Chart 4B: City Land Use Change (2018 – 2028)



4.4 Key Land Use Considerations

4.4.1 Remove & Replace Vacant/Dilapidated Buildings; Ensure Distressed Properties are Maintained

The survey of housing conditions conducted in May 2017 found 56 lots that had vacant, dilapidated houses. A more recent survey of the Central Business District in March, 2018 found 14 vacant buildings.

These vacant and dilapidated structures are both a hindrance to future development – occupying valuable real estate and creating an impression of disinvestment – and a potential boon to the City. Because they exist on land that is already subdivided and connect to City services, development costs for new structures are lower than for greenfield development.

Currently, the city has adopted and enforces ordinances that minimize the number of substandard buildings and junked yards in the city limits. Those include:

- Substandard Structures Ordinance
- Health and Sanitation Ordinance

These ordinances are discussed in *Chapter 3: Housing Study*.

Figure 4A: Vacant & Dilapidated Business

In addition to these City-initiated actions the City can work to motivate property owners to voluntarily clean up their buildings and yards. To do so, the City should identify property owners, approach those owners about rehabbing buildings or encourage property owners to sell the property. In the case of valuable properties near the downtown, the EDC currently runs a Business Restoration program that provides grants to preserve, protect, enhance, and encourage activity in the existing buildings. In addition, the EDC could start a revolving loan fund with help from the US Department of Agriculture for rehabilitating or developing high-priority properties (https://www.rd.usda.gov/programs-services/rural-business-development-grants).

Currently, the EDC maintains a map-based inventory of available commercial buildings that allows users to search by building and site size. This is a useful tool for making information easily accessible to interested business owners and developers.

In order to minimize the presence of poorly kept properties the City, in addition to enforcing its Health and Sanitation laws, could organize activities that have been successful in other communities Wharton's size include:

1. Competitions for "yard of the month," "best garden," and/or "best maintained property" with signs posted monthly or quarterly on the winning properties.
2. Self-assessments. It is easy for anyone to become used to the status quo of how something looks. One effective way to make property owners refocus on their property is to ask them to conduct a self-assessment of their property's appearance. A "Self-Assessment Questionnaire" used in another small city is included in the *Digital Appendix* to this study. The questionnaire was sent by a volunteer group working on image improvement to owners of properties on that city's main thoroughfares. The volunteers included a letter explaining the project and requesting that owners evaluate their properties. The letter resulted in approximately 50% of property owners conducting repair and maintenance work.
3. Mowing clubs can be started as Eagle-Scout projects or by neighborhood groups. They are designed to assist low-income seniors in the community who may be unable to maintain their properties. The Aging in Place Initiative is one organization that has successfully implemented such a program.[28]

In order to encourage development, the City should continue projects that improve the appearance of neighborhoods and commercial development and that make the city a more visibly attractive place to live. Many activities are recommended in other parts of this Comprehensive Plan.

The Texas Department of Transportation and Keep Texas Beautiful sponsor a scholarship competition for high-school students involved in trash-off organization. In addition, Keep Texas Beautiful and its local affiliates offer a variety of programs, including youth and educational programs, as well as grant opportunities. The City of Wharton participates in the Keep Texas Beautiful program. The City of Wharton Beautification Committee oversees related activities. More information about Keep Texas Beautiful Programs is available as www.ktb.org/programs/litter-prevention/dont-mess-with-texas-trash-off.aspx and http://dontmesswithtexas.org.

[28] See www.aginginplaceinitiative.org and information in Appendix 3C (*Housing Study)*

4.4.2 Continue Historic Downtown Preservation; Focus New Development in/around CBD

Wharton's three National Historic Register Districts represent both an acknowledgment of the downtown's value and an untapped marketing opportunity that could draw more residents and business to the City. Communities often fail to recognize which of their characteristics non-members find important or attractive; therefore, it can be challenging but useful to receive the kind of recognition represented by the NHR listing.

Studies have shown that areas designated as historic districts typically have property value appreciation each decade between 5-35% more rapid than comparable, undesignated districts.[29] Similarly, the preservation of amenities commonly found in historic districts, and often lost in new construction, adds value to properties. Furthermore, the urban design characteristic of historic districts, such as streets that accommodate pedestrian and bicycle as well as automobile traffic (and typically include features such as uniform setbacks, trees, benches, etc.) – create the following advantages.[30]

- Retail sales increase through accommodating non-auto users and creating an appealing space for pedestrians and shoppers
- More residents shop locally due to reduced travel time and added convenience
- New development and businesses are attracted to the area
- Residential property values increase because, in general, homeowners will pay a premium to reside in walkable communities
- Office and retail property values increase[31]

A study of 15 U.S. cities showed a residential property premium in more walkable neighborhoods of approximately $4,000 to $34,000.[32]

From a land use perspective, the City should strongly consider regulations and public investments that:

- Preserve existing historical structures and lot layouts
- Encourage new construction that matches or enhances existing historical structures and lot layouts
- Provide additional practical and/or aesthetic benefits that will draw people to the downtown.

[29] Mabry, Jonathan. "Benefits of Residential Historic District Designation for Property Owner" (2007). See accompanying Digital Appendix or www.preservationnj.org
[30] See www.completestreets.org/complete-streets-fundamentals/factsheets/economic-revitalization/ for examples and studies
[31] Pivo, G. & Fisher, J.D. (2010). The Walkability Premium in Commercial Real Estate Investments. Retrieved from http://merage.uci.edu/ResearchAndCenters/CRE/Resources/Documents/01%20-%20Fisher-Pivo%20Walkability%20Paper.pdf
[32] Cortright, J. (2009). Walking the Walk. Retrieved from www.ceosforcities.org/work/walkingthewalk

Ordinances

The City of Wharton does not possess a zoning ordinance. In order to protect the buildings and character of the historic downtown, and promote new development that is in accordance with the character of the existing buildings in the historic district, the City should adopt a historic preservation ordinance. Texas Local Government Code (Sec. 211.003) provides that "In the case of designated places and areas of historical, cultural, or architectural importance and significance, the governing body of a municipality may regulate the construction, reconstruction, alteration, or razing of buildings and other structures." No limits are placed on the type of city with regards to that type of regulation. The Texas Historical Commission has produced a model ordinance, and that ordinance and the version of that ordinance adopted by Fredericksburg are included in the *Digitial Appendix* to this plan. Mount Vernon, a General Law Type A city in northeast Texas has also been widely recognized for the success of its historic preservation efforts.[33] Grapevine, TX has a useful FAQ related to its historic preservation ordinance listed on its website.[34]

Financial Incentives

- Tax credits: The inclusion of the historic downtown in the Register should enable property owners to more easily qualify individual buildings as historic properties on the Register (a separate process). Income-producing properties on the Register can qualify for a 20% tax credit for rehabilitation.[35]

- Tax abatement: A number of cities have created tax abatement programs, which exempt rehabilitated buildings in designated historic districts from property tax increases for a set period. The abatement is most often used to help property owners offset rehabilitation costs.

- Grants: Some cities use EDC 4A or 4B tax income to fund matching grants that help property owners rehabilitate building exteriors. Such grants can be used to encourage improvements to historic or non-historic structures but are typically available for rehabilitation that meets specific design criteria.

Bringing New Development to the Downtown

In addition to adopting a historic preservation ordinance that will protect existing historic structures in the downtown and ensure future structure retain the historic character, the City should network with local, regional, and national developers to invest in vacant buildings and land within the downtown area to increase both commercial and residential opportunities.

In addition, the City should implement suggestions for connecting the downtown area to the riverfront discussed in further detail in *Chapter 12: Central Business District Study.*

[33] Mount Vernon's historic preservation ordinance is available at www.comvtx.com/
[34] www.grapevinetexas.gov/IndividualDepartments/HistoricPreservation/HistoricPreservationFrequentlyAskedQuestions.aspx
[35] See www.nps.gov/tps/tax-incentives.htm for details.

4.4.3 Encourage Infill Development to: Minimize Infrastructure Costs, Preserve Hunting/Agriculture Land, Maintain Housing Affordability, & Revitalize Downtown

To encourage infill development during the planning period, the City should focus on the following concepts:

Encourage the development of semi-developed lots inside the city limits.

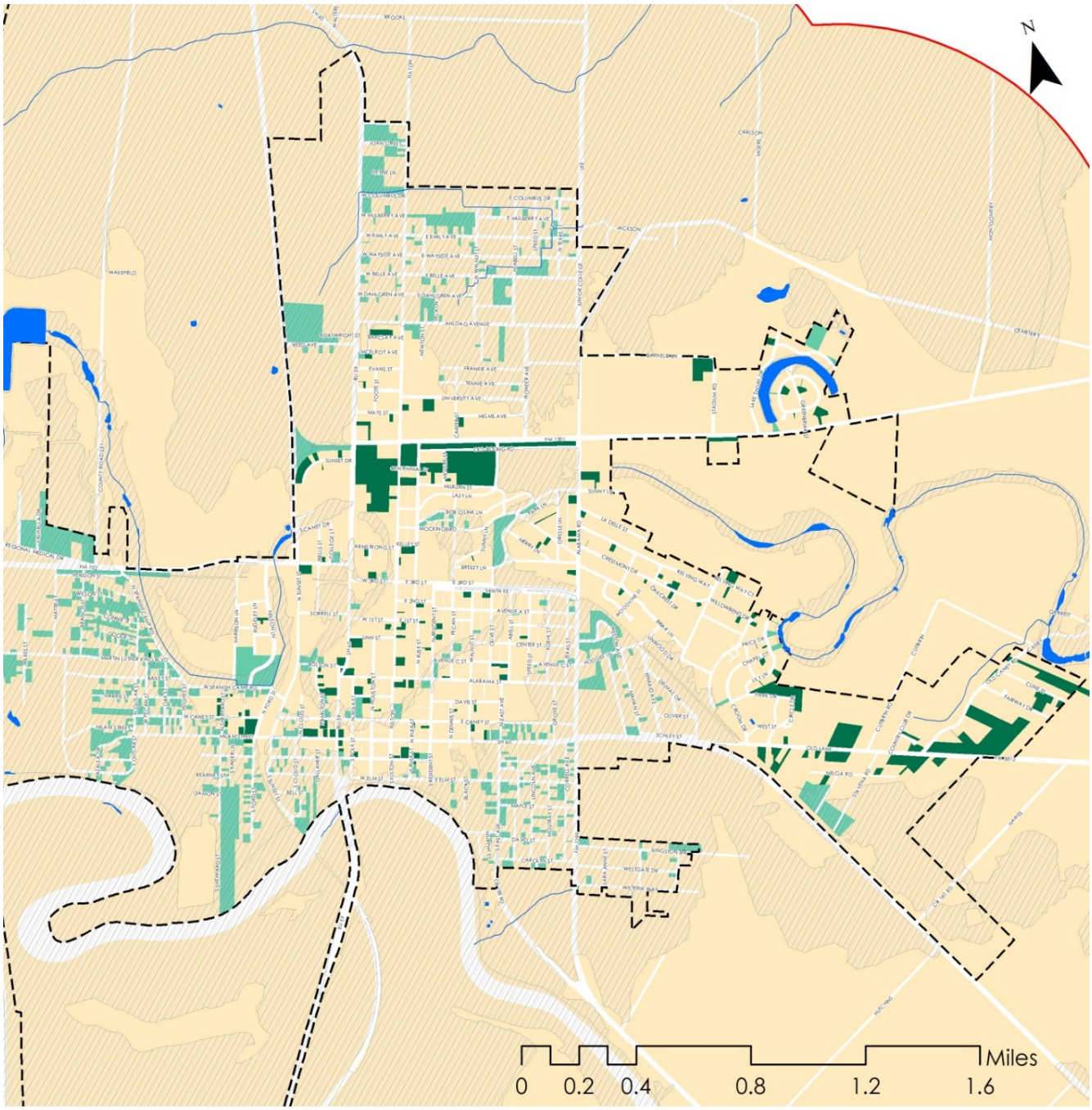
There is enough undeveloped land in the city limits to accommodate a 23% population increase over the planning period; the need for 1,084 new, single-family homes; new multifamily homes; and new commercial highway development.

Within the city limits of Wharton, there are 382 acres that are:

- Either vacant or undeveloped
- Within 100 linear feet of water and sewer distribution lines
- Located adjacent to public right of way and paved or dirt streets

Of those 382 acres, 126 are outside of the 100-year floodplain. The remaining 256 acres are currently within the floodplain, though those numbers will change if the proposed Army Corps of Engineers levee is constructed along the Colorado River as it flows through Wharton.

Figure 4B (next page) shows all of Wharton's semi-developed land as defined by those criteria, and a large-scale version of the map in PDF format is included with the *Digitial Appendix* to this study. That map should be posted on the City's website and at city hall to demonstrate the type and variety of undeveloped land within the city limits.



Legend

- City Limits
- Extraterritorial Jurisdiction
- Lots
- Streams
- Lake or Pond
- FEMA Effective Floodplain

Developable Land

- Easily Developable
- Less Easily Developable

Figure 4B: Developable Areas

To facilitate infill development, the City should

- Until construction of the levee is complete, encourage new subdivisions and developments to locate outside of the floodplain by posting the FEMA Flood Insurance Rate Map at city hall and on the city website;
- Limit extension of services beyond the city limits unless a large development is proposed in a priority annexation area (see *Figure 4G*);
- Adopt and enforce a new subdivision ordinance and public works construction manual to ensure the provision of high-quality infrastructure when new development occurs;
- Adopt a future land use map that illustrates where infill development will occur and what type of infill development is prioritized by the community. Adopt a zoning ordinance and zoning map that can be used to achieve future land use goals.

To attract development to the city limits, the City should

- Conduct the recommendations to minimize junked yards and support the historic downtown, discussed above;
- Carry out the projects discussed in *Chapter 11: Recreation & Open Space* to improve the City's recreation facilities and open spaces;
- Improve the appearance of properties along major thoroughfares. Development along Wharton's thoroughfares serves as the publicity for the City and determines the first impression of potential residents and investors;
- Work with owners of vacant land and properties to either renovate existing structures, develop property or sell their properties;
- Market semi-developed properties to potential developers and business owners.

4.4.4 Guide Future Growth to Ensure Wharton Develops in a Sustainable Manner that Retains the City's Character

As growth from the Houston metro-area begins to apply pressure to Wharton, it is important for the City to take steps to preserve its small-town atmosphere while allowing for new growth that is in line with the existing character of the city. Residents and city officials would like to see commercial development focused within the downtown and along the main commercial corridors within the city, and to see increased residential development (of various typologies) within the central city. To achieve this, the City should adopt a revised future land map use, adopt a zoning ordinance, and revise the subdivision ordinance to provide the conceptual and legal framework to shape future development.

Features of the zoning ordinance should include:

- Establish a regular schedule for reviewing and amending the Future Land Use Map and zoning ordinance to adjust to changing conditions;
- A Historic Preservation District around the Wharton County Courthouse and along Milam Street extending west from the Courthouse;
- Mixed-use walkable districts to allow mixed-use development in desired locations with consideration being given to the integration of uses in multi-story buildings or in separate use buildings on a single site that are designed to support one another;
- Several residential districts that allow for a variety of housing types including: large lot single-family, small lot single-family, townhouses, small-scale multifamily (duplexes, triplexes, quadplexes), and apartments/condos;
- Allowing cluster development that preserves the natural character and open space and environmentally sensitive areas;
- Incorporating development standards to ensure that industrial uses are adequately buffered and screened from adjacent uses and public view;
- Multiple commercial districts that allow for a wide array of uses along with site guidelines that enforce maximum setbacks and require build-to lines, screening, and façade standards that improve the appearance of properties along the major thoroughfares.

As illustrated in *Figure 4C,* Wharton's main thoroughfares are populated with businesses that range from 40 to 250 feet from the highway. This variation in setbacks, the lack of façade or screening standards, and the large distance between buildings and the street creates a generic auto-oriented streetscape that is convenient for parking, but uninviting for those on foot or bike.

Figure 4C: US Business 59/E Boling Hwy – Setback Variation

Amending what the City requires and encourages of development on the main thoroughfare would, over time, contribute to local efforts to increase residents' pride and encourage new business and population growth.

Wharton's thoroughfares currently resemble those in Lubbock, while residents would like to encourage development more like that seen in some parts of Dallas (see *Figures 4D and 4E, next page*).

Figure 4D: Oak Lawn, Dallas

Auto-oriented, pedestrian accessible development[36]

Figure 4E: 34th St, Lubbock

Auto-oriented development with limited pedestrian features (narrow sidewalk on right, wide driveways, no trees in right of way)[37]

[36] Images downloaded from Google Streetview.
[37] Images downloaded from Google Streetview.

The Dallas and Lubbock street sections have a number of similarities: the buildings in both locations have masonry/hardwood/cement facades, plenty of windows, and neither street boasts amenities such as benches, decorative lighting, or underground telephone wires. Nevertheless, basic differences in layout and maintenance give the Dallas street a much more appealing aesthetic than the Lubbock street. Reasons for the difference include:

Oak Lawn (Dallas)	34th St (Lubbock)
• 4 traffic lanes • Few, minimally sized parking lot entrances • Wide, well-maintained sidewalk • Deep awning and walkway in strip-mall • Vegetation along street • Well maintained streets and buildings	• 5 traffic lanes • Frequent, wide parking lot entrances • Narrow, poorly maintained sidewalk • Shallow awnings and walkway in strip-mall • No vegetation along street • Poorly maintained streets and buildings

4.4.5 Permit & Encourage Alternative Development Types

Planned Unit Developments and Cluster Developments are two types of development that many municipalities are encouraging as alternatives to traditional suburban development.

Planned Unit Development (PUD)

A PUD is a designed grouping of varied and compatible land uses, such as housing, recreation, commercial centers, and industrial parks, within one development or subdivision. It is used as part of conventional zoning or form-based code to allow for flexibility in land use planning. It can be an overlay district or a zoning category. Depending on the type of PUD, a project might go through the subdivision and zoning processes at the same time. PUDs are usually implemented to carry out master planning of a tract of land and are intended to:

- Foster City or public/private partnered special projects;
- Allow for the development of mixed use, transit-oriented, or traditional neighborhoods with a variety of uses and housing types;
- Carry out specific goals of a comprehensive plan; and/or
- Preserve natural features, open space, and other topographical features of the land.

Standards within a PUD are usually negotiated between a city and developer on a case-by-case basis, and they require approval under adopted zoning and/or subdivision codes, including plan review and public hearings. The model zoning code that accompanies this Comprehensive Plan includes language to permit PUDs.

Cluster Development

Cluster developments, also known as conservation subdivisions, are residential subdivisions that have been designed to maximize contiguous open space in order to:

- Provide habitat for wildlife;
- Provide shared open space for recreation;
- Enhance community spirit;
- Reduce infrastructure maintenance costs (fewer miles of pavement and utility lines);
- Reduce flooding and road deterioration (less water enters the drainage system); and
- Preserve the City's rural character (by preserving open space).

As shown in *Figures 4F-4G*, a piece of land subdivided as a cluster development allows for the same number of houses as a traditional development. While each individual lot is smaller in the cluster development, the remaining land becomes common open space that can be used for recreation, utilities such as storm water detention ponds, and for public gardens or agriculture.

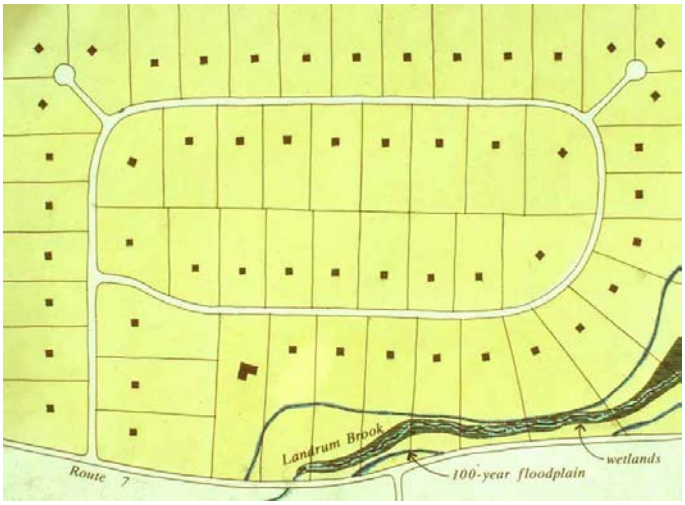


Figure 4F: Standard Subdivision

130-acre site with 55, 2-acre home sites[38]

Figure 4G: Cluster Subdivision

Same 130-acre site with 55, ¾ acre home sites; 81 acres preserved as common open space.

[38] Images retrieved from www.landchoices.org. Extensive information available on that site and from the University of Minnesota Extension office www.extension.umn.edu/

The City of Pearland has adopted a provision for cluster developments and could be contacted for guidance on adopting an appropriate ordinance amendment and encouraging their construction.[39]

The Town of Flower Mound included a cluster development, the Cross Timbers Conservation Development District, in their 2013 Master Plan.[40] The district is identified in their land use map and organizes development to preserve the Cross Timbers ecosystem, other natural systems and scenic views.

A fact sheet on cluster developments has been created by Ohio State University and is included with the *Digital Appendix* for this plan.[41]

A number of non-profit groups are working with cities, developers, and individuals throughout the country to promote energetic, livable cities through design and would be a good source for technical information on various design features, community education, and funding as relates to both alternative subdivision design (PUDs and cluster developments) and thoroughfare design elements. These include the USDA Office of Sustainable Development (www.usda.gov), the Congress for New Urbanism (http://www.cnu.org/), the Urban Land Institute (www.uli.org) and Smart Growth Online (http://www.smartgrowth.org/).

[39] See City of Pearland website at www.cityofpearland.com and Digital Appendix to this study
[40] See Town of Flower Mound Master Plan website at http://www.flower-mound.com/index.aspx?NID=329
[41] The fact sheet is also available at http://ohioline.osu.edu/cd-fact/1270.html

4.4.6 Ensure Orderly & Timely Expansion through Targeted Annexation

While promoting infill development is a priority for Wharton, the City should also consider targeted annexation in order to bring adjacent developed properties onto the city tax-rolls, and to manage future growth. The City is not bordered by any competing jurisdictions; therefore, there are no jurisdictional constraints to growth. However, due to the cost of providing services to newly annexed areas, the City should focus future annexation north of the Colorado River, in between US 59 and the railroad track and further east, just south of FM 1301.

The purpose of annexing land is to bring urbanizing areas into a system where development can be regulated to ensure public health, safety and welfare. Annexation is also a way to shape and manage future growth. Land to annex must be contiguous with the current corporate limits, must be located within City's ETJ, and cannot be in the ETJ of another municipality. After annexation, the City must provide full municipal services, including water and sewer, within a designated time frame (generally two and a half years).

The authority to annex property in Texas generally falls under two categories: general law cities and home rule cities. Wharton is a home rule city, which can be described as:

> *A home rule city (usually over 5,000 population) may do anything authorized by its charter that is not specifically prohibited or preempted by the Texas Constitution or state or federal law.*[42]

Recent changes to annexation procedures made by the Texas legislature do not affect the City of Wharton because the City is not located in a county with a population of 500,000 or more. This means the City of Wharton can make use of its unilateral annexation powers. However, Wharton should consider the costs and benefits of annexation under the above requirements. In particular, a financial analysis would need to be made to determine whether the provision and maintenance of water, sewer, street, drainage, and police and fire services would be adequately paid for by fees and taxes on those served over the long-term (i.e. including replacement of lines and pavement at 30-year intervals).

Figure 4H (next page) indicates priority annexation areas for the City of Wharton.

[42] https://www.tml.org/legal_pdf/ANNEXATION.pdf

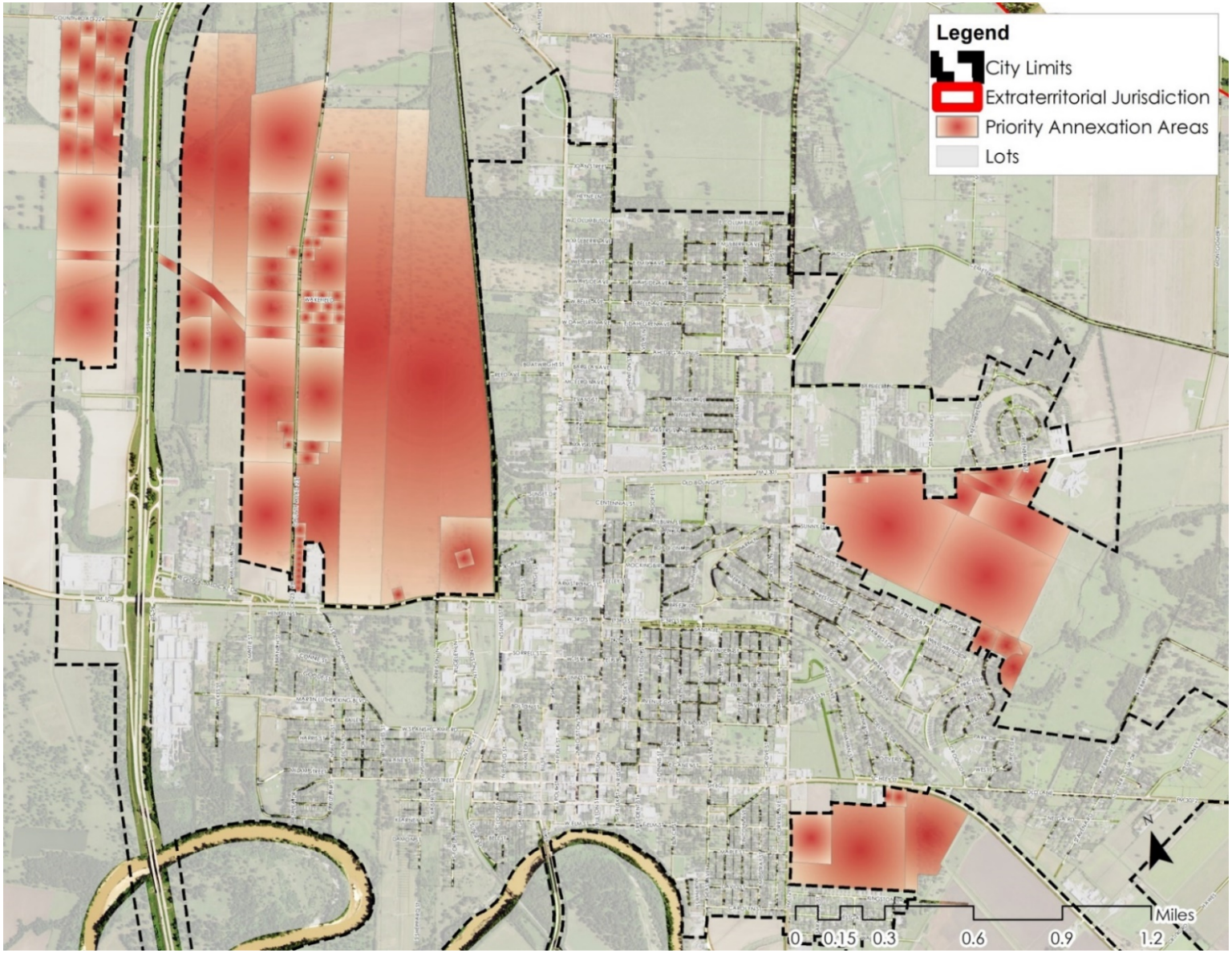


Figure 4H: Priority Annexation Areas

4.5 Implementation Plan

The Implementation Plan organizes the action items recommended to address each issue identified in the above sections into a timeline for completion. The actions are prioritized and organized by date.

Table 4C: Implementation Plan: 2018-2028

Goals & Objectives	Activity Year(s)			Lead Organization	Cost Estimate	Funding Sources
	2018-2021	2022-2024	2025-2028			
Goal 4.1 *Vacant/dilapidated buildings should be removed and replaced and distressed properties maintained*						
Start a mowing club to help low-income seniors maintain their yards	X			City, Garden Club, Boy Scouts	Variable	Local
Initiate tree plantings, community gardens, and other reuse of vacant lots; plant 10 trees a year	X			City	<$1,000 per year	GEN, Local
Establish revolving loan program for business improvement and development	X	X	X	EDC, City	Variable	USDA, EDC
Continue enforcement of Substandard Building Ordinance; remove at least three (3) buildings per year	X	X	X	City	Variable	GEN
Continue Business Restoration Program	X	X	X	EDC	$75,000	EDC
Continue main street beautification efforts	X	X	X	City, EDC	Variable	Local
Goal 4.2 *Continue preservation of the historic downtown and focus new development in and around the Central Business District*						
Adopt a Historic Preservation Ordinance		X		City, WHC	$2,000 (legal)	GEN, WHC
Consider a tax abatement program for downtown properties that maintain exterior improvements and use of structures for non-storage activities	X	X		City	Variable	GEN
Advertise tax credit advantages available to properties on the National Historic Register	X	X	X	EDC, Chamber	Staff	N/A

Keep the Future Land Use Map and information on desired development types on display at City Hall, on the City's and Chamber's websites, and at the Chamber's offices	X	X	X	City, Chamber	Staff	GEN, Chamber, EDC, Local
Consider adopting a Zoning Ordinance to ensure downtown Wharton maintains its existing character	X	X	X	City	<$2,000 (legal)	GEN
Goal 4.3 *Infill development is encouraged in order to: minimize infrastructure costs, preserve hunting and agriculture land, maintain housing affordability, and revitalize downtown*						
Post the FEMA FIRM at City Hall and on the City's website	X			City	Staff	GEN
Add Developable Land Map to City and EDC websites	X			City, EDC	Staff	GEN, EDC
Adopt public works construction manual	X			City	$2,000 (legal)	GEN
Update Subdivision Ordinance, and consider adopting Zoning Ordinance, that includes provisions for PUD and cluster developments	X			City	$2,000 (legal)	GEN
Limit extension of services beyond the city limits unless a large development is proposed in a priority annexation area	X	X	X	City	N/A	N/A
Promote and pursue innovative development types, including cluster developments and agrihoods	X	X	X	City, EDC	Staff	GEN, EDC
Consider a land exchange, conservation easement, or development rights transfer program to eliminate development in the floodplain	X	X	X	City	Variable	GEN
Goal 4.4 *Guide future growth to ensure Wharton develops in a manner that is sustainable and retains the character of the city*						
Update Subdivision Ordinance to ensure that new developments meet heightened design/construction standards and both connect with and complement existing development in Wharton	X			City	<$2,000 (legal)	GEN
Establish regular review schedule of Future Land Use Map and Subdivision Ordinance	X			City	Staff	GEN

Consider adoption a zoning code that allows for a variety of housing and commercial typologies, including mixed-use, walkable neighborhoods	X	X	X	City	$2,000 (legal)	GEN
Goal 4.5 *Orderly and timely expansion through annexation of existing development broadens tax base and ensures high development standards*						
Limit extension of services beyond the city limits unless a large development is proposed in a priority annexation area	X	X	X	City	N/A	N/A
Annex land along highways to encompass existing and future development	X	X	X	City	$2,000 (legal)	GEN

GEN = Municipal funds; Chamber = Wharton Chamber of Commerce; **EDC** = Economic Development Corporation; **Local** = donations of time/money/goods from private citizens, charitable organizations, and local businesses; Staff = Staff time**; TDHCA** = Texas Department of Housing and Community Affairs; **USDA** = US Department of Agriculture

4.6 Appendix 4A: Land Use Methodology

GrantWorks Inc. conducted a land use survey in Wharton in February 2017. Land use data was collected by driving by every property in the city and extraterritorial jurisdiction (ETJ), using aerial imagery available from the Texas Natural Resources Information System (www.tnris.org), and consulting with City staff. *Table 4A.1: Land Use Classifications* defines the land uses that were chosen to describe property in Wharton.

Table 4A.1: Land Use Classifications

Classification	Examples
Agricultural / Undeveloped	Fields, farms, woodlands, open flood plain
Agricultural Processing	Cotton Gin; Grain/Seed Storage; Mills; Feed Lots; Slaughterhouses; Chick or Pig "Factories"; Livestock showing; Peanut Processing
Single-family Residential	Single-family houses, mobile homes
Small-scale Multifamily	Duplexes, triplexes, quadplexes
Multifamily Residential	Apartments, condominiums, multifamily structures with five or more units
Mixed Use	Apartment over office or store, home occupation with store/office front
Commercial	Stores, mini-storage businesses, offices, including medical offices, and commercial parking lots/facilities
Industrial	Factories, salvage yards, mines, large warehouses, industrial yards and refineries
Institutional	Educational and religious institutions, and hospitals, jails, prisons, and nursing homes, including associated parking lots and recreation/park areas for the institutional use only
Recreational	Developed recreational or open space (public or private), not associated with other uses
Public	Government offices and facilities, water and wastewater facilities, public utilities
ROW	Highway and street right-of-way, railroad right of way
Utility	Private utility, including cell phone towers, electrical stations, transformer stations, etc.
Semi-Developed	Vacant subdivided lots of less than 10 acres in areas with or very near water, sewer, and street infrastructure

Table 4A.2: Detailed Land Use Tabulation

City Land Use Classification	Acres	% DEV	% TOTAL	Acres/100
Agricultural Processing	14	0.4%	0.3%	1.6
Cemetery	16	0.4%	0.3%	1.9
Commercial	252	7.0%	5.4%	30.2
Industrial	115	3.2%	2.5%	13.7
Institutional	326	9.0%	7.0%	39.1
Small-scale Multifamily	7	0.2%	0.2%	0.9
Multifamily	58	1.6%	1.2%	7.0
Public	312	8.6%	6.7%	37.4
Recreational	135	3.7%	2.9%	16.1
Semi-Developed	544	15.1%	11.6%	65.2
Single-Family	844	23.4%	18.1%	101.2
Utility	7	0.2%	0.2%	0.9
Right of Way	976	27.1%	20.9%	117.0
Total for Developed Areas	***3,605***	***100%***	***77%***	***432.2***
Agricultural, Forest, Undeveloped	*1,045*		22%	125.3
Water	20		0%	2.4
Citywide Total	**4,670**		**100%**	**559.9**

ETJ Land Use Classification	Acres	% DEV	% TOTAL	Acres/100
Agricultural - Processing	2	0%	0%	0.2
Cemetery	24	1.0%	0%	2.8
Commercial	152	6.2%	1%	18.3
Industrial	17	1%	0%	2.0
Institutional	28	1%	0%	3.3
Multifamily	1	0%	0%	0.1
Oil Field	38	2%	0%	4.5
Public	33	1.3%	0%	4.0
Recreational	59	2%	0%	7.1
Semi-Developed	162	7%	1%	19.5
Single-Family	1,385	56%	7%	166.0
Utility	1	0%	0%	0.1
Right of Way	572	23%	3%	68.6
Total for Developed Areas	***2,473***	***100%***	***12%***	***296.5***
Agricultural, Forest, other Open Space	*17,731*		91%	2126.0
Water	162		1%	19.4
ETJ Total	**20,366**		**100%**	**2442.0**

Regional Land Use Classification	Acres	% DEV	% TOTAL	Acres/100
Agricultural - Processing	15	0%	0%	1.9
Airport	39	1%	0%	4.9
Cemetery	404	6.3%	2%	49.8
Commercial	132	2.0%	1%	16.2
Industrial	353	6%	1%	43.5
Institutional	59	1%	0%	7.3
Multifamily	349	5%	1%	43.0
Oil Field	38	1%	0%	4.6
Public	345	5.4%	1%	42.5
Recreational	194	3%	1%	23.9
Semi-Developed	706	11%	3%	87.0
Single-Family	2,229	35%	9%	274.5
Utility	8	0%	0%	1.0
Right of Way	1,548	24%	6%	190.6
Total for Developed Areas	***6,420***	***100%***	***25%***	***790.6***
Agricultural, Forest, other Open Space	*18,776*		74%	2312.3
Water	182		1%	22.4
Regional Total	**25,378**		**100%**	**3125.3**

Source: GrantWorks, Inc. Field Survey, 2018

Note: Values may be rounded to next whole number.

5 WATER SUPPLY & DISTRIBUTION STUDY

The approximate date of the original construction of the City of Wharton's water distribution system is prior to 1960. Original line material consists of cast iron (CI), galvanized steel, asbestos, and PVC. City staff indicate that approximately 75% percent of the system is original. A formal analysis of the water system was completed by HALFF & Associates in April 2017. The most recent maps of the system were prepared by HALFF & Associates in 2017.

There have been no major system improvement projects implemented over the past 10 years using funds from Texas Department of Rural Affairs Grant Programs (TDRA – formerly ORCA, now administered by the Texas Department of Agriculture, TDA). In March 2018 USDA's Water and Waste Disposal Loan and Grant program provided $4.8 million for another well, a 500,000-ground storage tank, and associated pump station to connect to the City's water system. This additional water will increase the system's capacity to allow for future growth and meet the maximum daily demands. The well will also provide reliability should one of the existing wells fail.

The City of Wharton currently uses groundwater as its sole source of potable water. Wharton operates four (4) wells within the city. Two (2) additional small wells at the Wharton airport provide water to hangars, but are not discussed in this report, as they are not viable as a significant source of long-term water supply. Wells #1 and #3 (which are on the same site) and well #4 all pump into a ground storage tank on their respective sites. Water is chlorinated and fluoride is added before entering the tanks, and then pumped out to distribution via a booster pump station. Well #2 pumps directly into the distribution system; water is chlorinated prior to entering the 10,000-gallon pressure tank on site.

5.1 Water System Inventory

The following sections provide an inventory of the major components of the Wharton's water system as of the date of this comprehensive plan. The plan will also identify areas of operation in which system improvements should be implemented to improve the safety, efficiency, and economy of the treatment and distribution operations. The plan will conclude by providing a prioritized summary of the needed improvements and their estimated costs.

Table 5A and 5B (next page) show the inventory and locations of the various components associated with the water treatment, storage, and distribution system.

Table 5A: Major Water System Components

Component	Location	Capacity or Size
Service Pump #1	1015 Alabama Rd	750 GPM
Service Pump #2	1015 Alabama Rd	750 GPM
Service Pump #1	1819 Valhalla St	750 GPM
Service Pump #2	1819 Valhalla St	750 GPM
Storage Tank #1	1015 Alabama Rd	.50 MG
Storage Tank #2	1015 Alabama Rd	.50 MG
Storage Tank #3	1015 Alabama Rd	.50 MG
Pressure Tank	210 S Cloud St	.01 MG
Storage Tank	1819 Valhalla St	.50 MG
Elevated Storage Tank	2319 Highway 59	.60 MG
Elevated Storage Tank	802 E Wayside Ave	.50 MG
Treatment Plant	210 S Cloud St	
Treatment Plant	1819 Valhalla St	
Treatment Plant	1015 Alabama Rd	
Well #1	1015 Alabama Rd (East)	700 GPM
Well #2	210 S Cloud St	1000 GPM
Well #3	1015 Alabama Rd (West)	975 GPM
Well #4	1819 Valhalla St	800 GPM

Table 5B: Water Distribution System Components

Component	Linear Feet (LF)	Component	# Of Units
1" Line	3,377	Fire hydrants	432
1-1/2" Line	565	Gate Valves	814
2" Line	67,285	Flush Valves	N/A
3" Line	1,535	Service connections	4654 (TCEQ Data)
4" Line	1,428		
6" Line	233,865		
8" Line	30,235		
12" Line	50,957		
16" Line	4,133		
Unknown size	9,384 (LF)		

5.2 Water System Analysis

Standards & Criteria

The Texas Commission of Environmental Quality (TCEQ), the American Water Works Association (AWWA), and the U.S. Environmental Protection Agency (EPA) have established regulations and standards for the safe treatment, storage, and distribution of potable water to the public. All Public Water Supply (PWS) systems operating within the State of Texas must adhere to these regulations and standards.

TCEQ has adopted the following engineering standards that apply to the minimum production and supply capacities for public water systems and according to copies of recent routine compliance reports from the TCEQ, the Wharton Water Supply System provides the following capacities:

Table 5C: Minimum Water System Standards

Facility or Measure	TCEQ / Engineering Standard	City of Wharton
Well Production, Surface Water Production, or Purchase Capacity (GPM/Connection)	0.6	0.75 **[3]**
Total Storage – TCEQ (gal/connection)	200	668 **[3]**
Elevated Storage (gal/connection)	100	236 **[3]**
Service Pump (GPM/Connection) **[4]**	0.6	0.64
Normal Operating Pressure (psi)	35	+/-54
"C" Certified Operators **[1]**	1	3
Minimum Main Size **[2]**	2"	1

Sources: TCEQ and Texas State Data Center Population Estimates for 2018 and plan fieldwork

[1] Depends on system type and size, according to TCEQ 30 TAC 290, Subchapter D: Rules and Regulations for Public Water Systems, Section 290.46

[2] According to TCEQ 30 TAC 290, Subchapter D: Rules and Regulations for Public Water Systems, no new waterline under two inches in diameter will be allowed to be installed in a public water system distribution system. These minimum line sizes do not apply to individual customer service lines.

[3] Calculated using TCEQ Water Utility Database information indicating a total of 650 connections to the system and using the daily purchase rate of 0.6MG per month as reported in the CCI Report # 995989 – 1/10/2013

[4] If Elevated Storage Capacity is > 200 Gallons/Connection, Service Pump Capacity is 0.6 GPM/Connection. If Elevated Storage Capacity is < 200 Gallons/Connection, Service Pump Capacity is 2.0 GPM/Connection. The minimum Elevated Storage Capacity requirement is always 100 Gallons/Connection.

Table 5C (previous page) indicates that the City of Wharton is operating in accordance with the established standards for minimum production and supply capacities in all categories. However, the information also indicates that there could be problems in the area of well production if the City should both lose the alternative minimum capacity status while at the same time experience significant growth in the future.

Water Supply

The water supply source for the City of Wharton uses groundwater as its sole source of potable water. Wharton operates four (4) wells within the city. Two (2) additional small wells at the Wharton airport provide water to hangars, but are not discussed in this report, as they are not viable as a significant source of long-term water supply. Wells #1 and #3 (which are on the same site) and well #4 all pump into a ground storage tank on their respective sites. Water is chlorinated and fluoride is added before entering the tanks, and then pumped out to distribution via a booster pump station. Well #2 pumps directly into the distribution system; water is chlorinated prior entering the 10,000-gallon pressure tank on site.

Operating staff describe the water quality as good.

Water Storage

For water systems with greater than 250 connections, The Texas Administrative Code, Title 30, Chapter 290, Subchapter D, mandate that the system have storage capacity for the total number of connections served equal to or greater than: a) 200 gallons of total storage per connection; and, b) 100 gallons of elevated storage per connection or a pressure tank capacity of 20 gallons per connection. According to the TCEQ Water Utility Database the City has 4,654 total connections.

The City of Wharton meets the established minimum standards for water storage capacity with 666 Gallons/connection of total storage and 236 Gallons/connection of elevated storage. The City owns and operates 2 elevated tanks – One is 500,000-gallons, and the other is 600,000-gallons for a total of 1,100,000-gallons of elevated storage. City staff describes both storage tanks as being in good condition.

Water Distribution System

Water system pipes in the city of Wharton range in size from 1" to 16" in diameter. The system is comprised of approximately 402,763 linear feet (LF) of distribution lines. The materials contained in the original lines are primarily cast iron (CI), galvanized steel, and asbestos. The newer replacement lines are C-900 PVC. The City does not have an established program for routine line replacement. The City does not dedicate specific revenues such as a water utility fund for annual repair and maintenance. The City replaces lines periodically when required by events such as line breakage, valve malfunctions, or other related system failures.

Two-inch (2") and smaller diameter lines represent roughly 17.7% (71,226 LF) of the water distribution system in city of Wharton. Lines of 3" and 4" diameter comprise about .75% (2,963 LF) of its water system. Undersized water lines limit both volume and pressure within the distribution system. The Texas Administrative Code (TAC), Subchapter D, Section 290.44(c) prohibits the installation of new water lines smaller than 2". The standards permit more than ten (10) connections on existing water mains only when a licensed professional engineer deems it necessary. There are many segments of 2" and smaller diameter pipe in the distribution system. Some are located at the periphery of the system where the intensity of development is low but a significant number are located within established residential neighborhoods and have numerous single-family connections.

The City of Wharton does not currently have any specific water line replacement programs. The City is interested in developing a routine line replacement program if the appropriate funding mechanism can be established.

System Water Pressure

The City's water system operates at a normal working pressure of approximately 52 pounds per square inch (psi). This is sufficient to operate the system effectively. The service pumps and pressurized tank (.01 MG) provide this operating pressure.

Future Development Considerations

The city of Wharton is projected to experience approximately 22.7% growth during this planning period. There are growth opportunities along US Hwy 59 as it passes through the City as well as along Route 60.

The Texas Administrative Code (TAC) Title 30, Chapter 291 states that when a water utility that requires a Certificate of Convenience and Necessity (CCN) reaches 85% utilization of the minimum capacity requirements for the system it must submit to the TCEQ Director a planning report indicating how the utility plans to expand its capacity to meet future demands. According to the information contained in *Tables 5C (page 5-3) and 5D (next page)*, the City's system will support the number of new connections before reaching the 85% threshold as shown below:

Table 5D: Capacity for New Connections

Measure	Required	Provided	# New Connections
Production Capacity	0.6	0.71	269
Total Storage	200	644	8,654
Elevated Storage	100	259	4,696
Service Pump Capacity	0.6	0.644	-404

As shown in *Table 5D (previous page)*, the most restrictive elements in the City's water system regarding the capacity for future growth are the maximum purchase capacity and service pump capacity. With a 22.7% growth rate over the next ten (10) years, the City will add approximately 1,056 new connections.

To stay below the 85% threshold, the City would need the capacity to purchase enough water daily to provide the future connection count of 5,710 connections with 0.6 GPM per connection (if the alternative capacity requirement is still in place), or 3,430 GPM, plus enough surplus so that the 3,430 GPM represented less than 85% of the purchase capacity. In other words, the City will need to have a maximum purchase capacity of 4,030 GPM to comply with the 0.6 GPM standard and still be below the 85% threshold that would trigger planning requirements for expansion. 4,030 GPM equates to approximately 5.8 MGD.

The other limiting factor is the "service pump" capacity. The standards call for systems which provide an elevated storage capacity of 200 gallons per connection, two service pumps with a minimum combined capacity of 0.6 (GPM) per connection are required at each pump station or pressure plane. The City would need to increase pump capacity to 3,250 (GPM) or 4.67 (MGD). The ability to meet peak demand in a future scenario can only be determined by establishing a future peak demand for the system, which requires a detailed study that is beyond the scope of this plan. The new well and associated pumps should meet these increased demands for the next 10 years.

Fire Protection Considerations

The primary consideration for fire protection issues is whether the system is capable of delivering sufficient flow volume at sufficient pressure to effectively respond to emergencies.

The standards for adequate fire protection are established in the International Fire Code (IFC). The code recommends minimum flow volume, flow pressure, hydrant spacing, and construction standards. Examples of the IFC recommendations are as follows:

1. Every building in a community should be located no more than five hundred feet (500') from a fire hydrant;
2. All fire hydrants should be installed on water mains no smaller than six inches (6") in diameter;
3. Each hydrant should provide a minimum flow volume of 1,500 gallons per minute (GPM); and
4. The minimum flow volume should be delivered at a minimum residual pressure of twenty pounds per square inch (20 psi).

Fire departments perform individual hydrant flow tests to determine if adequate pressure and flow rates are available at specified hydrant locations. Testing every hydrant is usually beyond the capabilities of most small communities, but field-testing at selected hydrants can give the City some preliminary information on water system firefighting capabilities.

When any major new subdivision construction is proposed, a computer-aided water system model of the existing conditions and the effects of the proposed development should be prepared by the consulting engineer. This model will assist the City and its representatives to evaluate the existing system's capacity to provide adequate flow volume at sufficient pressure to effectively respond to emergencies.

There are many homes within the City of Wharton that are not within 500 feet of a hydrant connected to a 6" water main. There are a number of homes within the City that are located near to 4" or smaller lines. A 4" line will provide adequate flow volume and pressure for firefighting purposes under ideal conditions, but the configuration is usually not effective. A smaller line cannot provide adequate flow and pressure for firefighting purposes under any conditions. This plan will recommend several line replacement projects that will replace aging, deteriorating, and/or undersized lines. All of these line replacement projects will include lines of sufficient size to provide adequate flow and pressure for firefighting purposes. These projects will also include fire hydrants at the appropriate locations. The City has indicated that replacement and addition of fire hydrants is one of their priorities for this planning period.

System Operations

TCEQ conducted a Comprehensive Compliance Investigation (CCI) in January 28 2015. TCEQ records indicate that any minor violations have been resolved. The last CCI indicated that the system was operating at an average pressure of 54 psi with a residual chlorine level of 0.68 mg/L.

Water System Revenues

The City of Wharton has adopted a rate schedule as of October 2018 as follows:

Table 5E: Minimum Monthly Water Fee

User	First 2,000 Gallons	Additional 1,000 ea.
First 2,000 gallons (minimum)	$ 21.41	First 2,000 gallons (minimum)
Next 2,000 gallons	$ 4.06 per 1,000	Next 2,000 gallons
Next 3000 gallons	$ 4.21 per 1,000	Next 3000 gallons
Next 4,000 gallons	$ 4.37 per 1,000	Next 4,000 gallons
Next4,000 gallons	$ 4.65 per 1,000	Next4,000 gallons
Next 35,000 gallons	$ 4.93 per 1,000	Next 35,000 gallons
Next 50,000 gallons	$ 5.11 per 1,000	Next 50,000 gallons
Next 50,000 gallons	$ 5.49 per 1,000	Next 50,000 gallons
Next 50,000 gallons	$ 5.83 per 1,000	Next 50,000 gallons

Water Losses

Unmetered water usage and/or unaccounted-for usage affects the cost to provide water services. City staff indicate that unbilled water is used by the City offices, wastewater plant, fire department, and operations equipment. The data available on the actual number of gallons produced compared with actual gallons billed indicates an approximate water loss of 25.2% annually or approximately 385,370 gallons per day. A typical value of acceptable water loss ranges from 6% - 11%. Major sources of water loss include:

- Line leakage,
- Line breaks,
- Aging or faulty meters,
- Inaccurate or incomplete record keeping,
- Water theft and unauthorized use.

The City is planning to replace aging lines and meters as funding becomes available.

Regional & Drought Planning

In 1999, the 75th Texas Legislature passed Senate Bill 1. This legislation requires that all entities providing public water supplies must develop drought contingency plans. These plans must be implemented during periods of severe water shortages and drought. A drought contingency plan often combines several strategies designed to achieve long-term advancements in the efficient use of water.

The plans require the development of specific response measures aimed at avoiding, minimizing, or mitigating the risks and impacts of drought-related water shortages and other emergencies. The plan adopted by a water provider should ensure the provider's capability of providing adequate water supplies under drought conditions.

The City of Wharton adopted a plan in March 2000, Ordinance No. 2000-08. The plan includes both a Water Conservation section and an Emergency water Demand Management Plan. The Water Conservation Plan contains five (5) stages of water demand that provides detailed information on the process that should occur in extended periods of low rainfall. The Region K 2016 Regional Water Plan projects that the water supplies for the city of Wharton will remain steady for the duration of this planning period.

As Wharton grows by the estimated amount described previously, the City may attempt to develop some water conservation methods as part of the development standards. These standards may include the following:

1. Require recirculation equipment for all new swimming pool installations and insulation of hot water piping for all new construction;
2. Require builders to utilize low demand fixtures and appliances;
3. Implement a conservation water rate structure in which the rates increase as the water consumption increases;
4. Implement testing of all meters;
5. Require sub-dividers and builders to include low water demand landscaping items in their development plans; and
6. Reduce unaccounted for water by 5% per year for the first two (2) years and 2% per year for the remainder of this planning period (2018-2028).

Texas water law requires that revised and updated Regional and State Water Plans be prepared every five (5) years. The 2016 Plans are now open for the public comment stage and may be found at the TWDB web site.

5.3 Water Supply & Distribution System Improvement Projects

The City of Wharton Comprehensive Plan places a high priority on a continuing program of replacing old and undersized system lines and aging, broken valves to help ensure that the City and the surrounding area continue to meet local water supply demand.

Prioritized Problems

City leaders, residents, operating staff, and consulting engineers have identified the following areas of concern with regards to the water system:

1. A need for an additional well; a 500-000-gallon ground storage tank; and associated pump stations;
2. A need to replace undersized 2" water lines and asbestos lines throughout the system;
3. A need to loop the 12" line on the south side of town;
4. A need to upgrade all plants to the SCADA system; and
5. A need to add new fire hydrants.

Goals & Objectives for the Water System

Goal 1: A local water system that operates efficiently and cost-effectively.

Objective 1.1: By 2028, reduce operating costs.

Policy 1.1.1: Promote and exercise preventative maintenance by inspecting all facilities once per year.

Policy 1.1.2: Maintain a monitoring plan and report on a timely basis.

Objective 1.2: Reduce system water loss by forty percent (40%) by 2028.

Policy 1.2.1: Implement methods to classify meters and replace meters that are damaged or leaking.

Policy 1.2.2: Replace deteriorated lines throughout system, with priority given to those made of obsolete materials.

Policy 1.2.3: By 2019, enact procedures to document water used but not billed.

Objective 1.3: The City is financially able to maintain and improve the system to improve quality of life for residents and enable growth.

Policy 1.3.1: By 2020, evaluate rate structure and usage characteristics to determine if a rate increase would be feasible and enable the Town to complete more line replacement projects.

Policy 1.3.2: Beginning in 2019 and continuing throughout the planning period, regularly apply for available grants through the Texas Department of Agriculture to fund replacement of aging, deteriorated water lines.

Goal 2: City and area residents have clean, safe, potable water.

Objective 2.1: Over the planning period, deteriorated lines and equipment are replaced and/or improved.

Policy 2.1.1: Continue maintaining and inspecting the existing system facilities according to a regular schedule and providing repairs as the need arises.

Policy 2.1.2: In phases throughout the planning period, replace deteriorated and undersized lines with PVC lines four inches (4") or larger in diameter.

Policy 2.1.3: In phases throughout the planning period, replace defective meters.

Goal 3: Customers have access to a sustainable water supply that provides sufficient pressure and fire protection, particularly in times of drought.

Objective 3.1: By 2028, upgrade the system to ensure adequate pressure and coverage for fire safety.

Policy 3.1.1: Install fire hydrants and upgrade lines in areas with inadequate fire protection coverage.

Proposed System Improvements – Planning Period 2018-2028

The following section describes a series of proposed improvements to the existing water treatment, storage, and distribution system. The improvement projects are presented as phased improvements that are suggested for implementation over the 10-year planning period encompassed by this comprehensive plan.

The projects are listed in a sequence that represents just one of several possible approaches, all of which should lead to the achievement of the long-term goals adopted by the City for the operation and maintenance of the water treatment, storage and distribution system.

The sequence shown in this plan is a logical, step-by-step process intended to increase the safety, efficiency, and economy of the water system operations. The sequence is intended only as a suggested program of phased improvements, and alternative sequences are recommended if funding availability requires significant changes.

Table 5F (Section 5.4) contains the estimated projected costs for each phase of the improvements program. These costs are based on current costs of record for similar projects in south Texas. Every effort has been made to include appropriate cost factors such as inflation, variations in the market, and advances in water treatment, storage, and distribution technology. These cost estimates are predicated on several assumptions related to the scope of each phase.

These assumptions are as follows:

- The choice of specific lines to be replaced within each area – The cost estimates assume that all lines less than six inches (6″) in diameter will be replaced with six-to-eight-inch (6″-8″) C-900 DR 18 PVC pipe and fire hydrants at the appropriate spacing. The priority is placed on replacing the smaller lines, but each individual project evaluation may identify segments of larger lines that need replacement. In this event, the funding should be applied to replacing the lines with the greatest need for repair, regardless of size;
- Fire hydrants – Fire hydrants are included in the estimates. However, when replacing lines of six inches (6″) and larger, the estimates assume that approximately fifty percent (50%) of the existing fire hydrants can be re-used;
- Service re-connects, valves, and appurtenances – Service re-connects, valves, and appurtenances are estimated at twelve-to-fifteen-percent (12%-to-15%) of the line costs, depending on the housing density and complexity of the proposed improvements;
- Street and pavement repair – Streets, driveways, and pavement repair is estimated at five-to-ten-percent (5%-to-10%) of the line costs, depending on the housing density and the presence of curb & gutter in the area of interest;

- Engineering & Surveying – Engineering and surveying services are estimated at fifteen percent (15%) of the estimated construction costs of the combined elements described above.

The suggested phases for the system improvements are as follows:

- ✓ **Phase 1 (2018-2020):** A new 2,000 GPM well; 500,000-gallon ground storage tank; and pump station to provide a future potable water source. Project will include a new vertical turbine pump and motor, up to 800' of well casing, required screening, storage tank, pump station building, disinfection unit, motor and pump controls and associated electrical service, yard piping, alarms, and security fencing. The Project will also include administration, Engineering & Survey services.
- ✓ **Phase 2 (2020-2023):** Obtain funding to replace approximately 4,550 LF of existing 2" water lines with 6" PVC WL along Dahlgren, Belle, and Abel St. The project will also include replacement of 2" WL and line extension along Wayside, with approximately 3,500 LF of 12" PVC WL to loop with the existing lines. The project will also include, approximately eight (8) fire hydrants at appropriate locations, service re-connects, valves, street, pavement, and driveway repair, administration, and Engineering & Survey services.
- ✓ **Phase 3 (2023-2028):** Obtain funding to replace approximately 5,300 LF of existing 2" water lines with 6" PVC WL along Croom, Lily, and Circle St. The project will also include replacement of 8" AC WL along Old City Lane, with approximately 3,000 LF of 12" PVC WL. The project will also include, approximately nine (9) fire hydrants at appropriate locations, service re-connects, valves, street, pavement, and driveway repair, administration, and Engineering & Survey services.
- ✓ **Phase 4 (2023-2028):** Obtain funding to replace and extend approximately 9,200 LF of existing water lines with 12" PVC WL along Burleson, Sunset, Spanish Camp, Harrison, and FM 102. The project will also include approximately 300 LF of bored and encased 12" PVC WL under the Railroad ROW. The project will also include, approximately 13 fire hydrants at appropriate locations, service re-connects, valves, street, pavement, and driveway repair, administration, and Engineering & Survey services.

5.4 Implementation Plan

The City strives to provide a safe, efficient, and uninterrupted water supply while meeting all applicable water system standards. These goals can be accomplished by implementing the improvements described above over the planning period of 2018 through 2028. The estimated costs for the proposed improvements to the water system are as follows:

Table 5F: Water System Improvement Plan Projects: 2018-2028

Goals & Objectives	Activity Year(s) 2018-2021	Activity Year(s) 2022-2024	Activity Year(s) 2025-2028	Lead Organization	Cost Estimate*	Funding Sources
Goal 5.1 *Replace and/or improve deteriorated lines and equipment so city and area residents have access to clean, safe, and potable water.*						
Phase 1: A new 2,000 GPM well; 500,000-gallon ground storage tank; and pump station to provide a future potable water source. Project will include a new vertical turbine pump and motor, up to 800' of well casing, required screening, storage tank, pump station building, disinfection unit, motor and pump controls and associated electrical service, yard piping, alarms, and security fencing. The Project will also include administration, Engineering & Survey services.	X			City	$3,800,000	USDA; CDBG; GEN (General Obligation Bond); TWDB loan; City Utility Fund (Rev Bond)
Phase 2: Obtain funding to replace approximately 4,550 LF of existing 2" water lines with 6" PVC WL along Dahlgren, Belle, and Abel St. The project will also include replacement of 2" WL and line extension along Wayside, with approximately 3,500 LF of 12" PVC WL to loop with the existing lines. The project will also include, approximately eight (8) fire hydrants at appropriate locations, service re-connects, valves, street, pavement, and driveway repair, administration, and Engineering & Survey services.	X	X		City	$392,400	CDBG; GEN (General Obligation Bond); USDA; TWDB loan; City Utility Fund (Rev Bond)

Phase 3: Obtain funding to replace approximately 5,300 LF of existing 2" water lines with 6" PVC WL along Croom, Lily, and Circle St. The project will also include replacement of 8" AC WL along Old City Lane, with approximately 3,000 LF of 12" PVC WL. The project will also include, approximately nine (9) fire hydrants at appropriate locations, service re-connects, valves, street, pavement, and driveway repair, administration, and Engineering & Survey services.		X	X	City	$390,700	CDBG; GEN (General Obligation Bond); USDA; TWDB loan; City Utility Fund (Rev Bond)
Phase 4: Obtain funding to replace and extend approximately 9,200 LF of existing water lines with 12" PVC WL along Burleson, Sunset, Spanish Camp, Harrison, and FM 102. The project will also include approximately 300 LF of bored and encased 12" PVC WL under the Railroad ROW. The project will also include, approximately 13 fire hydrants at appropriate locations, service re-connects, valves, street, pavement, and driveway repair, administration, and Engineering & Survey services.		X	X	City	$695,000	CDBG; GEN (General Obligation Bond); USDA; TWDB loan; City Utility Fund (Rev Bond)
Goal 5.2 *Local water system operates efficiently, cost-effectively, and in compliance with TCEQ requirements*						
Exercise preventative maintenance by inspecting all facilities once per year	X	X	X	City	Variable	GEN; Utility
Seek funding to address TCEQ issues	X	X	X	City	N/A	N/A
Evaluate rate structure and usage characteristics to determine if rate increase would be feasible and enable the system operator to complete more line replacement projects	X	X	X	City	N/A	N/A
Regularly apply for TxCDBG grants to fund replacement of aging, deteriorated water lines	X	X	X	City	N/A	N/A

Goal 5.3 *Customers have access to a sustainable water supply that provides sufficient pressure and fire protection, particularly in times of drought*						
Replace as many lines two-inch (2") or less in diameter, giving priority to those with more than ten (10) connections	X	X	X	City	Variable	CDBG, GEN; USDA; TWDB; Utility
Replace as many lines four inches (4") in diameter that connect to at least one (1) fire hydrant	X	X	X	City	Variable	CDBG, GEN; USDA; TWDB; Utility
Install fire hydrants in areas with inadequate fire protection coverage	X	X	X	City	Variable	CDBG, GEN; USDA; TWDB; Utility
Continue City's participation and mention in the Region N Regional Water Plan	X	X	X	City	$1,000 annually	GEN; Utility

GEN = Municipal funds and General Obligation Bonds; **CDBG** = Texas Community Development Block Grant Program, administered through the Texas Department of Agriculture (TDA); **TCF** = Texas Capital Fund; **TWDB** = Texas Water Development Board grants and loans; **USDA =** US Department of Agriculture Rural Development Water and Wastewater Infrastructure loans and grants; **UTILITY** = City utility fund/revenue

Notes on Cost Estimates: GrantWorks Engineering Staff provided cost estimate

6 Wastewater Collection & Treatment System Study

Most of the City of Wharton's existing sewage collection and treatment system was installed in the 1930's, according to the operating staff's best estimate. The current wastewater treatment plants (WWTP) were commissioned in 1977 and 1985. WWTP #1 was built much earlier than 1977, but that is when the plant underwent a major upgrade to a contact stabilization treatment plant. WWTP #2 was constructed in 1985, with the treatment originally designed as a Rotating Biological Contactor batch plant. The process became out of date and in 1982 the plant was rehabbed, and the process is now a racetrack oxidation ditch treatment plant.

There are no previous comprehensive studies according to the best information available. The system maps that the operations staff currently uses were prepared by GrantWorks in 2018. This plan will provide the first comprehensive update to the system maps.

There have been at least four (4) system improvement projects implemented over the past 10 years using funds from Texas Department of Rural Affairs Grant Programs (TDRA – formerly ORCA, now administered by the Texas Department of Agriculture, TDA). These projects are described briefly as follows:

1. 2018 – Installed approximately 2,600 LF of 8-inch to 12-inch sewer line, manholes, service reconnections, pavement repair, and all associated appurtenances. Construction took take place on Alabama, alley between Koehl and Texas and the alley between Speed and Koehl.;
2. 2011 – Replaced deteriorated sewer lines in the Ahldag Addition on the north side of the city. Construction consisted of installation of 1,730 (LF). of 8-inch sewer line, 137 sanitary sewer leads, 5 manholes, and related appurtenances.
3. 2011 - Installed 3,723 LF of sewer line. 87 manholes and 66 reconnections.
4. 2011 - Installed approximately 3,240 (LF). of 6", 8", 10", and 12" sanitary sewer line, 11 manholes, and associated appurtenances. Construction will reduce the amount of inflow and infiltration from the Ahldag Addition of the city.

6.1 Wastewater Collection System Inventory

The quantity of the collection lines and lift stations associated with the collection system operated by the City of Wharton are shown by size, total length, and percentage of the system as a whole in *Table 6A. Table 6B (next page)* provides the lift station inventory.

Table 6A: Major Sewer Collection System Components

Sewer Lines			
	Diameter (in.)	Length (ft.)	Percent
Force Mains			
	3″	9,736	2.60%
	6″	8,037	2.15%
	8″	2,738	0.75%
	12″	5,687	1.55%
	14″	11,695	3.15%
Subtotal – Force Main		37,893	10.20%
	Diameter (in.)	Length (ft.)	Percent
Gravity Feed			
	4″	2,813	.75%
	6″	82,258	22.00%
	8″	128,122	34.40%
	10″	13,687	3.65%
	12″	29,342	7.85%
	14″	2,247	.60%
	15″	22,070	5.90%
	18″	1,706	.45%
	21″	4,762	1.25%
	24″	14,115	3.80%
	27″	554	.15%
	UNK	33,145	8.90%
Subtotal – Gravity Feed		334,821	89.80%
Total Sewer Lines		**372,714**	**100%**

Table 6B: Lift Station Inventory

Lift Stations			
Name	Pump Capacity (GPM)	Year Built	Condition
Lift Station # 1 2900 Old Lane City Rd.	UNK	UNK	Poor
Lift Station # 2 1014 N Alabama Rd. (Santa Fe)	UNK	UNK	Good
Lift Station # 3 1213 Park Lane.	UNK	UNK	Poor
Lift Station # 4 117 Lakeshore Dr.(Stadium Rd.)	UNK	UNK	Good
Lift Station # 5 2110 Alabama Rd. (Jr. Collage)	UNK	UNK	Poor
Lift Station # 6 1125 W. Milam St.	UNK	2003	Good
Lift Station # 7 700 Hwy. 59 Loop (Nan Ya)	UNK	1984	Poor
Lift Station # 8 2932 Hwy 59 Loop (Hinzes)	UNK	1995	Poor
Lift Station # 9 2528 CR 231 (Industrial Park)	UNK	2006	Good
Lift Station # 1 2900 Old Lane City Rd.	UNK	UNK	Poor

6.2 Wastewater System Analysis

The wastewater system analysis evaluates the system components described in the previous sections with respect to the applicable standards and criteria as described in the previous sections. This analysis will consider the following elements:

- Standards and Criteria;
- The wastewater treatment facilities;
- Industrial waste and special treatment facilities;
- Collection system conditions;
- Unserved/underserved areas;
- Manhole conditions;
- The characteristics of the soil and terrain affecting the collection facilities;
- Lift station conditions;
- Infiltration/inflow problems; and
- Operational procedures.

Standards & Criteria

The U.S. Environmental Protection Agency (EPA) and the Texas Commission on Environmental Quality (TCEQ) outline the standards or criteria applicable to the design and operation of municipal wastewater systems. The standards address influent quality, collection, treatment, and effluent quality. The TCEQ guidelines were originally set forth in Title 30 Part 1 Chapter 317 of the Texas Administrative Code *"Design Criteria for Sewerage Systems"*.

The State of Texas has revised the standards and replaced Chapter 317 with Chapter 217, *"Design Criteria for Domestic Wastewater Systems",* which outlines system design and operations in all respects. EPA requirements mainly relate to discharge limitations and industrial wastewater treatment.

For wastewater treatment facilities, the TCEQ standards provide detailed information concerning design flows and design loadings expected at the treatment facility for the average municipal wastewater effluent stream. The authorized effluent discharge quality limitations are established in the individual municipality or operator's Permit to Discharge Waste, and will vary based on local conditions. Typically, effluent strength entering the treatment facility should not exceed approximately two hundred to three hundred fifty milligrams per liter biochemical oxygen demand (200-350 mg/L BOD-5), depending on the characteristics of the influent stream and the source of the wastewater stream. BOD5 and TSS values higher than two hundred milligrams per liter (200 mg/L) would likely be the result of wastewater demand from industrial sources that should be pretreated or eliminated.

The average quantity of wastewater flow set forth by the standards depends on the source. For example, a residential subdivision would have a design flow of seventy-five-to-one hundred gallons (75-100 gal.) per capita per day, while a hospital design flow is approximately two hundred gallons (200 gal.) per capita per day. For another example, the design flow criteria for a facility with expected flows of less than 1.0 million gallons per day (MGD) establishes the permitted flow as the maximum 30-day average flow. This permitted flow is estimated by multiplying the average annual flow by a factor of at least 1.5, and dividing that value by twelve (12). When site-specific data is unavailable, the two-hour peak flow must be estimated by multiplying the permitted flow described above by a factor of four (4.0).

The criteria for sewage treatment facilities are based on process type and address the individual system components. The design standards consider design flow, peak flow, influent characteristics, and required discharge quality. The criteria are comprehensive and consider most treatment technologies currently in common use.

When a public sewer system experiences average daily flows in excess of seventy-five (75%) of its permitted capacity for three (3) or more consecutive months TCEQ regulations require that the system owner begin planning for plant expansion or replacement. When average daily flows exceed ninety percent (90%) for three (3) or more consecutive months, TCEQ requires that the owner of the facility begin construction on a new or expanded treatment facility.

Design criteria for collection systems include standards for pipe size, horizontal and vertical spacing, gradient, manhole spacing, lift station connections, and allowable infiltration/inflow. The standards require a minimum diameter of six inches (6") for gravity collection mains. The standards also specify minimum gradients for various pipe sizes that will be required to achieve a flow velocity of at least two feet per second (2'/second). *Table 6C* lists the grade requirements and pipe size minimums that should be required within the city of Wharton's system.

Table 6C: Sewer Gradient Standards

Main Size (in.)	Fall in Feet per 100 Feet of Line (ft.)
4"	0.50
6"	0.50
8"	0.33
10"	0.25
12"	0.20
14"	0.17
15"	0.15
18"	0.11
21"	0.09
24"	0.08
27"	0.06

The typical manhole spacing for six-to-twelve-inch (6"-15") main sizes with straight alignment and uniform grades is five hundred feet (500') (maximum). Reduced spacing may be necessary based on a system's ability to clean and maintain its sewer with available equipment. Lift station design criteria establishes general requirements that include, but are not limited to, the following:

1. The raw wastewater pump, with the exception of a grinder pump, must be capable of passing a sphere of 2.5 inches (2.5") or greater
2. The raw wastewater pump must have suction and discharge openings of at least 3.0 inches (3.0") in diameter;
3. The lift station pumping capacity must have a firm pumping capacity equal to or greater than the expected peak flow;
4. For a lift station with more than two (2) pumps, a force main in excess of one-half (½) mile, or firm pumping capacity of one hundred gallons per minute (100 GPM) or greater, system curves must be provided for both the normal and peak operating conditions at C values for proposed and existing pipe

5. A collection system lift station must be equipped with a tested quick-connect mechanism or a transfer switch properly sized to connect to a portable generator, if not equipped with an onsite generator
6. Lift stations must include an audiovisual alarm system and the system must transmit all alarm conditions to a continuously monitored location
7. A lift station must be fully accessible during a 25-year 24-hour rainfall event
8. A force main must be a minimum of four inches (4.0") in diameter, unless it is used in conjunction with a grinder pump station
9. For a duplex pump station, the minimum velocity is three feet per second (3'/second) with one pump in operation
10. For a pump station with three or more pumps, the minimum velocity is two feet per second (2'/second) with only the smallest pump in operation. The use of pipe or fittings rated at a working pressure of less than one hundred fifty pounds per square inch (150 psi) is prohibited

Wastewater Treatment Facility

The City of Wharton owns and operates two WWTPs. WWTP #1 is located at 806 South East Avenue (County Road 188), on the east bank of the Colorado River, approximately 0.8 mile south-southeast of the intersection of State Highway 60 and Farm-to-Market Road 1299 (East Street) in the City of Wharton (Wharton County) Texas. This is a 1.50 million gallons per day (MGD) activated sludge WWTP which is operated in the contact stabilization mode. The WWTP consists of: a lift station, an automatic barscreen, two rotary fine screens, a contact basin, a reaeration basin, two clarifiers, two digesters, three aerated chlorine contact basins, and a belt press. Gaseous chlorine is used to disinfect the effluent, and sodium bisulfite is used to dechlorinate the effluent prior to discharge. The plant has not reached 75% of the flow limits.

The most recent Comprehensive Compliance Investigation (CCI) report for WWTP #1 of February 15, 2017 indicates that the City received several minor alleged violations, such as failure to properly operate and maintain the WWTP. Specifically, the automatic barscreen was inoperative at the time of investigation. Specifically, the thirty minute settleable solids (SV30) was 55% in the contact basin and was 93% in the reaeration basin. The City's operations staff has indicated that these allegations are being resolved, or have been resolved, as of the time of this Plan.

The current Permit to Discharge Wastes (WQ0010381001) authorizes the discharge of treated domestic wastewater effluent at a daily average flow not to exceed 1.50 million gallons per day (MGD). The permit allows an average discharge during any two-hour period (2-hour peak) of 2,827 GPM, or 4.07 MGD.

WWTP #2 The City of Wharton WWTP No. 2 is located approximately 0.8 miles due north of the intersection of U.S. Highway 59 and Farm-to-Market Road 102, 1.8 miles northwest of the intersection of Richmond Road (State Highway 60) and Ogden Street (Farm-to-Market Road 102) in Wharton County, Texas. This is a 0.50 million gallons per day (MGD) activated sludge facility operated in the extended aeration mode (oxidation ditch). This facility is operating under the final effluent limits of the permit. The facility experiences infiltration/inflow (I/I), but these increased flows do not affect plant operations. The wastewater treatment plant has not reached 75% of its capacity.

The most recent Comprehensive Compliance Investigation (CCI) report for WWTP #2 of October 29, 2014 indicates that the City received several minor alleged violations. The City's operations staff has indicated that these allegations are being resolved, or have been resolved, as of the time of this Plan.

The current Permit to Discharge Wastes (WQ0010381002) authorizes the discharge of treated domestic wastewater effluent at a daily average flow not to exceed .500 million gallons per day (MGD). The permit allows an average discharge during any two-hour period (2-hour peak) of 1,042 GPM, or 1.50 MGD.

According to City operations staff, current average daily flows for the entire collection system are an estimated 1.1 million gallons per day (MGD). 2-Hour peak flows are 2,333 gallons per minute (GPM) for WWTP #1 and 3,400 gallons per minute (GPM) for WWTP #2. Peak flows during and after significant storm events are 3.36 million gallons per day (MGD) for WWTP#1 and .350 million gallons per day (MGD) for WWTP #2. Flows that exceed the systems design capacity can cause the WWTP to experience solids washout and other plant failures that would in turn cause violations of the permitted effluent quality. Collection systems of this age typically experience a significant amount of inflow and infiltration (I/I) into the system. In addition, when a public sewer system experiences average daily flows in excess of 75% of its permitted capacity for three or more consecutive months TCEQ regulations require that the system owner begin planning for plant expansion or replacement. When average daily flows exceed 90% for three or more consecutive months, TCEQ requires that the owner of the facility begin construction on a new or expanded treatment facility.

The current estimated average daily flow of 1.102 MGD represents roughly 55% of permitted levels. The City should monitor the plant inflow during and after storm events to determine the influence of I/I and begin to consider ways and means to mitigate the issue if the flows are found to be excessive.

Industrial Waste & Special Treatment Facilities

Nan Ya Plastics produces some industrial wastes. The exact amount is unknown, but has a minor on site treatment process, that meets the City's pretreatment ordinance, prior to discharging into city lines.

Collection System Lines

The City's force mains are 3" to 14" in diameter according to the best information available at this time. The gravity sewer mains range in diameter from 4" to 27" and are located in both the street Right-of-Ways (ROW) and in the alleys. The original collection lines are primarily Vitrified Clay Pipe (VCP) and concrete pipe. The recent replacements are all SDR-35 and SDR-26 PVC. The newer PVC lines are reported to be in good condition, while the remaining original VCP lines are reported to be in poor condition. VCP becomes very brittle with age and is prone to breaks and joint separation. Under normal conditions, this condition can be a primary source of excessive inflow and infiltration. Collection lines that are broken and separated also constitute a hazard to people and the environment.

The City has been replacing collection mains in its system when sources of funding have been available for the last 10-15 years.

Unserved/Underserved Areas

According to the best information available at this time, there no areas that do not have sewer service within the City's corporate limit.

Manholes & Cleanouts

There are approximately five hundred forty-eight (548) manholes and one hundred forty-two (142) cleanouts within the collection system. The manholes and cleanouts are distributed throughout the collection system. For exact locations please see *Map 6A: Existing Sewer System Map*. Older, deteriorating brick and mortar manholes in the system are probably one of the causes of excessive inflow and infiltration into the collection system and the City should continue to replace these brick manholes as funding sources are found in the future.

Soil Conditions

The integrity of wastewater systems may be affected by soil and topography with respect to system infiltration and inflow, pipe breakage, and other construction issues. For example, soils with high porosity characteristics may contribute to higher system infiltration rates than soils with low infiltration rates, particularly when collection lines and manholes have deteriorated due to age and breakage. Soils that absorb water and swell, like fat clays, can crack sewer pipes and manholes, particularly when these components have been constructed with improper bedding material or techniques. In areas that include septic systems, certain soils may be unsuitable for septic systems if they do not have suitable porosity and percolation characteristics.

Since the City of Wharton is located within an area that contains soils that are relatively stable, serves most of the residents with a centralized collection system that uses proper bedding material with the pipe, and has few, if any, septic facilities within their corporate boundaries, the soils conditions are not particularly relevant to the collection system.

Lift Stations

There are nine (9) lift stations operating within the collection system. According to the best information available at this time, the lift stations are full-size lift stations. Operations staff indicates that they would like to rehab one lift station per year for the next nine years at a cost of approximately $150,000 per lift station.

Inflow & Infiltration (I/I)

Inflow and Infiltration (I/I) are terms used to describe the flow of surface water or ground water into a wastewater collection system. Primary causes include deteriorated manholes that are no longer watertight, cracked or collapsed pipes, disjointed pipe connections, and inadvertent storm water flows into the sanitary system via storm drains (cross-connections). I/I is a serious, continuous, and cumulative problem that has a significant adverse effect on the operation costs and efficiency of a wastewater treatment facility.

Acceptable levels of I/I are determined by applying the standard of 200 gallons per inch of diameter per mile of pipe per day. Using information collected in the system inventory, the allowable I/I for the City of Wharton would be about 108,549 GPD. Since this represents almost 10% of the reported actual normal average daily flow, the I/I experienced in the City's system is probably not much higher than this standard. The operations staff should consider performing an I/I study using smoke testing, video inspection, or other methods in order to more precisely determine potential source(s) of I/I and determine the water tightness of the system.

Operational Procedures

WWTP#1 is classified as a Class "B" facility and requires one operator with a Class "B" or higher license. The City currently has one (1) certified Class "A" operator, one (1) Class "C" operator, and one (1) Class "D" operator, and those persons also hold the requisite qualifications for the operation of the collection system as well.

In the area of operational procedures, there are several issues that all sewer systems should address concerning its treatment and collection systems that require a minimum of capital outlay. These issues are continuous and should be addressed by routine, scheduled operational procedures such as the following:

- Establish a routine to locate sources of I/I and a plan to address these problems in a timely fashion;
- Establish a program for routine scheduled maintenance of plant mechanical equipment, possibly incorporating currently available technological systems such as SCADA (Supervisor Control And Data Acquisition) packages designed for this task;
- Monitor influent and effluent quality on a regularly scheduled basis, with appropriate recording and reporting procedures;
- Establish a routine line and manhole inspection schedule and a plan for the required line and manhole replacement and/or rehabilitation.

In many systems these operational/maintenance practices occur in the form of repair as opposed to preventive maintenance. This situation appears to have occurred frequently in the City of Wharton. The City is making use of TxCDBG funds to finance projects to rehabilitate and/or replace lift stations to the greatest extent possible. In order to avoid serious problems in the future, there should be emphasis on addressing the needs of the collection lines regularly to maintain the system at maximum efficiency and serviceability.

6.3 Wastewater Collection & Treatment System Improvement Projects

Prioritized Problems

In summary, the wastewater system analysis and input from City staff have identified the following problems with the current municipal wastewater collection and treatment system:

1. A need to rehab one lift station per year at $150,000 per lift station;
2. Caney St 12" sewer line replacement Phase I - $180,000;
3. SE Wharton sewer line replacement Phase I - $432,000;
4. SE Wharton sewer line replacement Phase II - $403,000;
5. Caney St 12" sewer line replacement Phase II - $180,000.
6. SE Wharton sewer line replacement Phase III - $326,000;
7. Expand WWTP #2 (depending on city growth) - $3,000,000.

Goals & Objectives

The City established the following goals for its wastewater system:

Goal 1: An efficient wastewater system with minimal operational and maintenance costs.

Objective 1.1: Deteriorating lines in the collection system are replaced by 2028.

Policy 1.1.1: Replace deteriorating and undersized lines, manholes, and cleanouts in the system to reduce inflow and infiltration in the system and thereby reduce operational costs.

Policy 1.1.2: Apply for grants and/or loans from the TxCDBG Program, USDA Rural Development, and other sources to keep the costs of system improvements at a minimum.

Goal 2: Safe and sanitary wastewater treatment and disposal.

Objective 2.1: By 2028, Failing equipment that poses a safety hazard will have been replaced as needed and an annual program put in place to ensure the continued safety of the wastewater system.

Policy 2.1.1: After major improvements are made according to the phased projects in this report, begin an annual program to smoke test and pressure test all existing manholes and cleanouts for leakage. Install waterproofing and seals as needed.

Proposed System Improvements – Planning Period 2018-2028

The following section describes a series of proposed improvements to the existing wastewater collection and treatment system. The improvement projects are presented as phased improvements that are suggested for implementation over the 10-year planning period encompassed by this comprehensive plan. The projects are listed in a sequence that represents just one of several possible avenues, all of which should lead to the achievement of the long-term goals adopted by the City of Wharton for the operation and maintenance of the wastewater collection and treatment system. The sequence shown in this plan is a logical, step-by-step process intended to increase the safety, efficiency, and economy of the wastewater system operations. The sequence is intended only as a suggested program of phased improvements, and alternative sequences are recommended if funding availability requires significant changes to this proposed system improvements program.

Table 6D (Section 6.4) contains the estimated projected costs for each phase of the improvements program. These costs are based on current costs of record for similar projects in the same geographical area of the state. Every effort has been made to include appropriate cost factors such as inflation, variations in the market, and advances in wastewater technology.

The suggested phases for the system improvements are as follows:

- ✓ **Phase 1 (2018-2020):** Obtain funding to replace all air lines at the WWTP #1 and Convert WWTP #1 to a true activated sludge process. Projects will include administrative, engineering, and survey services.
- ✓ **Phase 2 (2020-2023):** Obtain funding to rehabilitate the clarifier at WWTP#1 and add an Anoxic basin to WWTP #1. Projects will include administrative, engineering, and survey services.
- ✓ **Phase 3 (2019-2028):** Obtain funding to rehabilitate one lift station per year (total 9 lift stations). Project will include administrative, engineering, and survey services.
- ✓ **Phase 4 (2023-2028):** Caney St. 12" Sewer Line Replacement Phase I and SE Wharton Sewer Line Replacement Phase I. Projects will include replacement of existing sewer lines, manholes, and existing sewer services, pavement repair, administrative, engineering, and survey services.

6.4 Implementation Plan

The City strives to provide a safe, efficient, and sanitary wastewater collection and treatment system while meeting all applicable wastewater system standards. These goals can be accomplished by implementing the actions and improvement projects outlined in *Table 6D* below.

Table 6D: Wastewater System Improvement Plan Projects: 2018-2028

Goals & Objectives	Activity Year(s)			Lead Organization	Cost Estimate	Funding Sources
	2018-2021	2022-2024	2025-2028			
Goal 6.1 *Replace deteriorated lines and equipment to increase the efficiency of the wastewater system and to minimize operational and maintenance costs.*						
Phase 1: Replace all air lines at the WWTP #1 and Convert WWTP #1 to a true activated sludge process. Projects will include administrative, engineering, and survey services.	X			City	$1,050,000	TWDB; CDBG; USDA; Private; WW Utility
Phase 2: Rehabilitate the clarifier at WWTP#1 and add an Anoxic basin to WWTP #1. Projects will include administrative, engineering, and survey services.	X	X		City	$600,000	TWDB; CDBG; USDA; Private; WW Utility
Phase 3: Rehabilitate one lift station per year (total 9 lift stations). Project will include administrative, engineering, and survey services	X	X	X	City	$1,350,000	TWDB; CDBG; USDA; Private; WW Utility
Phase 4: Caney St. 12" Sewer Line Replacement Phase I and SE Wharton Sewer Line Replacement Phase I. Projects will include replacement of existing sewer lines, manholes, and existing sewer services, pavement repair, administrative, engineering, and survey services.		X	X	City	$190,500	TWDB; CDBG; USDA; Private; WW Utility

Apply for grants and/or loans from the TxCDBG program, USDA Rural Development, and other sources to keep costs of system improvements at a minimum	X	X	X	City	N/A	TxCDBG; USDA
Goal 6.2 *Implement annual program to check for safety hazards to ensure a safe and sanitary wastewater disposal system*						
After major improvements are made according to the phased projects in this report, begin an annual program to smoke test and pressure test all existing manholes and cleanouts for leakage. Install waterproofing and seals as needed.	X	X	X	City	Variable	GEN; WW Utility

GEN = Municipal Funds and General Obligation Bonds; **CDBG** = Texas Community Development Block Grant Program, administered through the Texas Department of Agriculture (TDA); **Private** = Private funding sources through Development Agreements; **TWDB** = Texas Water Development Board; **WW UTILITY** = Municipal Water & Sewer Fund or Certificated of Obligation/Revenue Bonds; **USDA** = US Department of Agriculture – Rural Development

7 Storm Drainage System Study

Storm drainage facilities prevent or minimize damage resulting from overland flows or pooling of water during and following periods of rainfall. They collect and channel the runoff from heavy rainfalls or other surface water into a natural stream course or other body of water. A community's storm drainage system might include creeks, rivers, canals, reservoirs, lakes, marshes or wetlands, channels, culverts, enclosed pipe storm sewers, and ditches.

Previous comprehensive studies include:

COLORADO RIVER RAFT REMOVAL A significant collection of driftwood located near the mouth of the Colorado River grew significantly during the 1800's and early 1900's and came to be known as the "raft". The Texas Legislature passed an act in 1923 to clear the raft and build levees in the hopes of mitigating future flood damages. In 1934 the raft was completely removed into the Gulf of Mexico. The effects of the raft on the streambed elevations in Wharton were addressed in a 1975 study by the Wharton Fresh Water Resources Conservation & Development Commission (WFWRCDC). Inconsistencies in water surface elevations before and after the raft removal in the 1920's and 1930's indicated that the Colorado River channel bed was deepening following the raft removal as silt was carried away and higher velocities prevailed.

BAUGHMAN SLOUGH In 1970, the Galveston District of the Corps published a report related to the floodplain of the Colorado River and Baughman Slough in Wharton, Texas. The report documented historic floods and the dimensions/elevations of bridges crossing Baughman Slough and the Colorado River in the study area. The study indicated that the Intermediate Regional Flood (100-year) on the Colorado River at Wharton would have a peak discharge of 178,000 cubic feet per second (cfs). This value was based on analysis of historical flows from 1900 to 1968 and flows prior to 1942 were adjusted to simulate the effects of Mansfield Dam. Also included in the study are profiles and inundation surfaces for the Colorado River and Baughman Slough resulting from the Intermediate Regional Flood on the Colorado River.

TURK, KEHLE & ASSOCIATES REPORT In 1977, Turk, Kehle, & Associates prepared a report for Wharton County reviewing the 1970 Corps Baughman Slough report. The 1970 report was examined to determine if present (1977) channel conditions were considered and if flood control structures in the Colorado River drainage basin above Wharton were accounted for. The Turk, Kehle, & Associates report stated that the 1970 Corps study did not consider flood control structures on Cummins Creek. As opposed to performing a historical flow analysis along the Colorado River, Turk, Kehle, & Associates centered the 100-year rainfall event on the most critical portion of the watershed, identified as the reach from Austin to Columbus.

Using this procedure, a new 100-year flow rate at Wharton was found to be 145,000 cfs, nearly twenty percent less than the 1970 study. This lower flow rate resulted in water levels 1.6 to 2.1 feet lower than the 1970 report.

LOWER COLORADO RIVER BASIN STUDY U.S. Army Corps of Engineers, October 2003. The primary purpose of the Lower Colorado River Basin Phase I, Texas Interim Feasibility Report and Integrated Environmental Assessment is to investigate the water-resource problems, needs, and opportunities within the Lower Colorado River Basin, and specifically within the Onion Creek watershed, and the city of Wharton, Texas. Because of the influence of the Colorado River on the San Bernard River tributaries in and around the city of Wharton, these tributaries are also included in the study area.

There are no known maps of the City of Wharton's network of roadside ditches. The fieldwork associated with this plan will produce a map of the roadside ditches, curb and gutter sections, and channels.

This Plan recommends that the City attempt to obtain funding for problem drainage mitigation projects, establish a routine program to clean out culverts, grade ditches, regularly maintain drainage facilities, replace selected damaged culverts, replace undersized culverts, re-grade associated ditches where necessary, and adopt a streets and drainage construction manual/ordinance.

7.1 Storm Drainage System Inventory

Field Survey: In the Spring of 2018, GrantWorks, Inc. conducted a field survey of the stormwater drainage system in the City of Wharton. The survey identified the location, type, size, condition and level of blockage or damage (when applicable) for all the drainage features including curb and gutter (if applicable), channels & roadside ditches, bridges and culverts. That information is illustrated on *Map 7A: Existing Drainage System 2018.*

The drainage system elements that serve the City of Wharton are controlled by three (3) separate entities: Wharton County, the Texas Department of Transportation (TxDOT), and the City of Wharton. The City's drainage system capabilities are subject to the jurisdiction of those three entities, so it does not control all of the decisions related to the scope, location, or timing of drainage system improvements. The City is responsible for minor roadside ditch and culvert maintenance and major structures that are located within the City limits on roads and properties maintained by the City. Wharton County is responsible for structures in the ETJ not located on US Highways or on TxDOT farm-to-market roads (FM) such as CR 135 and CR 166. TxDOT maintains the roadside drainage system along US Hwy 59 FM 102, and FM 1301. The majority of existing culverts are located along local streets and are the responsibility of the City for maintenance, while the maintenance of roadside ditches is essentially evenly divided amongst the City, County, and TxDOT. Most of the City maintained local streets currently have culvert or drainage ditches alongside them.

Drainage systems typically consist of curb and gutter, inlets, enclosed underground pipes, culvert pipes, roadside ditches, channels, creeks, and bridges that use the natural topography or grade of the land to convey storm water from the community to a nearby creek, river, or reservoir. The City of Wharton relies on a system of culvert pipes, roadside ditches, channels, underground storm sewers, curb and gutter, and creeks to control excess storm water and convey it away from the City.

The different types of culvert pipes found throughout the City and ETJ of Wharton include Corrugated Metal Pipe (CMP), High Density Polyethylene Pipe (HDPE), Cast Iron, Reinforced Concrete Box Culverts (RCBC), and Reinforced Concrete Pipe (RCP). The field survey recorded a total of two hundred forty-eight (248) culverts within the City limits and ETJ. Of those, one hundred seventy (170) were the responsibility of the City for maintenance. Wharton is not responsible for the maintenance of any culverts utilized for the drainage of TxDOT or County maintained right of ways. Altogether, TxDOT and Wharton County are responsible for maintaining the other seventy-eight (78) culverts located throughout the municipal region of Wharton. The culverts were inventoried and are shown on *Map 7A: Existing Drainage System 2018.*

7.2 Storm Drainage System Analysis

Geographic Context

Wharton is located between the banks of the Colorado River and Baughman Slough in the Colorado River Basin. Baughman Slough, runs seven miles northeast and flows into Peach Creek. Caney Creek also runs thru the City of Wharton. The creek flows toward the Gulf of Mexico before becoming part of the Intracoastal Waterway.

The City of Wharton has relatively flat terrain topography, with a maximum elevation near 107 feet MSL in the northwest area of the City to around 97 feet MSL along Caney Creek in the eastern section of the city. Most buildings' finished floor elevations are between 98 and 108 feet above sea level.

Existing Drainage Facilities

The City's drainage system was developed over the course of the City's growth. The system does not function well in some areas in its present configuration. The existing roadside ditches and culverts serve as the primary roadway drainage infrastructure in the City. In some cases, these ditches do not have adequate capacity to convey runoff during average rainfall events and many do not drain well after the event. The inadequate ditches also do not provide positive drainage for the pavement resulting in pavement subgrade and surface deterioration. Moreover, localized flooding occurs due to the lack of ditches and culverts alongside local streets. The sections below examine the state of each type of drainage facility in more detail.

Roadside Ditches/Drainage Channels

Roadside drainage ditches line the state and local roads within the City and its ETJ to convey stormwater to the unnamed tributaries and named creeks that surround the City. Channel types are shown in *Table 7A*. The roadside ditches within the City and its ETJ are maintained nearly equally by the City, Wharton County, and TxDOT.

Table 7A: Drainage Channel Type & Length, City Limits & ETJ

Drainage Channel Type	LF	Maintenance	Percent
Natural Lined Channel	40,545	City	4.47%
Concrete Lined Channel	282	City	0.03%
Roadside Ditch	287,480	City	31.66%
Sub Total	328,307		36.15%
Natural Lined Channel	0	County	0.00%
Concrete Lined Channel	0	County	0.00%
Roadside Ditch	310,378	County	34.15%
Sub Total	310,378		34.15%
Natural Lined Channel	0	TxDOT	0.00%
Concrete Lined Channel	0	TxDOT	0.00%
Roadside Ditch	269,370	TxDOT	29.70%
Sub Total	269,370		29.70%
Total	**908,055**		**100.00%**

Source: 2018 Fieldwork

Underground Storm Drainage System

According to the best information available at this time, there is an underground drainage network in portions of the City of Wharton, mostly coinciding with areas with curb and gutter and inlets, and TxDOT ROW.

Culverts

The most significant problems with Wharton's culvert facilities are their inadequate sizing in some locations and their lack of maintenance. However, unlike the ditch system, the maintenance of the majority of the two hundred forty-eight (248) culverts located in the vicinity is the responsibility of the City. Of the one hundred seventy (170) culverts the City maintains, fifty-five (55) are damaged, eight (8) are completely/mostly blocked, and twenty-eight (28) are damaged and completely/mostly blocked. Wharton County is responsible for sixty-two (62) culverts of which fourteen (14) are damaged, seven (7) are completely/mostly blocked, and eleven (11) are damaged and completely/mostly blocked. TxDOT is responsible for sixteen (16) culverts of which three (3) are damaged.

The most common problem encountered with culvert pipes is either blockage from the accumulation of silt, vegetation, and other debris, or damaged ends from vehicle traffic. The reduction in storm water movement caused by the blocked culverts may lead to standing water and mosquito problems for residents, although there have been occasional reports of buildings flooding.

Culvert damage can result from several factors including but not limited to: insufficient turning radii of pavement sections at intersections; insufficient pavement width at intersections; high velocities of the runoff in the ditches, channels, and streams; and the absence of protective headwalls or end treatments for the culvert pipes. Those factors cause vehicular traffic, particularly truck traffic, to pass over and crush the unprotected ends of the pipes in the process of turning. High water velocities within the ditches, channels, and streams can cause erosion and undermining of the culvert pipes, which can damage or significantly reduce their bearing capacity.

The city has no inter-local agreement with the county for maintenance of culverts or ditches, and should pursue one.

Figure 7A: Damaged Culvert Example

Figure 7B: Undamaged Culvert Example

Drainage Problem Areas

According to City staff, the primary area in which property flooding occurs is located in the southwest side of the city, mainly along the Colorado River as it traverses downtown between its intersection with US 59 and Business 59, and in the northern central section of the city between Caney Creek and Baughman Slough. There are occasional cases of nuisance ponding throughout the City during average rainfall events that result in minor property damage and standing water is always detrimental to road surfaces. The areas are:

1. Along 570 feet of Caney Creek beside feet N Sunset Street between Ogden Street and S Caney Drive;
2. Large area in the vicinity north and east of the intersection of Mockingbird Lane and N Fulton Street; and
3. Near the end of Kelving Way where it meets William Way.

National Flood Insurance Program

The National Flood Insurance Program (NFIP) is a FEMA program that provides federally-backed flood insurance to members of communities that carry out measures to reduce the risk of flood damage. While NFIP participation is voluntary, federally backed flood insurance is not available for structures in non-participating communities, and disaster assistance as well as federal grants and loans are not available for structures in FEMA designated special flood hazard areas (SFHAs) of non-participating communities. Various requirements and caveats apply to the obligations of lenders and property owners with respect to flood insurance and specific questions should be addressed to FEMA or the Texas Water Development Board NFIP division.

There are a many SFHA's within the City of Wharton, mostly along the banks of the Colorado River, Caney Creek, and Baughman Slough as described in Section 1.3, above. The effective date of the most recent Flood Insurance Rate Map (FIRM) for Wharton is December 21, 2017. This FIRM is titled #48481C0355F. The City does have a flood plan ordinance #2006-06 dated March 13, 2006. The special flood hazard areas of the City are shown on *Map 7A: Existing Drainage System 2018.*

7.3 Storm Drainage System Improvement Projects

This report is an evaluation, analysis, and planning report rather than a design study; detailed design data for individual construction projects has not been developed as a part of the report. The construction of improvements to the storm drainage system should be preceded by a detailed engineering design analysis, plans, and specifications. This report is intended solely to provide the City of Wharton with guidance in the planning of future storm drainage improvements.

Prioritized Problems

City staff and consulting engineers have identified the following areas of concern with regard to the storm-water system.

1. Damage to the existing culverts;
2. Need for detention facilities;

3. Need for the City to use a consistent method for sizing culverts and drainage infrastructure to ensure new structures function efficiently;
4. Need to maintain ditches and control erosion and sedimentation build-up that impedes the function of drainage infrastructure.

Like many rural cities, Wharton faces a difficult predicament with respect to drainage problems. There is little grant money available to make improvements to the drainage systems of rural towns. Routine maintenance is the only viable route available to many cities to address various drainage problems. The following plan framework outlines a specific set of actions to meet Wharton's drainage system needs with local resources.

Goals & Objectives

Goal 1: A city-wide drainage system that prevents flooding of private property.

Objective 1.1: Mitigate all nuisance ponding areas over the planning period.

Policy 1.1.1: Between 2018 and 2028 annually budget to revise drainage structures in identified nuisance ponding areas and engaging engineers to properly size culverts and design ditches.

Policy 1.1.2: Between 2018 and 2028 determine if nuisance ponding areas can be addressed as water and sewer improvements are made.

Policy 1.1.3: Continue to communicate regularly with TxDOT and San Patricio County Drainage District to provide for on-going, semi-annual routine maintenance of all culvert pipes, drainage channels, and roadside ditches by removing silt, debris, and vegetation that impede the flow of water.

Objective 1.2: By 2023, commission and adopt a basic street and drainage construction manual/ordinance specifying required width and depth of drainage channels and diameter of culverts for use by current and future City staff and contractors hired to construct improvements.

Goal 2: Maintain a functional city-wide drainage system that limits sedimentation loading to nearby creeks.

Objective 2.1: Improve drainage system between 2018 and 2028 to alleviate nuisance ponding areas.

Objective 2.2: Decrease opportunities for introducing sediment into the city's drainage system.

Policy 2.2.1: Educate City public works staff on and increase annual funding to the public works department to construct properly sized drainage channels and culverts.

Proposed System Improvements – Planning Period 2018-2028

The following section describes a series of proposed improvements to the existing drainage infrastructure. The improvement projects are presented as phased improvements that are suggested for implementation over the 10-year planning period encompassed by this comprehensive plan.

The projects are listed in a sequence that represents just one of several possible avenues, all of which should lead to the achievement of the long-term goals adopted by the City of Wharton for the maintenance of the drainage infrastructure. The sequence shown in this plan is a logical, step-by-step process intended to increase the safety and efficiency of the drainage infrastructure. The sequence is intended only as a suggested program of phased improvements; alternative sequences are recommended if funding availability requires significant changes to this proposed infrastructure improvements program.

Table 7B (Section 7.4) contains the proposed schedule for each phase of the improvements program during the 10-year planning period. These costs are based on current costs of record for similar projects in the same geographical area of the state. Every effort has been made to include appropriate cost factors such as inflation, variations in the market, and advances in stormwater technology.

These cost estimates are predicated on several assumptions related to the scope of each phase. These assumptions are as follows:

- Culvert pipe replacements costs are based on using Reinforced Concrete Pipe (RCP);
- Culvert replacements are estimated for a pipe size increase of one standard size over the existing size. Standard sizes are defined as those sizes that are readily available from a local supplier;
- The culverts that are identified as damaged are assumed to require 100% replacement;
- For City maintained culverts, the addition of a standard TxDOT-type Safety End Treatment (SET) at each end of the pipe is assumed for culverts scheduled for replacement;
- The cost estimates include grading to "daylight" at each end in order to ensure positive drainage;
- Culvert replacement includes driveway and pavement repair assuming a pavement cut of 4' in width, ROW width minus 20' in length, and a 2" depth of HMAC pavement placement;
- New and existing roadside ditches assumes a full depth excavation with a triangular cross-section of a 3.0' top width and a 1.0' depth at center;
- Existing drainage channel maintenance assumes a one-half depth excavation with a trapezoidal cross-section of a 7.0' top width, 1.0 bottom width, 3.0' depth at center, and 1:1 side slope;

- Engineering and Surveying – Engineering and surveying services are estimated at 20%-35% of the estimated construction costs of an element as described above.

The proposed phases of future drainage system improvements are as follows:

- ✓ **Phase 1 (2018-2020)**: Obtain funding for two drainage studies of the southeast and north and central areas of town to evaluate existing conditions and capacity of existing underground storm sewers and ditches in Study Area B and identify and recommend opportunities for detention and restoring drainage paths to the existing ditches and creeks draining the downtown area. Project will also include re-grading of approximately 20,000 LF of roadside ditches in the southeastern portion of the city, Administration, Engineering, & Surveying services. and Administration, Engineering, & Surveying services.
- ✓ **Phase 2 (2020-2022):** Obtain funding to re-grade approximately 52,600 LF of existing roadside ditches in the northern portion of the city, and Administration, Engineering, & Surveying services.
- ✓ **Phase 3 (2023-2025):** Continue to obtain funding to re-grade approximately 41,700 LF of existing roadside ditches in the northern portion of the city and replace undersized and/or damaged culverts in selected portions of the City. Project will include culvert replacements, SET's at both ends of culvert replacements, re-grading of existing roadside ditches, pavement and driveway repair, and Administration, Engineering, & Surveying services.
- ✓ **Phase 4 (2025-2028):** Obtain funding to implement the recommendations of the Area B Drainage Study to restore and improve storm water conveyance and construct regional detention facilities, as appropriate. Project will include culvert and storm water clearance and replacements, SET's at both ends of culvert replacements, re-grading of existing roadside ditches, new channel and roadside ditches where appropriate, detention pond improvements where appropriate, pavement and driveway repair, and Administration, Engineering, & Surveying services.

7.4 Implementation Plan

The following plan framework outlines a specific set of actions to meet the city's drainage system needs. The estimated costs for the actions and improvement projects are as follows:

Table 7B: Drainage System Improvement Plan Projects: 2018 - 2028

Goals & Objectives	Activity Year(s)			Lead Organization	Cost Estimate	Funding Sources
	2018-2021	2022-2024	2025-2028			
Goal 7.1 *Develop a city-wide drainage system that prevents flooding of private property*						
Phase 1: Obtain funding for two drainage studies of the southeast and north and central areas of town to evaluate existing conditions and capacity of existing underground storm sewers and ditches in Study Area B and identify and recommend opportunities for detention and restoring drainage paths to the existing ditches and creeks draining the downtown area. Project will also include re-grading of approximately 20,000 LF of roadside ditches in the southeastern portion of the city, Administration, Engineering, & Surveying services.	X			City	$347,000	GEN; CDBG; TWDB; USDA; FMA; CDBG-DR
Phase 2: Obtain funding to re-grade approximately 52,600 LF of existing roadside ditches in the northern portion of the city, and Administration, Engineering, & Surveying services	X	X		City	$320,626	GEN; CDBG; TWDB; USDA; FMA; CDBG-DR
Phase 3: Continue to obtain funding to re-grade approximately 41,700 LF of existing roadside ditches in the northern portion of the city and replace undersized and/or damaged culverts in selected portions of the City. Project will include culvert replacements, SET's at both ends of culvert replacements, re-grading of existing roadside ditches, pavement and driveway repair, and Administration, Engineering, & Surveying services.		X		City	$254,200	GEN; CDBG; TWDB; USDA; FMA; CDBG-DR

Phase 4: Obtain funding to implement the recommendations of the Area B Drainage Study to restore and improve storm water conveyance and construct regional detention facilities, as appropriate. Project will include culvert and storm water clearance and replacements, SET's at both ends of culvert replacements, re-grading of existing roadside ditches, new channel and roadside ditches where appropriate, detention pond improvements where appropriate, pavement and driveway repair, and Administration, Engineering, & Surveying services.			X	City	$1,200,000	GEN
Adopt a streets and drainage construction manual/ordinance.		X		City	$2,000 (Legal, Engineers)	CDBG; USDA
Goal 6.2 *Implement an annual program to check for safety hazards to ensure a safe and sanitary wastewater disposal system*						
After major improvements are made according to the phased projects in this report, begin an annual program to smoke test and pressure test all existing manholes and cleanouts for leakage. Install waterproofing and seals as needed.	X	X	X	City	Variable	GEN; Utility

GEN = Municipal funds; **CDBG**=Texas Community Development Block Grant program if area is involved in project where street/curb and gutter repair is required; **CDBG-DR**=TxCDBG Disaster Relief funds; **FHWA**=Federal Highway Administration; **FMA** = Flood Mitigation Assistance program through the TWDB for NFIP members only; **Private** = Land donation; **TWDB** =Texas Water Development Board Flood Protection Planning; **TxDOT** = Texas Department of Transportation; **USDA** = USDA Rural Development

*Notes on Estimates: * Negotiate a cost sharing agreement that provides equipment, labor, and materials for drainage maintenance. ** Refer to NFIP information concerning available funding through the program.*

7.5 Appendix 7A: National Flood Insurance Program (NFIP)

The following describes regulations set by FEMA with which NFIP members must comply. The text derives primarily from NFIP Legislation and Regulation Guidance Documents (sections 59-61, available at http://www.fema.gov/guidance-documents-other-published-resources)

Federal "100-year" Standard: The NFIP has used a comprehensive study by a group of experts to advise the agency as to the best standard to be used as the basis for risk assessment, insurance rating, and floodplain management for the Program. After extensive study and coordination with Federal and State agencies, this group recommended the one-percent-annual-chance flood (also referred to as the 100-year or "Base Flood") be used as the standard for the NFIP. The -percent-annual-chance flood was chosen on the basis that it provides a higher level of protection while not imposing overly stringent requirements or the burden of excessive costs on property owners. The one-percent-annual-chance flood (or 100-year flood) represents a magnitude and frequency that has a statistical probability of being equaled or exceeded in any given year, or, stated alternatively, the 100-year flood has a 26 percent (or one-in-four) chance of occurring over the life of a 30-year mortgage. The regulatory flood plains cover areas that would most likely be inundated by the largest storm events that typically occur in the area. While these storm events are referred to as 100-year or 500-year events, the designation actually refers to the probability of a storm of that particular magnitude occurring in any given year. As mentioned before, the "100-year" storm has a 1% chance of occurring in any given year, and the "500-year" storm has a 0.2 percent chance of occurring in any given year.

Identifying and Mapping Flood-Prone Areas: Under the NFIP, Flood Hazard Boundary Maps (FHBMs), which delineated the boundaries of the community's Special Flood Hazard Areas (SFHAs), have been prepared using approximate methods prior to completion of a community's Flood Insurance Study (FIS), These methods identify on an approximate basis a one-percent-annual-chance floodplain, but do not include the determination of Base Flood Elevations (BFEs) (100-year flood elevations), flood depths, or floodways. The Flood Hazard Boundary Map is intended to assist communities that do not have current FIRMs in managing floodplain development, and to assist insurance agents and property owners in identifying those areas where the purchase of flood insurance was advisable.

FISs that use detailed hydrologic and hydraulic analyses to develop BFEs and designate floodways and risk zones for developed areas of the floodplain have been subsequently produced for most NFIP communities. Once more detailed risk data was provided to communities, the community could then enter the Regular Program whereby the community is required to adopt more comprehensive floodplain management requirements and owners of structures could purchase higher amounts of insurance.

An FIS usually generates the following flood hazard information:

- BFEs are presented as either water-surface elevations or average depths of flow above the ground surface. These elevations and depths are usually referenced to either the National Geodetic Vertical Datum of 1929 (NGVD29) or the North American Vertical Datum of 1988 (NAVD88).
- Water-surface elevations for the 10-year (10-percent-annual-chance), 50-year (2-percent-annual-chance), 100-year (1-percent-annual-chance), and 500-year (0.2-percent-annual-chance) floods.
- Boundaries of the regulatory 100-year floodway. The regulatory floodway is defined as the channel of a stream plus any adjacent floodplain areas that must be kept free of encroachment so that the entire Base Flood (100-year flood) discharge can be conveyed with no greater than a 1.0-foot increase in the BFE.
- The boundaries of the 100- and 500-year floodplains. The 100-year floodplain is referred to as the Special Flood Hazard Area (SFHA).

Floodplain Management: The Congressional Acts that created the NFIP prohibit the Federal Emergency Management Agency (FEMA) from providing flood insurance to property owners unless the community adopts and enforces floodplain management criteria established under the authority of Section 1361(c) of the Act. These criteria are established in the NFIP regulations at 44 CFR §60.3. The community must adopt a floodplain management ordinance that meets or exceeds the minimum NFIP criteria. Under the NFIP, "community" is defined as:

"any State, or area or political subdivision thereof, or any Indian tribe or authorized tribal organization, or Alaska Native village or authorized native organization, which has authority to adopt and enforce floodplain management regulations for the areas within its jurisdiction."

The power to regulate development in the floodplain, including requiring and approving permits, inspecting property, and citing violations, is granted to communities under a State's police powers. FEMA has no direct involvement in the administration of local floodplain management ordinances.

Minimum NFIP Floodplain Management Requirements: Under the NFIP, the minimum floodplain management requirements that a community must adopt depend on the type of flood risk data (detailed FIS and FIRMs with BFEs or approximate A Zones and V Zones without BFEs) that the community has been provided by FEMA. Under the NFIP regulations, participating NFIP communities are required to regulate all development in SFHAs. "Development" is defined as:

> *"Any man-made change to improved or unimproved real estate, including but not limited to buildings or other structures, mining, dredging, filling, grading, paving, excavation or drilling operations or storage of equipment or materials."*

Before a property owner can undertake any development in the SFHA, a permit must be obtained from the community. The community is responsible for reviewing the proposed development to ensure that it complies with the community's floodplain management ordinance. Communities are also required to review proposed development in SFHAs to ensure that all necessary permits have been received from those governmental agencies from which approval is required by Federal or State law, such as 404 wetland permits from the Army Corps of Engineers or permits under the Endangered Species Act.

Under the NFIP, communities must review subdivision proposals and other proposed new development, including manufactured home parks or subdivisions to ensure that these development proposals are reasonably safe from flooding and that utilities and facilities servicing these subdivisions or other development are constructed to minimize or eliminate flood damage.

In general, the NFIP minimum floodplain management regulations require that new construction or substantially improved or substantially damaged existing buildings in A Zones must have their lowest floor (including basement) elevated to or above the Base Flood Elevation (BFE). Non-residential structures in A Zones can be either elevated or dry-floodproofed. In V Zones, the building must be elevated on piles and columns and the bottom of the lowest horizontal structural member of the lowest floor of all new construction or substantially improved existing buildings must be elevated to or above the BFE. The minimum floodplain management requirements are further described below:

- For all new and substantially improved buildings in A Zones:
- All new construction and substantial improvements of residential buildings must have the lowest floor (including basement) elevated to or above the BFE.
- All new construction and substantial improvements of non-residential buildings must either have the lowest floor (including basement) elevated to or above the BFE or dry-floodproofed to the BFE. Dry floodproofing means that the building must be designed and constructed to be watertight, substantially impermeable to floodwaters.
- Buildings can be elevated to or above the BFE using fill, or they can be elevated on extended foundation walls or other enclosure walls, on piles, or on columns.
- Because extended foundation or other enclosure walls will be exposed to flood forces, they must be designed and constructed to withstand hydrostatic pressure otherwise the walls can fail and the building can be damaged. The NFIP regulations require that foundation and enclosure walls that are subject to the 100-year flood be constructed with flood-resistant materials and contain openings that will permit the automatic entry and exit of floodwaters. These openings allow floodwaters to reach equal levels on both sides of the walls and thereby lessen the potential for damage. Any enclosed area below the BFE can only be used for the parking of vehicles, building access, or storage.

In addition, to the above requirements, communities are required to select and adopt a regulatory floodway in riverine A Zones. The area chosen for the regulatory floodway must be designed to carry the waters of the one-percent-annual-chance flood without increasing the water surface elevation of that flood more than one foot at any point. Once the floodway is designated, the community must prohibit development within that floodway which would cause any increase in flood heights. The floodway generally includes the river channel and adjacent floodplain areas that often contain forests and wetlands. This requirement has the effect of limiting development in the most hazardous and environmentally sensitive part of the floodplain.

Ordinance Adoption: Once FEMA provides a community with the flood hazard information upon which floodplain management regulations are based, the community is required to adopt a floodplain management ordinance that meets or exceeds the minimum NFIP requirements. FEMA can suspend communities from the Program for failure to adopt once the community is notified of being flood-prone or for failure to maintain a floodplain management ordinance that meets or exceeds the minimum requirements of the NFIP. The procedures for suspending a community from the Program for failure to adopt or maintain a floodplain management ordinance that meets or exceeds the minimum requirements of the NFIP are established in the NFIP regulations at 44 CFR §59.24(a) and (d).

Prior to filing an application for NFIP participation, the community would have to adopt a resolution stating it wishes to become an NFIP participant and designating a Floodplain Administrator. The 77th Legislature of the State of Texas amended Subchapter I, Chapter 16, Water Code, by adding Section 16.3145 to read as follows:

"The governing body of each city and county shall adopt ordinances or orders, as appropriate, necessary for the city or county to be eligible to participate in the National Flood Insurance Program....., not later than January 1, 2001".

Model ordinances and sample permit forms are available online at www.twdb.state.tx.us/wrpi/flood/nfip.htm. Flood prevention ordinances often require or encourage appropriate development in flood prone areas and/or set zoning standards for areas to restrict the use or density of floodplain development. They also vest a designated Flood Administrator with the responsibility of delineating areas of special flood hazard; providing information about inhabited floodplain areas; maintaining FEMA flood maps; and cooperating with federal, state and local officials and private firms in undertaking to study, survey, map and identify floodplain. The Administrator is also to assist with the development and implementation of floodplain management measures.

Community Rating System: The NFIP's Community Rating System (CRS) provides discounts on flood insurance premiums in those communities that establish floodplain management programs that go beyond NFIP minimum requirements. Under the CRS, communities receive credit for more restrictive regulations, acquisition, relocation, or floodproofing of flood-prone buildings, preservation of open space, and other measures that reduce flood damages or protect the natural resources and functions of floodplains.

Under the CRS, flood insurance premium rates are adjusted to reflect the reduced flood risk resulting from community activities that meet the three goals of the CRS:

1. Reduce flood losses, i.e.
    a. Protect public health and safety,
    b. Reduce damage to property,
    c. Prevent increases in flood damage from new construction,
    d. Reduce the risk of erosion damage, and
    e. Protect natural and beneficial floodplain functions;
2. Facilitate accurate insurance rating; and
3. Promote the awareness of flood insurance.

There are 10 CRS classes: Class 1 requires the most credit points and gives the largest premium reduction; Class 10 receives no premium reduction. CRS premium discounts on flood insurance range from five percent for Class 9 communities up to 45 percent for Class 1 communities. The CRS recognizes 18 creditable activities, organized under four categories: Public Information, Mapping and Regulations, Flood Damage Reduction, and Flood Preparedness.

For example, credits are provided for use of future conditions hydrology and more restrictive floodway standards, prohibiting fill in the floodway, and adopting compensatory storage regulations, innovative land development criteria, storm water management regulations, other higher regulatory standards, and local floodplain management plans. Credits are also provided in the CRS for preserving open space in their natural state and for low-density zoning and for acquiring and clearing buildings from the floodplain and returning the area to open space. The 2002 *CRS Coordinator's Manual* includes a new section, "Land Development Criteria," which specifically credits community land development regulations that limit development in the floodplain or provide incentives to limit floodplain development. Communities receive credits for adopting smart growth land development criteria and for creating open space through their land development process.

7.6 Appendix 7B: NFIP Community Rating System (CRS)

The National Flood Insurance Program Community Rating System

Information from: http://training.fema.gov/EMIWeb/CRS/

The Community Rating System (CRS) is a part of the NFIP. The CRS reduces flood insurance premiums to reflect what a community does above and beyond the NFIP's minimum standards for floodplain regulation. The objective of the CRS is to reward communities for what they are doing, as well as to provide an incentive for new flood protection activities. The reduction in flood insurance premium rates is provided according to a community's CRS classification, as shown in the chart.

Community participation in the CRS is VOLUNTARY.

To apply for CRS participation, a community submits documentation that shows what it is doing and that its activities deserve at least 500 points. The documentation is attached to the appropriate worksheet pages in this CRS Application. The application is submitted to the ISO/CRS Specialist. The ISO/CRS Specialist is an employee of the Insurance Services Office, Inc. (ISO). ISO works on behalf of the Federal Emergency Management Agency (FEMA) and the insurance companies to review CRS applications, verify the communities' credit points, and perform program improvement tasks.

The following information is based on the 2013 NFIP CRS Coordinator's Manual.

The 2017 CRS manual is included in the *Digital Appendix* and available at https://www.fema.gov/media-library/assets/documents/8768.

A Quick Check of a Community's Potential CRS Credit

a. Purpose

A minimum of 500 points is needed to receive a CRS classification of Class 9, which will reduce premium rates. This quick check provides some basic information for local officials to determine if their communities will have enough points to attain Class 9.

If a community does not qualify for at least 500 points, it may want to initiate some new activities in order to attain Class 9. For example, some of the public information activities can be implemented for a very low start-up cost. The quick check can identify where points can be earned for new activities.

b. Quick Check Instructions

The section numbering system is used throughout all CRS publications. Sections 300 through 600 describe the 18 creditable activities. Activity 310 (Elevation Certificates) is required of all CRS communities and Activity 510 (Floodplain Management Planning) is required of designated repetitive loss communities. The rest of the activities are optional. Only the elements most frequently applied for are listed.

If the activity is applicable, the average community score (which is in parentheses) should be entered in the blank to the left to provide a rough estimate of the community's initial credit points.

c. Minimum Requirements

Section 211 (Prerequisites): The community must be in the Regular Phase of the NFIP and be in full compliance with the minimum requirements of the NFIP. The application must include a letter from the Federal Emergency Management Agency (FEMA) Regional Office confirming that the community is meeting all of the latest NFIP requirements.

Activity 310 (Elevation Certificates): All CRS communities must maintain FEMA's elevation certificates for all new and substantially improved construction in the floodplain after the date of application for CRS classification.

Sections 501–503 (Repetitive Loss Areas): A community with properties that have received repeated flood insurance claim payments must map the areas affected. Communities with 10 or more such properties must prepare, adopt, and implement a plan to reduce damage in repetitive loss areas. The FEMA Regional Office can tell whether this applies to any given community.

d. Other Activities

If the activity is applicable, the average community score (which is in parentheses) should be entered in the blank at left to provide a rough estimate of the community's initial credit points.

Public Information Activities (Series 300)

____ (45) 310 (Elevation Certificates) Maintain FEMA elevation certificates for all new construction. Maintaining them after the date of CRS application is a minimum requirement for any CRS credit.

____ (50) 320 (Map Information) Respond to inquiries to identify a property's FIRM zone and publicize this service.

____ (72) 330 (Outreach Projects) Send information about the flood hazard, flood insurance, and flood protection measures to flood-prone residents or all residents of the community.

____ (19) 340 (Hazard Disclosure) Real estate agents advise potential purchasers of flood-prone property about the flood hazard; or regulations require a notice of the flood hazard.

____ (39) 350 (Flood Protection Information) The public library maintains references on flood insurance and flood protection.

____ (49) 360 (Flood Protection Assistance) Give inquiring property owners technical advice on protecting their buildings from flooding, and publicize this service.

____ (110)[43] 370 (Flood Insurance Promotion) Assess current flood insurance coverage; develop and implement a plan to improve coverage; and provide technical advice to property owners about flood insurance.

Mapping and Regulatory Activities (Series 400)

____ (64) 410 (Additional Flood Data) Develop new flood elevations, floodway delineations, wave heights, or other regulatory flood hazard data for an area that was not mapped in detail by the flood insurance study; or have the flood insurance study's hydrology or allowable floodway surcharge based on a higher state or local standard.

____ (463) 420 (Open Space Preservation) Guarantee that a portion of currently vacant floodplain will be kept free from development.

____ (213) 430 (Higher Regulatory Standards) Require freeboard; require soil tests or engineered foundations; require compensatory storage; zone the floodplain for minimum lot sizes

[43] New activity in 2013. Average community score not available. Figure provided indicates maximum possible points based on 2013 coordinator's manual.

of 1 acre or larger; regulate to protect sand dunes; or have regulations tailored to protect critical facilities or areas subject to special flood hazards (e.g., alluvial fans, ice jams, or subsidence).

____ (87) 440 (Flood Data Maintenance) Keep flood and property data on computer records; use better base maps; or maintain elevation reference marks.

____ (107) 450 (Storm water Management) Regulate new development throughout the watershed to ensure that post-development runoff is no worse than pre-development runoff

Flood Damage Reduction Activities (Series 500)

____ (167) 510 (Floodplain Management Planning) Prepare, adopt, implement, and update a comprehensive plan using a standard planning process.

____ (165) 520 (Acquisition and Relocation) Acquire and/or relocate flood-prone buildings so that they are out of the floodplain.

____ (45) 530 (Flood Protection) Document floodproofed or elevated pre-FIRM buildings.

____ (212) 540 (Drainage System Maintenance) Conduct periodic inspections of all channels and retention basins and perform maintenance as needed.

Warning and Response (Series 600)

____ (129) 610 (Flood Warning and Response) Provide early flood warnings to the public and have a detailed flood response plan keyed to flood crest predictions.

____ (235)[44] 620 (Levee Safety) Maintain levees that are not credited with providing base flood protection.

____ (160)[45] 630 (Dam Safety) All communities in a State with an approved dam safety program receive credit.

____ **TOTAL ESTIMATED POINTS FOR THE COMMUNITY**

[44] Activity so extensively revised that the old credits cannot be converted to the 2013 Coordinator's Manual.
[45] Activity so extensively revised that the old credits cannot be converted to the 2013 Coordinator's Manual.

8 Street System Study

Streets are in some ways the most difficult capital improvement to budget for because they are expensive, not usually related to imminent health and safety concerns, and not often fundable through grants. This study assesses existing street conditions and makes recommendations for the timing and funding of needed improvements.

There are no available prior studies related to the street network in Wharton.

The City of Wharton owns and is responsible for maintaining approximately 41% of the street network within the city limits and the extraterritorial jurisdiction. Most City-maintained streets are paved (primarily asphalt) and, at the time of fieldwork, more than ½ of City-maintained streets were in good condition. Poor drainage in southeast Wharton and along several key arterials (e.g. Fulton Street) negatively impacts road conditions. Curbs along several streets shift due to road loads and ground shifting. As a result, water runoff does not reach the gutter and instead pools on the streets, leading to deterioration of the road base. Flooding after Hurricane Harvey further negatively impacted street conditions in Wharton.[46]

The City of Wharton performs its own streets maintenance work and follows a regular maintenance schedule based on annual lists. The City also performs its own street improvements projects or contracts the work out.

8.1 Street System Inventory

In June 2017, the existing street system was surveyed and the following information collected:

- The dimension of each street, both the width and right-of-way;
- The surface material (e.g. asphalt, caliche, or gravel/dirt); and
- A rating of the condition of each street's surface according to the following classifications:

[46] Study finding do no reflect the impact of post-Harvey flooding because fieldwork was completed prior to the event.

Good Condition	Few surface cracks or potholes; little edge deterioration
Fair Condition	(a) Surface cracks less than one-half inch (<½") in width; (b) potholes less than two inches (<2") in diameter and/or less than two inches (<2") in depth; (c) crumbling edges extending less than one inch (<1") from street edge
Poor Condition	(a) Surface cracks more than one-half inch (>½") in width; (b) potholes greater than two inches (>2") in diameter and/or less than or equal to two inches (≤2") in depth; (c) crumbling edges extending more than one inch (>1") from street edge

Figure 8A: Reference Road Conditions

The street system survey included streets within both the Wharton city limits and the extraterritorial jurisdiction (ETJ). *Table 8A (next page)* provides an inventory of the survey findings. The street system is delineated according to street type (paved, unpaved), material (asphalt, concrete, gravel, dirt, etc.), and condition (good, fair, poor). The inventory also specifies those streets that are owned, and therefore must be maintained, by the City of Wharton. *Map 8A: Existing Street System* illustrates the survey findings for spatial analysis and includes street location, condition, right-of-way, and width. *Map 8A* also shows unbuilt right-of-way and the location of existing curbs and gutters or similar drainage (all drainage structures identified in *Chapter 7: Storm Drainage System Study).*

Table 8A: Street Inventory (All)

Street Type - Material & Condition	All Streets (ETJ & City) LF (Miles)		% of All Streets	City-Maintained Streets LF (Miles)		% of Street Type	% of City-Maintained Streets
PAVED (Asphalt)							
Good	505,116	95.7	65%	141,308	26.8	49%	44%
Fair	180,527	34.2	23%	130,673	24.7	45%	40%
Poor	23,775	4.5	3%	15,314	2.9	5%	5%
Total Paved	***709,419***	***134.4***	***91%***	***287,295***	***54.4***	**-**	**89%**
PAVED (Concrete)							
Good	25,342	4.8	*3%*	*25,342*	4.8	8%	79%
Fair	3,585	0.7	*0%*	*3,585*	0.7	1%	11%
Poor	3,194	0.6	*0%*	*3,194*	0.6	1%	10%
Total Paved	***32,121***	***5.5***	***4%***	***32,121***	***6.1***	***10%***	**10%**
TOTAL PAVED	741,540	140	94%	319,416	60	-	99%
UNPAVED (Gravel)							
Good	0	0.0	0%	0	0.0	0%	0%
Fair	25,863	4.9	3%	2,440	0.5	73%	1%
Poor	911	0.2	0%	911	0.2	27%	0%
Total Gravel	***26,774***	***5.1***	***3%***	***3,351***	***0.6***	**-**	**1%**
UNPAVED (Dirt)							
Good	0	0.0	0%	0	0.0	0%	0%
Fair	0	0.0	0%	0	0.0	0%	0%
Poor	13,568	2.6	2%	0	0.0	0%	0%
Total Dirt	***13,568***	***2.6***	***2%***	0	0.0	0%	0%
TOTAL UNPAVED	40,341	7.6	5%	3,351	0.6	-	1%
ALL STREETS							
Good	530,459	100.5	68%	166,650	31.6	-	52%
Fair	209,975	39.8	27%	136,699	25.9	-	42%
Poor	41,447	7.8	5%	19,418	3.7	-	6%
ALL STREETS	**781,881**	**148.08**	**100%**	**322,767**	**61.13**	**41%**	**100%**

Source: GrantWorks 2017 Fieldwork

Table 8B (page 8-4) further summarizes survey findings for City-maintained streets.

Table 8B: City-maintained Streets Inventory

Street Type – Condition & Material	LF (Miles)		% of Streets Condition	% of All City-Maintained Streets
GOOD				
Paved (Asphalt/Concrete)	166,650	32	100%	52%
Unpaved (Gravel/Dirt)	0	0	0%	0%
Total Good Condition	***166,650***	***31.6***	-	**52%**
FAIR				
Paved (Asphalt/Concrete)	134,259	25	98%	42%
Unpaved (Gravel/Dirt)	2,440	0	2%	1%
Total Fair Condition	***136,699***	***25.9***	**-**	**42%**
POOR				
Paved (Asphalt/Concrete)	18,508	4	95%	6%
Unpaved (Gravel/Dirt)	911	0	5%	0%
Total Poor Condition	***19,418***	***3.7***	**-**	**6%**
ALL STREETS	**322,767**	**61.1**	**100%**	**100%**

Source: GrantWorks 2017 Fieldwork

8.2 Street System Analysis

Based on the survey findings outlined in *Section 8.1*, the street system analysis determines the adequacy of the system to meet existing and forecasted needs and makes recommendations for any needed improvements concerning traffic flow and street conditions.

8.2.1 Street Condition

The City of Wharton owns, and therefore is responsible for maintaining, approximately 41% of the streets located within the city limits and the extraterritorial jurisdiction (see *Table 8A, previous page*). Nearly all City-maintained streets are paved (asphalt/concrete (99%). Road conditions and maintenance often present a major challenge for communities. Yet, relative to many similarly sized cities in Texas, Wharton's streets were in good condition. At the time of fieldwork nearly all City-maintained were in good condition (52%) (see *Table 8A and Table 8B, above*).

However, poor drainage in southeast Wharton and along several key arterials (e.g. Fulton Street) negatively impacts road conditions. Curbs along several streets shift due to road loads and ground shifting. As a result, water runoff does not reach the gutter and instead pools on the streets, leading to deterioration of the road base. Flooding can damage both unpaved and paved streets (such as stripping asphalt overlays). Therefore, in addition to regular street maintenance (discussed below), keeping drainage infrastructure maintained will be essential to keeping Wharton's streets in good condition (see *Chapter 7: Storm Drainage Study)*.

8.2.2 Street Repair

Four standard street repair options are available to improve and maintain the condition of asphalt streets in Wharton:

- *Point Repairs:* Point repairs such as treating potholes and roadway hazards are a portion of annual, ongoing street maintenance. Point repairs are completed by excavating failed pavements sections to the back course and back filling with cold mix asphalt which is then compacted to the existing grade. Surface sealant is optional.

- *Seal Coat (Also known as Chip Seal):* Ideally conducted every three-to-five-years, seal coating maintains streets and forestalls costlier repairs. Seal coats are completed by applying asphalt cement which is then covered with pre-coated aggregate at about one (1) cubic yard of aggregate per 90 square yards. Using recent engineering cost estimates, chip seal coating would cost an estimated $2.24 per square yard. There are several different types of materials used for seal coating. One of the most popular materials, coal-tar sealcoat, is a widely-recognized source of polycyclic aromatic hydrocarbons (PAHs). The USGS provides facts and research about *PAHs and Coal-Tar-Based Pavement Sealcoat* on their website, at: http://tx.usgs.gov/sealcoat.html.

- *Overlay:* Overlay, which completely replaces the surface material of a street, should be done every 10-to-20-years to address pavement deterioration and extend street life; frequency of overlay depends on traffic load and environmental conditions. Depending on the severity of wear, approximately one inch of surface is milled off the existing street to level depressions in the pavement. The remaining surface material is overlaid with a minimum of 1.5-to-2-inches of hot mix asphaltic concrete (HMAC) or hot mix/cold laid asphaltic concrete, followed by a surface treatment (two-course). Two-course overlay increases the life of the pavement, and would require additional milling. Using recent engineering cost estimates, overlay projects would cost an estimated $6.93 per square yard, depending on processes chosen.

- *Reclaim/Reconstruct:* In cases of extensive deterioration, streets will need to be reclaimed or reconstructed. Street reconstruction involves removing the existing base to a minimum depth of six inches; creating a roadway base of emulsified asphalt mixed with recycled asphalt; and creating a bearing surface by applying two-course of asphalt cement. Base is proof-rolled at each course. Surface sealant optional. Streets receiving the reclamation treatment will last 12-to-20 years, depending on the traffic load and environmental conditions. Cost estimates would be higher than for overlay methods, at about $30.11 per square yard. The cost of this method also approximates costs for paving a gravel road.

Before seal coat, overlay, or reconstruct activities are undertaken, an engineer should assess the condition of the road and kind of construction needed. Road base condition cannot always be accurately determined by driving condition and **choosing the wrong construction type will increase costs over time.**

Street repairs should also always occur in conjunction with or shortly following water, sewer, and other underground utility line projects to avoid duplicating efforts. When street repairs are not consciously phased with line projects, it is not uncommon for a street to be paved, torn up for line replacement, and then repaved within the space of five years.

8.2.3 Street Maintenance Costs

The initial cost of streets is usually paid for by the developer and new residents, and that can make it easy to ignore the cost implications of street design. However, because street maintenance and reconstruction are typically paid for through taxes rather than grants or special funding, it is important to consider the long-term cost implications of short-term construction decisions.

Two primary considerations impact street costs over time: a) initial street design, such as street and lane width as well as street layout, and b) maintenance policies.

When considering policies that set standards for street design and maintenance, the City should consider the costs and benefits of each criterion.

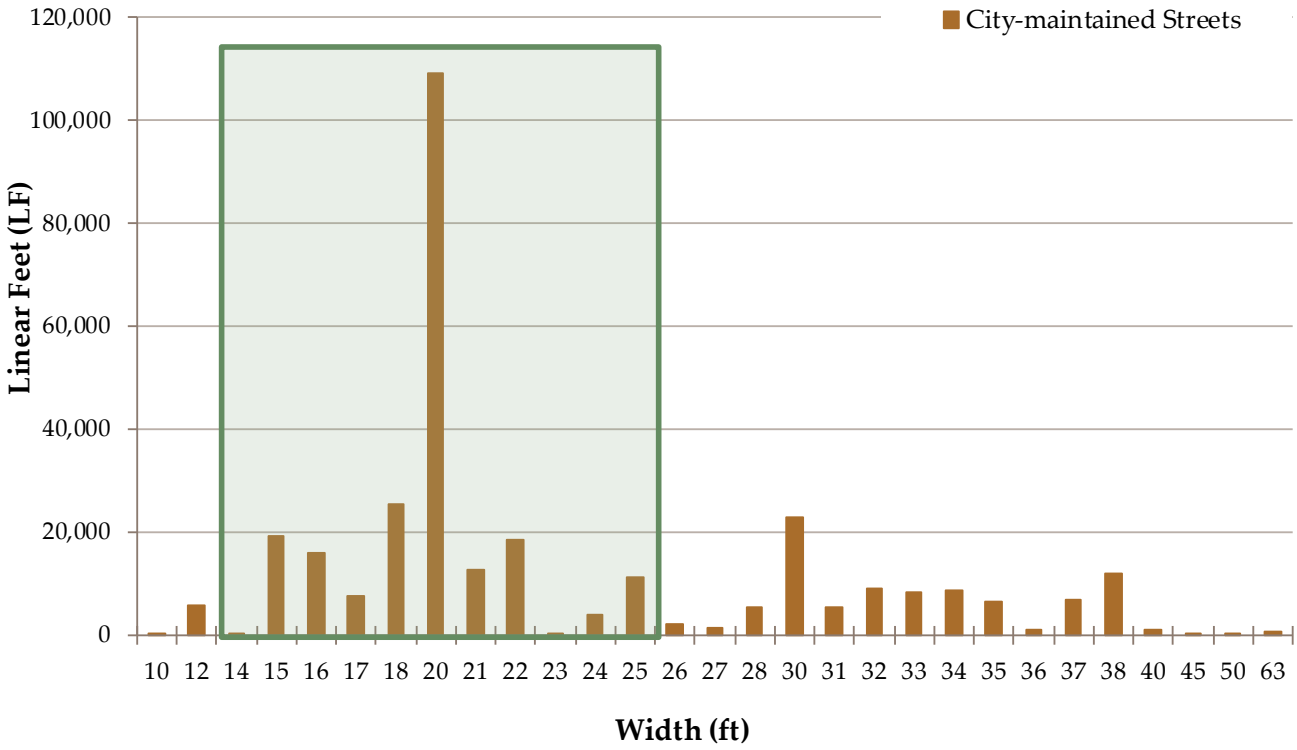
Street & Lane Width

Street width can have important implications not only for maintenance costs but also for public safety. "The wider the better" is often an accepted standard for street width, and subdivision ordinances often reflect that sentiment. However, in general, streets should be built to a minimum of 14 feet and a maximum of 25 feet. Widths below 14 feet can limit automobiles' ability to easily pass each other. As roads exceed 25 feet in width, problems related to speeding, on-street parking (which can be a hazard to children in residential areas), heat-island effects, and maintenance of street and drainage systems increase. Wider roads should be used in high-traffic areas, including dense residential neighborhoods.

Lane width presents a similar issue. The American Association of State Highway and Transportation Officials (AASHTO) manual states that lane widths for rural and urban arterials may vary from 10-to-12-feet. Common practice builds to 12 feet and assumes that narrower lane widths are less safe. However, there is ample research that proposes the exact opposite – that narrower lane widths are not correlated with higher crash rates and may even be associated with lower crash rates by helping to reduce speeding. Cities around the country are finding that when an existing road is redesigned for 10- or 11-foot lanes there is enough left-over space to include on-street bike facilities.

Chart 8A illustrates the range of roadway widths for City-maintained streets and the total linear feet of roadway measured at each width. The green square identifies streets within the recommended road width range of 14-to-25 feet. As the chart shows, the most common road width is 20 feet (approximately 1/3 of all road area). many City-maintained streets in Wharton are wider than the recommended maximum width. Streets 26 feet or greater in width comprise approximately 29% of the street area in Wharton. Most of these roads are between 30 and 38 feet in width and include thoroughfare streets like Fulton and Alabama, as well as several local roads like Tennie, Hughes, Maple, and La Delle.

Chart 8A: Street Width Distribution, City-maintained Streets



Source: GrantWorks Fieldwork 2017

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8.2.4 Street Network Layout

Street layout and connectivity can also impact maintenance costs. For example, a high number of dead-end streets - as shown in the cul-de-sac networks in *Figure 8B* - will increase congestion and speed road deterioration. Grid-based networks facilitate ease of access and movement, but also require a larger amount of land use for streets and, as a result, higher maintenance costs. Curvilinear loop networks offer an option for maintaining connectivity while reducing the land area required for streets *(see Figure 8B).*

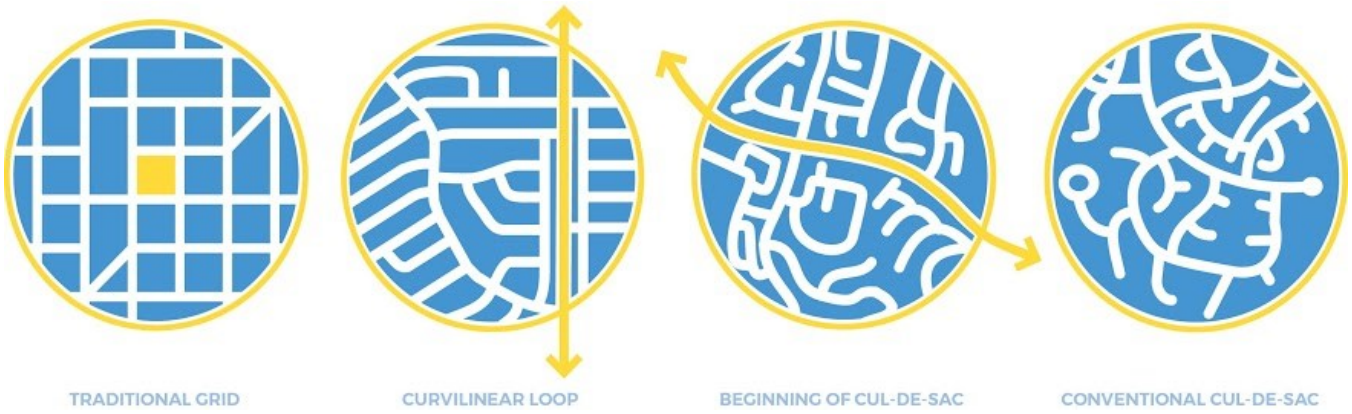


Figure 8B : Street Network Examples[47]

Coordination between transportation goals and land use goals is essential for enhancing mobility because land use patterns and design have a significant impact on traffic flow and mobility. As *Figure 8C* depicts, the typical suburban housings development design is often less efficient in terms of mobility, especially for residents on foot. Because of the 'lollipop' street network layout, a one-minute walk becomes a 10-minute walk or, without infrastructure to support non-motorized travel such as sidewalks or bike lanes, travelers may only feel safe driving.

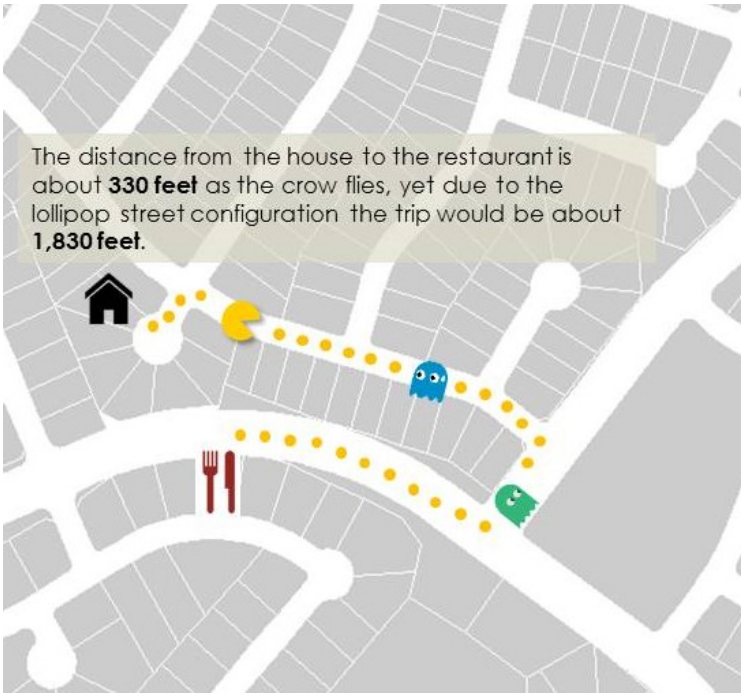


Figure 8C: Land Use Impacts Transportation

[47] Source: www.cnu,org

The layout of Wharton's street system has been determined primarily by the location of natural features, like the Colorado River, and transportation infrastructure including railroad right-of-way, and TxDOT-maintained and County-maintained roads that traverse the city (e.g. US 59, BU 59-R, SH 60, FM 102, FM 1307). These roads serve as Wharton's primary thoroughfares. Local streets extend from the thoroughfares to form a general grid and several small neighborhoods. Street connectivity within most neighborhoods is good but there are several areas with dead-end streets and/or very long block lengths. The City should continue to consider both motorized and non-motorized connections as Wharton continues to grow.

The City should also take actions to promote connectivity between existing streets and future developments. Cul-de-sacs may be appropriate where topography limits through-streets. However, if new development does not incorporate connections with existing local streets, the high number of dead ends create an otherwise avoidable additional financial and administrative burden. Street design requirements, such as layout and width, are usually established within a subdivision ordinance, although they can also be controlled through zoning or through a construction manual.

Strategic decisions about unbuilt right-of-way can support connected and efficient future street development. Often, cities have sections of right-of-way that were dedicated when the land was platted but streets were never constructed. This often occurs because (a) the developments were never completely built out or (b) topographic barriers made construction of the streets impractical.

Making strategic decisions about whether to maintain or abandon unbuilt right-of-way can support future connectivity and avoid unnecessary general maintenance expenditure (such as mowing). For example, it is not worthwhile to keep sections of unbuilt right-of-way that have either already been occupied by residential yards or structures, or that are considered a poor location for development because of existing streams or swampy soil. **In home rule cities, an abutting street may be closed or vacated without consent of the adjoining property owners.**

Figure 8E (next page) illustrates recommendations for which sections of unbuilt right-of-way in Wharton should be maintained to enable connections with future development (orange) and which sections should be abandoned (red).

Figure 8E: Unbuilt Right-of-Way Recommedations

Maintenance Policies

A regular and strategic street maintenance schedule is key to avoiding extensive street deterioration and costly repairs. Delayed maintenance decreases the surface life of paved roads. Routine maintenance extends the life of streets, delays higher cost improvements, and can save a city money in the long run. *Figure 9E* illustrates how the use of preventative maintenance treatments can defer the need for rehabilitation.

An ideal maintenance schedule addresses road deterioration as it occurs so that roads never fall below "fair" condition. Roads receive annual pot hole and crack sealing, a seal coat every 8-to-10-years, some overlay every 20 years, and reconstruction every 30 years. Seal coat and overlay repairs extend the life of the road and forestall more expensive maintenance. A delayed maintenance schedule only addresses roads that have fallen into fair-to-poor condition. Because of surface and road base deterioration, cheaper maintenance options will only have a temporary effect on roads in fair-to-poor condition.

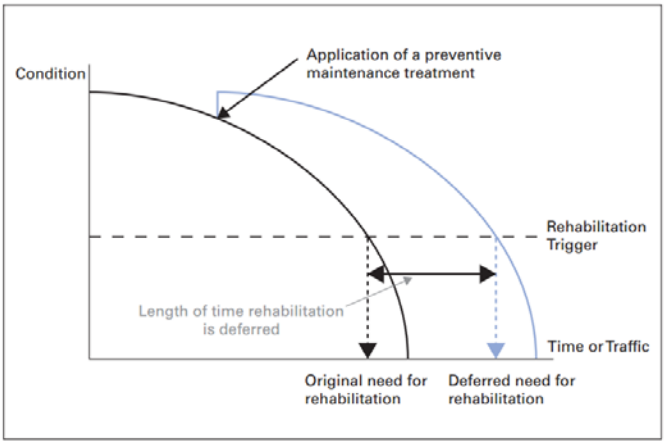


Figure 8D: Preventative Maintenance Treatments Slow the Rate of Pavement Deterioration[48]

The City of Wharton performs its own streets maintenance work and maintains a regular maintenance schedule. The City evaluates City-maintained streets every spring and develops two maintenance lists: a reconstruct list and a seal cost list. Streets in most need of repair are put on a reconstruct list. Streets in fair condition with a good based are put on a seal coat list. These streets get a new layer of asphalt with new aggregate rock placed on top.

Using the standards in *Table 8C (next page)* and the total linear feet of streets currently maintained by the City of Wharton, an ideal city-wide road maintenance program would cost approximately $511,496 per year. As *Table 8C* also demonstrates, widening City-maintained streets by only one foot raises the cost of an ideal maintenance program by $20,460 per year. The City spent approximately $717,397 on streets and drainage during the 2015 fiscal year and $790,419 during the 2016 fiscal year.

[48] *Source: Federal Highway Administration Pavement Preservation Compendium II http://www.fhwa.dot.gov/pavement/preservation/ppc06.pdf*

Table 8C: City-wide Street Maintenance Costs

Repair Type	Repair Frequency	$ per square yard	Ideal Maintenance Schedule (**annual** price at existing average street width of 25 feet)	**Annual** price per each additional foot of road width*
Seal Coat (asphalt)	10 years (10% per year)	$2.24	$200,833	$8,033
Overlay (asphalt)	20 years (5% per year)	$6.93	$310,663	$12,427
Preventative Maintenance (e.g. pot holes)	Annual, city-wide, as-needed	N/A	$40,000	-
	Total		**$551,496**	**$20,460**

*Estimate in 2018 dollars using 2018 costs; does not include inflation, cost fluctuation or other variables, and $/yard estimate is included to facilitate re-calculation using adjusted numbers.

Substandard materials and inadequate drainage also decrease the surface life of paved roads. Developers will sometimes attempt to cut construction costs by installing inferior quality materials and sub-standard design in towns and cities that do not have minimum design standards and/or that do not require regular inspection during construction by a licensed engineer.

The City of Wharton should consider developing a public works construction manual. Wharton should also consider adopting a subdivision ordinance that has specific warranty and testing requirements for new street construction to ensure that new streets and roadside drainage features (which are generally maintained by the municipality) after installation are of standard quality.

8.2.5 Share the Road

Biking and walking are not just for dense, urban areas. Active transportation has many benefits for rural Americans and data shows that not only are rural Americans interested in walking and biking, they are already doing it at higher rates than previously believed.[49] Investing in active transportation infrastructure like bike facilities, sidewalks, and trails can improve the safety, health, and happiness of a community. These projects are much less expensive to build compared to road projects and can help mitigate traffic congestion. Multimodal infrastructure also offers less expensive transportation options for users. Transportation is the second largest expenditure for American families (after housing) (National Complete Streets Coalition, 2018).

[49] U.S. DOT 2009 Omnibus Household Survey

Safe and comfortable pedestrian and bike facilities could also encourage those who might otherwise feel unsafe or intimidated to explore the city outside of their vehicles; 22% of survey park respondents indicated that they do not feel safe walking to the nearest park and 30% of respondents indicated that they do not feel safe biking to the nearest park. See *Chapter 11: Recreation & Open Space* for a detail summary of survey findings.

There are no dedicated bike lanes in the city of Wharton. However, sidewalks run along many of the streets, particularly in central Wharton.

Residents would like to see the sidewalk network further developed. Park survey respondents identified sidewalks as the most important additional facility (based on weighted score). These facilities are especially important for children and kids; based on park survey responses walking is the fourth most popular activity for children in Wharton. See *Chapter 11: Recreation & Open Space* for a detail summary of survey findings.

The City of Wharton should also support bike transportation. The City can encourage or enforce the development of bike facilities in several ways, including:

- Include bicycle facilities development in the subdivision ordinance
- Adopt a Complete Streets Ordinance
- Adopt a Bicycle Parking Ordinance
- Adopt a Vulnerable Road Users or Safe Passing Ordinance
- Apply for grants
- Educational programming and outreach to motorists and bicyclists on rules of the road and bicycle safety
- Organize bicycle events like ciclovias

The Rails to Trails Conservancy is an excellent resource for cities regarding walking and bicycling. Their *Active Transportation Beyond Urban Centers: Walking and Bicycling in Small Towns and Rural America* report is included in the *Digital Appendix* of this plan for reference.

A great resource for bicycle facilities design is the National Association of City Transportation Officials (NACTO) Urban Bikeway Design Guide.

This rendering from the NACTO Urban Bikeway Design Guide depicts a cycle track. This on-street protected facility offers a high-quality result for a small investment.

8.2.6 Funding

One alternative to using a General Fund for street maintenance costs is a 4B Sales Tax. The 4B Sales Tax is a locally implemented program that allows municipalities to create economic development corporations that manage projects funded by local sales tax. The tax can fund a broad range of community improvement projects related to economic development and community improvement, and a number of Texas cities choose to dedicate revenues to street improvements. The 4B program is established by vote at the local level and requires the establishment of a development corporation to manage the funds. The tax is adopted as an additional increment of 0.125% on top a city's existing sales tax. A second alternative to using the general fund for street maintenance costs is a Street Maintenance Tax. Like the 4B Sales Tax, the Street Maintenance Tax is established by vote. Unlike the 4B Sales Tax, the Street Maintenance Tax is capped at 0.25%, all revenues are dedicated to street maintenance, the tax must be re-established every four years, and no development corporation is required.

However, local sales taxes cannot exceed 2.0% (or 8.25% total sales tax). The City of Wharton has collected a 0.5% 4B Sales Tax since 1998 in addition to the 1.0% City Sales Tax and the 0.5% Wharton County sales tax, for a total local sales tax of 2.0% (or 8.25% total sales tax). The City of Wharton could only increase its 4B Sales Tax collection rate or adopt a street maintenance tax if the County sales tax rate decreased.

8.3 Prioritized Problems

Problems with the City's street system are ranked and listed as follows:

1. Local streets in fair-to-poor condition need repaving or reconstruction.
2. Lack of drainage infrastructure contributes to substandard street conditions.
3. Unbuilt right-of-way not intended for future construction should be vacated.

8.4 Street System Improvement Projects

The following section describes a series of proposed improvements to the existing street system. The improvement projects are presented as phased improvements that are suggested for implementation over the 10-year planning period encompassed by this comprehensive plan.

Table 8D: Implementation Plan (Section 8.5) elaborates the implementation plan for street improvements in Wharton over the next 10 years. The plan includes four construction phases:

- **Construction Phase 1 (2018-2021):** Repair 57,135 Linear Feet (LF) of streets primarily in Wharton's west end, with Phase 1 improvements for water or wastewater; and/or routes that direct traffic to highly traveled destinations, including schools, parks, commercial areas, and major thoroughfares. The repair operations should include an overlay process for the sections of paved streets that can be salvaged. Cost estimates assume paving of unpaved roads and reclaim/reconstruct for concrete roads in poor condition to be replaced with asphalt.
- **Construction Phase 2 (2022-2024):** Repair 88,600 Linear Feet (LF) of street primarily in north Wharton; with Phase 2 improvements for water or wastewater, and/or routes that direct traffic to highly traveled destinations, including schools, parks, commercial areas, and major thoroughfares. The repair operations should include an overlay process for the sections of paved streets that can be salvaged. Cost estimates assume paving of unpaved roads and reclaim/reconstruct for concrete roads in poor condition to be replaced with asphalt.
- **Construction Phase 3 (2025-2026):** Repair 84,457 Linear Feet (LF) of street primarily in west and central Wharton; with Phase 3 improvements for water or wastewater, and/or routes that direct traffic to highly traveled destinations, including schools, parks, commercial areas, and major thoroughfares. The repair operations should include an overlay process for the sections of paved streets that can be salvaged. Cost estimates assume paving of unpaved roads and reclaim/reconstruct for concrete roads in poor condition to be replaced with asphalt.

- **Construction Phase 4 (2027-2028):** Repair 64,300 Linear Feet (LF) of street primarily in central Wharton; with Phase 4 improvements for water or wastewater, and/or routes that direct traffic to highly traveled destinations, including schools, parks, commercial areas, and major thoroughfares. The repair operations should include an overlay process for the sections of paved streets that can be salvaged. Cost estimates assume paving of unpaved roads and reclaim/reconstruct for concrete roads in poor condition to be replaced with asphalt.

Construction phases are illustrated on *Map 8B: Proposed Street Improvements 2018-2028.*

The construction phasing reflects an effort to address streets in fair-to-poor condition by 2028 and to execute an ongoing system of street maintenance for local roads. The projects are sequenced to coordinate with the recommended water and wastewater line replacement projects in *Chapter 5 and Chapter 6.* Street repairs should occur in conjunction with or shortly following line projects to avoid duplicate street construction/paving caused by damages from line projects. Changes to water and wastewater project phasing (commonly due to funding availability and changes in project priorities) would result in changes to street project phasing.

For those streets that route traffic directly to highly traveled destinations, including schools, parks, central businesses districts, repair operations should include an overlay process for the sections of paved streets that can be salvaged and new pavements sections for those areas that currently do not have pavement. For less highly traveled roads, seal coating may be sufficient.

Table 8D (Section 8.5) also includes estimated costs for each construction phase. The costs are based on current costs of record for similar projects in the same geographical area of the state. Cost estimates are also based on the goal of (re)paving all roads in fair-to-poor condition and the assumption that street widths will not change. The costs of each type of construction and the linear feet and cubic yards for each street have been included in *Table 8E* to facilitate adjustments to the cost estimates.

The City spent approximately $717,397 on streets and drainage during the 2015 fiscal year and $790,419 during the 2016 fiscal year. **The proposed construction phases average approximately $239,649 per year**. As with all planning documents, the costs are estimates only provided to inform staff and council members on approximate amounts required for city-wide street improvements. Exact prices cannot be known until specific proposals have been created and construction bids entered.

Construction phases are also expected to be altered based on fund availability. Although generally more cost effective in the long term, the costs of increasing and maintaining a paved road network is not financially feasible for many smaller communities. The City should continue to develop paving priorities based on frequency of use and connections between key destinations such as school, business centers, etc. In addition, the Federal Highway Administration's "Gravel Roads Constructions and Maintenance Guide" provides both information to help guide paving decisions and technical guidance for extending the longevity of unpaved roads (guide included in the *Digital Appendix).*

The City should also consider reducing street widths to decrease improvements costs where appropriate. The City save an estimated $20,460 by reducing streets widths by only one foot (see *Table 8C).*

8.5 Implementation Plan

The following table outlines a specific set of actions and improvement projects to achieve a functional street system that improves the quality of life in Wharton. The estimated costs for the actions and improvement projects are as follows:

Table 8D: Street Improvement Plan Projects: 2018 - 2028

Goals & Objectives	Activity Year(s)			Lead Organization	Cost Estimate	Funding Sources *
	2018-2021	2022-2024	2025-2028			
Goal 8.1 *A safe, well-maintained and functional community street system*						
By 2019, establish a system for maintaining street system on an overlapping, rotating basis by following a program of chip seal coating, overlay, and reclamation projects to keep paved surfaces in good condition.	X			City	N/A	N/A
Adopt updated subdivision ordinance standards that establish minimum street design requirements and require developers to provided interconnectivity between new development and the existing street system	X			City	<$1,000 (legal)	GEN
Construction Phase 1: Repair 57,135 Linear Feet (LF) of streets primarily in Wharton's west end, with Phase 1 improvements for water or wastewater; and/or routes that direct traffic to highly traveled destinations, including schools, parks, commercial areas, and major thoroughfares. The repair operations should include an overlay process for the sections of paved streets that can be salvaged. Cost estimates assume paving of unpaved roads and reclaim/reconstruct for concrete roads in poor condition to be replaced with asphalt.	X	X		City	$581,792 ($193,931/ year)	GEN
Construction Phase 2: Repair 88,600 Linear Feet (LF) of street primarily in north Wharton; with Phase 2 improvements for water or wastewater, and/or routes that direct traffic to highly traveled		X		City	$592,251 ($197,417/ year)	GEN

destinations, including schools, parks, commercial areas, and major thoroughfares. The repair operations should include an overlay process for the sections of paved streets that can be salvaged. Cost estimates assume paving of unpaved roads and reclaim/reconstruct for concrete roads in poor condition to be replaced with asphalt.						
Construction Phase 3: Repair 84,457 Linear Feet (LF) of street primarily in west and central Wharton; with Phase 3 improvements for water or wastewater, and/or routes that direct traffic to highly traveled destinations, including schools, parks, commercial areas, and major thoroughfares. The repair operations should include an overlay process for the sections of paved streets that can be salvaged. Cost estimates assume paving of unpaved roads and reclaim/reconstruct for concrete roads in poor condition to be replaced with asphalt.		X	X	City	S574,488 ($287,244/ year)	GEN
Construction Phase 4: Repair 64,300 Linear Feet (LF) of street primarily in central Wharton; with Phase 4 improvements for water or wastewater, and/or routes that direct traffic to highly traveled destinations, including schools, parks, commercial areas, and major thoroughfares. The repair operations should include an overlay process for the sections of paved streets that can be salvaged. Cost estimates assume paving of unpaved roads and reclaim/reconstruct for concrete roads in poor condition to be replaced with asphalt.			X	City	$560,044 ($280,002/ year)	GEN
Annual seal coat ten (10) percent of City streets; annual overlay five (5) percent of City streets; and reconstruct three (3) percent of currently paved streets City Street (based on 25-foot average width) incorporated into the above construction phases).	X	X	X	City	$551,496 / year	GEN
Implement drainage projects in *Chapter 7: Storm Drainage System Study* to prevent ponding of water on roadways.	X	X	X	City	$2,121,826	City; TxDOT

GEN = City of Wharton General Fund, including funds from any new tax; TxDOT = Texas Department of Transportation. Some street segments may require associated curb and gutter construction. Those prices are not included in the costs on this table.

Table 8E: Street Improvements by Construction Phase (Current Widths)

2018-2022									
Phase	**Street**	**From**	**To**	**Condition**	**Material**	**Linear Feet**	**Current Width**	**Square Yards**	**Cost**
Phase 1	Alabama	Richmond	Fulton	Poor	Asphalt	970	31	3340	$ 23,145.03
Phase 1	Allen	Martin Luther King	Goode	Good	Asphalt	431	12	575	$ 1,287.56
Phase 1	Azalea	Camelia	Outlar	Poor	Asphalt	1153	16	2049	$ 14,202.44
Phase 1	Bailey	Camelia	Hughes	Good	Asphalt	2176	17	4111	$ 9,208.91
Phase 1	Black	End (south)	Elm	Poor	Asphalt	521	12	695	$ 4,814.86
Phase 1	Branch	Martin Luther King	Hendon	Good	Asphalt	1640	20	3645	$ 8,164.09
Phase 1	Burleson	Hughes	Sheppard	Good	Asphalt	370	20	822	$ 1,842.07
Phase 1	Burleson	Sheppard	Ford	Good	Asphalt	609	18	1218	$ 2,729.10
Phase 1	Camellia	Columbine	Martin Luther King	Fair/Good	Asphalt	3352	16	5959	$ 13,348.55
Phase 1	Caney	Outlar	Ford	Good	Asphalt	2335	18	4671	$ 10,462.61
Phase 1	Cloud	Colorado	Burleson	Poor	Asphalt	304	22	743	$ 5,151.59
Phase 1	Cloud	Burleson	Milam	Fair	Asphalt	361	22	881	$ 1,974.17
Phase 1	Cloud	Milam	End (north)	Fair/Good	Asphalt	789	25	2192	$ 4,910.80
Phase 1	Colorado	Sunset	Dinosaur Park	Poor	Concrete	1216	32	4324	$ 129,715.06
Phase 1	Colorado	Dinosaur Park	Richmond	Good	Asphalt	117	32	418	$ 935.21
Phase 1	Colorado	Colorado (W-E)	BU 59-R Underpass-Elm Connection	Good	Asphalt	645	20	1433	$ 3,210.04
Phase 1	Columbine	Azalea	Outlar	Good	Asphalt	659	16	1172	$ 2,624.67
Phase 1	Connie	End (west)	Outlar	Fair	Asphalt	830	15	1383	$ 3,098.24
Phase 1	Damon	End (west)	Sheppard	Fair	Asphalt	370	12	493	$ 1,105.28
Phase 1	Edwards	Sheppard	Kaiser	Fair	Asphalt	414	15	690	$ 1,545.18
Phase 1	Elm	Polk	Alabama	Good	Asphalt	4167	30	13890	$ 31,114.23
Phase 1	Ford	End (south)	Milam	Good	Asphalt	1894	22	4629	$ 10,368.84
Phase 1	Ford	Milam	End (north)	Poor	Gravel	911	20	2023	$ 60,703.85
Phase 1	Gallagher	Colorado	Burleson	Poor	Asphalt	306	22	747	$ 5,175.23
Phase 1	Goode	Allen	Outlar	Fair	Asphalt	376	12	502	$ 1,123.66

Phase 1	Harris	End (west)	Outlar	Fair	Asphalt	550	15	917	$ 2,053.82
Phase 1	Harris	Outlar	Hughes	Fair	Asphalt	896	18	1791	$ 4,012.62
Phase 1	Hawes	Polk	Houston	Poor	Concrete	366	15	610	$ 18,306.33
Phase 1	Hawes	Houston	Fulton	Fair	Asphalt	364	38	1536	$ 3,441.22
Phase 1	Hendon	Mattie	Spanish Camp	Fair	Asphalt	1249	18	2499	$ 5,597.02
Phase 1	Houston	Milam	Hawes	Good	Asphalt	797	30	2658	$ 5,953.86
Phase 1	Houston	Hawes	Alabama	Good	Asphalt	350	35	1361	$ 3,048.89
Phase 1	Houston	Alabama	Linn	Good	Asphalt	734	28	2283	$ 5,113.08
Phase 1	Houston	Elm	Burleson	Good	Asphalt	361	37	1482	$ 3,320.51
Phase 1	Houston	Burleson	Milam	Good	Asphalt	356	63	2489	$ 5,576.28
Phase 1	Hughes	Outlar	Ford	Fair	Asphalt	994	35	3866	$ 8,659.65
Phase 1	Kaiser	Caney	Spanish Camp	Poor	Asphalt	556	12	741	$ 5,137.20
Phase 1	Kearny	End (west)	End (east)	Good	Asphalt	539	15	899	$ 2,013.01
Phase 1	Lewis	Wilson	Hendon	Fair	Asphalt	349	12	466	$ 1,043.73
Phase 1	Martin Luther King	End (west)	Mattie	Fair	Asphalt	816	20	1813	$ 4,060.04
Phase 1	Martin Luther King	Mattie	Spanish Camp	Good	Asphalt	2111	25	5865	$ 13,137.16
Phase 1	Milam	Camelia	Width change	Poor	Asphalt	571	40	2539	$ 17,597.58
Phase 1	Milam	Width change	Outlar	Poor	Asphalt	801	15	1335	$ 9,250.42
Phase 1	Milam	Outlar	BU 59-R	Fair	Asphalt	2522	32	8968	$ 20,088.68
Phase 1	Milam	BU 59-R	Richmond	Fair	Asphalt	1224	35	4758	$ 10,658.18
Phase 1	Oak	Milam	Martin Luther King	Good	Asphalt	1391	15	2319	$ 5,194.63
Phase 1	Outlar	Camelia	Milam	Fair/Good	Asphalt	541	18	1081	$ 2,421.50
Phase 1	Outlar	Milam	Martin Luther King	Fair/Good	Asphalt	1431	37	5883	$ 13,178.21
Phase 1	Outlar	Martin Luther King	Connie	Fair	Asphalt	651	15	1085	$ 2,430.27
Phase 1	Pecan	Outlar	Form	Fair/Good	Asphalt	1392	18	2783	$ 6,234.62
Phase 1	Polk	Elm	Burleson	Fair	Asphalt	356	23	910	$ 2,038.00
Phase 1	Polk	Burleson	Caney	Fair	Asphalt	717	30	2389	$ 5,351.48
Phase 1	Polk	Caney	Alabama	Good	Asphalt	785	22	1920	$ 4,301.00
Phase 1	Sanders	Martin Luther King	Allen	Fair	Asphalt	800	12	1067	$ 2,390.48
Phase 1	Sheppard	City limits (south)	Burleson	Good	Asphalt	1232	20	2738	$ 6,133.13
Phase 1	Sheppard	Burleson	Milam	Good	Asphalt	359	17	679	$ 1,520.39

Phase 1	Sheppard	Milam	Spanish Camp	Good	Asphalt	904	24	2410	$ 5,399.51
Phase 1	Sims	Caney	Edwards	Poor	Concrete	270	10	300	$ 8,987.48
Phase 1	Wilkes	End (south)	End (north)	Fair	Asphalt	1860	20	4132	$ 9,256.27
Phase 1	Wilson	Branch	End	Poor	Asphalt	563	12	751	$ 5,205.93
Phase 1	Wilson	End (west)	Spanish Camp	Fair	Asphalt	460	15	767	$ 1,718.96
Subtotal						*57,135*		*142,698*	*$581,792.38*

2022-2024

Phase	Street	From	To	Condition	Material	Linear Feet	Current Width	Square Yards	Cost
Phase 2	1st	Richmond	Fulton	Good	Asphalt	860	22	2102	$ 4,708.12
Phase 2	3rd	Richmond	Rusk	Good	Asphalt	1207	20	2682	$ 6,008.59
Phase 2	3rd	Rusk	Pecan	Good	Asphalt	696	30	2321	$ 5,199.71
Phase 2	3rd	Pecan	End (east)	Poor	Asphalt	343	15	572	$ 3,965.73
Phase 2	Abell	Ahldag	Columbus	Fair/Good	Asphalt	2338	20	5195	$ 11,636.03
Phase 2	Alcalde	Park	Sunny	Good	Asphalt	131	20	290	$ 649.71
Phase 2	Armstrong	Richmond	Fulton	Good	Asphalt	855	26	2470	$ 5,532.79
Phase 2	Barclay	Ahldag	Fulton	Good	Asphalt	899	17	1697	$ 3,801.85
Phase 2	Belle	Richmond	Alabama	Fair/Good	Asphalt	4074	20	9053	$ 20,278.05
Phase 2	Bob-O-Link	Rusk	Pecan	Good	Asphalt	756	20	1680	$ 3,764.11
Phase 2	Bob-O-Link	Pecan	Sunny	Fair/Good	Asphalt	1610	15	2683	$ 6,009.46
Phase 2	Breezy	Pecan	Alabama	Fair/Good	Asphalt	2565	20	5700	$ 12,767.22
Phase 2	Carter	Boling	University	Fair	Asphalt	791	20	1758	$ 3,938.83
Phase 2	Carter	University	Frankie	Fair	Asphalt	550	18	1100	$ 2,464.05
Phase 2	Centennial	Fulton	Rusk	Good	Asphalt	356	16	633	$ 1,417.28
Phase 2	Columbus	Richmond	Fulton	Fair	Asphalt	844	16	1501	$ 3,362.29
Phase 2	Columbus	Abell	End (east)	Fair	Asphalt	494	20	1098	$ 2,459.79
Phase 2	Columbus	Texas	Lees	Fair	Asphalt	375	20	834	$ 1,867.16
Phase 2	Dahlgren	Richmond	Walnut	Fair	Asphalt	2166	20	4813	$ 10,781.55
Phase 2	Emily	Richmond	Texas	Fair/Good	Asphalt	3520	20	7821	$ 17,519.88
Phase 2	Evans	Richmond	Fulton	Fair	Asphalt	848	20	1884	$ 4,219.41
Phase 2	Foote	Mays	Evans	Fair	Asphalt	806	18	1612	$ 3,611.67

Phase 2	Frankie	School	Pioneer	Fair	Asphalt	1599	20	3554	$ 7,960.87
Phase 2	Fulton	Elm	Burleson	Fair	Asphalt	359	45	1797	$ 4,024.91
Phase 2	Fulton	Burleson	Milam	Good	Asphalt	356	63	2490	$ 5,577.46
Phase 2	Fulton	Milam	Caney	Good	Asphalt	361	37	1484	$ 3,324.41
Phase 2	Fulton	Caney	Alabama	Good	Asphalt	790	35	3072	$ 6,880.32
Phase 2	Fulton	Alabama	Centennial	Fair	Asphalt	3877	30	12923	$ 28,947.97
Phase 2	Fulton	Centennial	Boling	Good	Asphalt	463	30	1545	$ 3,459.88
Phase 2	Fulton	Ahldag	Gail	Good	Asphalt	3657	20	8127	$ 18,203.98
Phase 2	Gail	Richmond	Fulton	Good	Asphalt	847	20	1883	$ 4,217.26
Phase 2	Grayson	End (South)	Boling	Good	Asphalt	685	20	1521	$ 3,407.53
Phase 2	Harmanson	Richmond	Fulton	Fair	Asphalt	848	20	1885	$ 4,222.73
Phase 2	Helms	Carter	Pioneer	Good	Asphalt	1288	20	2862	$ 6,411.55
Phase 2	Horton Foote	Pioneer	Alabama	Good	Asphalt	996	20	2213	$ 4,956.77
Phase 2	Joan	Richmond	Fulton	Good	Asphalt	846	16	1505	$ 3,370.63
Phase 2	John Knox	Mocking Bird/Sunny	Bob-O-Link	Good	Asphalt	240	15	400	$ 895.60
Phase 2	John Knox	Bob-O-Link	Boling	Good	Asphalt	1211	22	2960	$ 6,631.45
Phase 2	Kelly	Fulton	Rusk	Fair	Asphalt	356	33	1306	$ 2,925.81
Phase 2	Lazy	Fulton	Rusk	Fair	Asphalt	356	20	791	$ 1,772.67
Phase 2	Lazy	Rusk	John Knox	Good	Asphalt	1643	16	2920	$ 6,541.32
Phase 2	Mays	Richmond	Foote	Good	Asphalt	376	20	837	$ 1,874.08
Phase 2	Mays	Foote	Mays	Good	Asphalt	473	18	945	$ 2,116.82
Phase 2	Mc Elroy	Richmond	Fulton	Good	Asphalt	847	22	2070	$ 4,637.44
Phase 2	Meadow	Alabama	Sunny	Good	Asphalt	1413	20	3139	$ 7,031.88
Phase 2	Merry	Breezy	Sunny	Fair	Asphalt	1098	16	1953	$ 4,374.02
Phase 2	Milburn	Rusk	Pecan	Fair	Asphalt	654	20	1453	$ 3,254.74
Phase 2	Mockingbird	Fulton	Rusk	Fair	Asphalt	356	27	1068	$ 2,391.74
Phase 2	Mockingbird	Rusk	Sunny	Good	Asphalt	1271	20	2825	$ 6,328.18
Phase 2	Moore	Milburn	Old Boling	Fair	Asphalt	659	20	1465	$ 3,281.11
Phase 2	Mulberry	Richmond	Fulton	Fair	Asphalt	845	16	1501	$ 3,363.05
Phase 2	Mulberry	Walnut	Lees	Good	Asphalt	1898	20	4217	$ 9,445.52
Phase 2	Newton	End (south)	Ahldag	Fair	Asphalt	683	20	1517	$ 3,398.38
Phase 2	Old Boling	Rusk	Alabama	Good	Asphalt	2961	20	6579	$ 14,737.15

Phase 2	Olive	Santa Fe	Breezy	Poor	Asphalt	434	22	1061	$ 7,355.56
Phase 2	Oriole	Breezy	Sunny	Good	Asphalt	1326	20	2946	$ 6,599.96
Phase 2	Park	Meadow	Oriole	Fair	Asphalt	773	12	1030	$ 2,308.15
Phase 2	Park	Breezy	Meadow	Good	Asphalt	1047	20	2327	$ 5,212.07
Phase 2	Pecan	Santa Fe	Mockingbird	Good	Asphalt	1121	25	3114	$ 6,974.30
Phase 2	Pecan	Mockingbird	Lazy	Fair	Asphalt	637	20	1415	$ 3,170.00
Phase 2	Pioneer	Boling	Ahldag	Good	Asphalt	2103	37	8647	$ 19,369.35
Phase 2	Reed	Railroad	Richmond	Fair	Asphalt	1217	20	2705	$ 6,058.38
Phase 2	Rusk	Centennial	Boling	Good	Asphalt	482	20	1070	$ 2,396.92
Phase 2	Rusk	Belle	Wayside	Good	Asphalt	360	20	801	$ 1,793.94
Phase 2	Rusk	Wayside	Emily	Fair	Asphalt	362	20	804	$ 1,801.92
Phase 2	Rusk	Santa Fe	3rd	Good	Asphalt	154	33	565	$ 1,265.11
Phase 2	Rusk	3rd	Mockingbird	Poor	Concrete	992	37	4077	$ 122,321.81
Phase 2	Rusk	Mockingbird	Milburn	Good	Asphalt	804	20	1787	$ 4,002.48
Phase 2	Rusk	Milburn	Centennial	Fair	Asphalt	310	20	689	$ 1,543.47
Phase 2	Speed	Wayside	Columbus	Good	Asphalt	1090	20	2422	$ 5,424.57
Phase 2	Sunny	Breezy	Alabama	Fair/Good	Asphalt	2906	20	6457	$ 14,463.12
Phase 2	Sunset	End (west)	Richmond	Fair	Asphalt	752	15	1253	$ 2,806.30
Phase 2	Tennie	End (west)	Carter	Fair	Asphalt	325	20	722	$ 1,617.81
Phase 2	Texas	Belle	Columbus	Good	Asphalt	1456	20	3236	$ 7,248.99
Phase 2	University	Fulton	Pioneer	Fair/Good	Asphalt	2300	20	5112	$ 11,450.74
Phase 2	Walnut	Ahldag	Pleasure Park	Good	Asphalt	2184	20	4854	$ 10,872.00
Phase 2	Wayside	Richmond	Alabama/Lees	Fair/Good	Asphalt	4071	20	9046	$ 20,263.27
Phase 2	Pioneer	Boling	Ahldag	Good	Asphalt	2103	37	8647	$ 19,369.35
Phase 2	Reed	Railroad	Richmond	Fair	Asphalt	1217	20	2705	$ 6,058.38
Phase 2	Rusk	Centennial	Boling	Good	Asphalt	482	20	1070	$ 2,396.92
Phase 2	Rusk	Belle	Wayside	Good	Asphalt	360	20	801	$ 1,793.94
Phase 2	Rusk	Wayside	Emily	Fair	Asphalt	362	20	804	$ 1,801.92
Phase 2	Rusk	Santa Fe	3rd	Good	Asphalt	154	33	565	$ 1,265.11
Phase 2	Rusk	3rd	Mockingbird	Poor	Concrete	992	37	4077	$ 122,321.81
Phase 2	Rusk	Mockingbird	Milburn	Good	Asphalt	804	20	1787	$ 4,002.48
Phase 2	Rusk	Milburn	Centennial	Fair	Asphalt	310	20	689	$ 1,543.47
Phase 2	Speed	Wayside	Columbus	Good	Asphalt	1090	20	2422	$ 5,424.57

Phase 2	Sunny	Breezy	Alabama	Fair/Good	Asphalt	2906	20	6457	$ 14,463.12
Phase 2	Sunset	End (west)	Richmond	Fair	Asphalt	752	15	1253	$ 2,806.30
Phase 2	Tennie	End (west)	Carter	Fair	Asphalt	325	20	722	$ 1,617.81
Phase 2	Texas	Belle	Columbus	Good	Asphalt	1456	20	3236	$ 7,248.99
Phase 2	University	Fulton	Pioneer	Fair/Good	Asphalt	2300	20	5112	$ 11,450.74
Phase 2	Walnut	Ahldag	Pleasure Park	Good	Asphalt	2184	20	4854	$ 10,872.00
Phase 2	Wayside	Richmond	Alabama/Lees	Fair/Good	Asphalt	4071	20	9046	$ 20,263.27
Subtotal						*88,600*		*210,447*	*$592,250.70*

2024-2026

Phase	Street	From	To	Condition	Material	Linear Feet	Current Width	Square Yards	Cost
Phase 3	Abell	Center	Santa Fe	Good	Asphalt	952	21	2222	$ 4,977.45
Phase 3	Alabama	Boling	Milam	Good	Asphalt	7602	38	32096	$ 71,895.95
Phase 3	Alabama	Alabama-CR 166 Turn Off	CR 166	Good	Asphalt	295	20	657	$ 1,470.58
Phase 3	Alabama	Ahldag-CR 166 Turn Off		Good	Asphalt	117	22	285	$ 638.00
Phase 3	Avenue A	Olive	Alabama	Fair/Good	Asphalt	1586	15	2643	$ 5,921.27
Phase 3	Avenue B	Pecan	Walnut	Poor	Asphalt	362	12	482	$ 3,343.28
Phase 3	Avenue C	Speed	Alabama	Fair	Asphalt	893	18	1786	$ 3,999.72
Phase 3	Barfield	Alabama	Stadium	Good	Asphalt	2417	20	5372	$ 12,032.80
Phase 3	Boling Green	All	All	Fair	Asphalt	2343	15	3904	$ 8,745.39
Phase 3	Cargill	Abell	Koehl	Fair	Asphalt	700	20	1556	$ 3,484.53
Phase 3	Cargill	Koehl	Texas	Good	Asphalt	350	20	778	$ 1,742.27
Phase 3	Cargill	Texas	Alabama	Good	Asphalt	185	14	287	$ 643.85
Phase 3	Center	Walnut	Alabama	Fair/Good	Asphalt	1944	17	3673	$ 8,227.05
Phase 3	Chapel Heights	Hodges	Price	Fair	Asphalt	830	38	3504	$ 7,849.69
Phase 3	Circle	All	All	Fair	Asphalt	2233	20	4961	$ 11,112.96
Phase 3	Cline	CR 154 / Old Caney	End (east)	Fair	Asphalt	1318	20	2930	$ 6,562.65
Phase 3	Cottonwood	Price	Willow Bend	Poor	Asphalt	537	34	2028	$ 14,053.07

Phase 3	Country Club	FM 3012	End (north)	Good	Asphalt	632	18	1264	$ 2,832.43
Phase 3	County Road 154 / Old Caney	FM 3012	Cutbirth	Good	Asphalt	2738	20	6084	$ 13,627.62
Phase 3	Cresmount	Alabama	Hodges	Fair/Good	Asphalt	2636	34	9956	$ 22,302.41
Phase 3	Croom	FM 3012	End (north-east)	Fair	Asphalt	2018	20	4484	$ 10,044.52
Phase 3	Cutbirth	FM 3012	City Limits	Good	Asphalt	1034	15	1723	$ 3,858.42
Phase 3	Delmas	Milam	Kincaid	Fair/Good	Asphalt	1809	20	4019	$ 9,003.05
Phase 3	Fairway	CR 154 / Old Caney	End (east)	Fair	Asphalt	1360	34	5139	$ 11,512.43
Phase 3	Franklin	End (south)	Nelga	Fair	Asphalt	533	16	948	$ 2,122.93
Phase 3	Franklin	Willow Bend	Kelving	Fair	Asphalt	328	28	1021	$ 2,286.49
Phase 3	Glen Haven	Briar	Kelving	Fair	Asphalt	660	27	1980	$ 4,435.20
Phase 3	Greenbriar	FM 1301	End (north)	Fair/Good	Asphalt	1008	16	1792	$ 4,014.39
Phase 3	Hawes	SH 60	City Limits	Good	Asphalt	1027	20	2281	$ 5,110.47
Phase 3	Hodges	Alabama	Kincaid	Fair	Asphalt	1156	21	2697	$ 6,041.58
Phase 3	Hollis	Olive	Delmas	Good	Asphalt	458	20	1017	$ 2,278.20
Phase 3	Kelving	Alabama	Hodges	Fair	Asphalt	2756	34	10412	$ 23,323.76
Phase 3	Kincaid	Milam	Hodges	Good	Asphalt	1826	20	4058	$ 9,089.31
Phase 3	Koehl	Alabama	Santa Fe	Good	Asphalt	1654	20	3675	$ 8,232.23
Phase 3	La Delle	Alabama	End (east)	Good	Asphalt	1426	35	5544	$ 12,419.48
Phase 3	Lakeshore	All	All	Fair	Asphalt	3004	15	5007	$ 11,216.29
Phase 3	Lees	Ahldag	City Limits	Good	Asphalt	1455	25	4042	$ 9,054.28
Phase 3	Lily	Park	Width Change	Fair	Asphalt	609	20	1353	$ 3,031.56
Phase 3	Lily	Width Change	End (north)	Fair	Asphalt	1102	33	4042	$ 9,054.13
Phase 3	Linwood	Width Change	Briar	Fair	Asphalt	532	24	1419	$ 3,179.67
Phase 3	Linwood	End (south)	Width Change	Fair	Asphalt	436	35	1694	$ 3,794.31
Phase 3	Linwood	End (south-east)	Hodges	Fair	Asphalt	534	34	2016	$ 4,516.28
Phase 3	Mahan	Milam	Hodges	Fair	Asphalt	1669	22	4079	$ 9,136.45
Phase 3	Morningside	Lakeshore	End (north)	Fair	Asphalt	322	16	573	$ 1,283.71
Phase 3	Nelga	End (west)	Stavena	Fair	Asphalt	1026	18	2053	$ 4,597.74

Phase 3	Nelga	Stavena	End (east)	Fair	Asphalt	435	16	774	$ 1,733.81
Phase 3	Oakcrest	End (south-east)	Cremount	Poor	Asphalt	737	28	2292	$ 15,885.91
Phase 3	Olive	Alabama	Avenue A	Good	Asphalt	1305	15	2174	$ 4,870.54
Phase 3	Olive	Avenue A	Santa Fe	Poor	Concrete	350	25	972	$ 29,167.98
Phase 3	Oliver	Kincaid	Delmas	Fair	Asphalt	748	20	1661	$ 3,721.41
Phase 3	Park	Croom	Width Change	Fair	Asphalt	694	20	1542	$ 3,454.17
Phase 3	Park	Width Change	Circle	Fair	Asphalt	206	26	596	$ 1,334.82
Phase 3	Price	Price	Price	Fair	Asphalt	697	28	2169	$ 4,857.74
Phase 3	Price	Price	Sycamore	Fair	Asphalt	666	20	1480	$ 3,314.31
Phase 3	Price	Sycamore	Lily	Fair	Asphalt	548	33	2010	$ 4,502.07
Phase 3	Price	Price	Hodges	Good	Asphalt	726	22	1776	$ 3,977.31
Phase 3	Quail Hollow	Oakcrest	Cresmount	Poor	Asphalt	215	28	668	$ 4,625.98
Phase 3	Resident	2nd	Santa Fe	Good	Asphalt	224	18	448	$ 1,004.10
Phase 3	Santa Fe	Fulton	Alabama	Fair/Good	Asphalt	3358	20	7463	$ 16,717.11
Phase 3	Shirley	Alabama	Mahan	Poor	Asphalt	704	15	1174	$ 8,134.45
Phase 3	Speed	Alabama	Santa Fe	Good	Asphalt	1656	24	4415	$ 9,889.69
Phase 3	Stadium	Boling	Barfield	Fair	Asphalt	1477	20	3282	$ 7,351.98
Phase 3	Stavena	End (south)	FM 3012	Fair	Asphalt	1379	20	3064	$ 6,863.56
Phase 3	Sunny	Alabama	End (east)	Good	Asphalt	820	37	3372	$ 7,552.69
Phase 3	Sycamore	Lily	Width Change	Fair	Asphalt	176	20	392	$ 878.12
Phase 3	Sycamore	Width Change	Price	Fair	Asphalt	480	33	1762	$ 3,946.45
Phase 3	Texas	Alabama	Santa Fe	Fair	Asphalt	1608	15	2679	$ 6,001.82
Phase 3	Walnut	Milam	Davis	Fair	Asphalt	732	20	1627	$ 3,644.38
Phase 3	Walnut	Davis	Alabama	Fair	Asphalt	390	18	779	$ 1,745.84
Phase 3	Walnut	Alabama	Avenue A	Good	Asphalt	1303	18	2606	$ 5,837.33
Phase 3	Walnut	Avenue A	Santa Fe	Fair	Asphalt	350	18	700	$ 1,568.07
Phase 3	West	Croom	Width Change	Fair	Asphalt	306	50	1702	$ 3,813.17
Phase 3	West	Width Change	Circle	Fair	Asphalt	295	20	656	$ 1,469.29
Phase 3	Weston	Hodges	Shirley	Poor	Asphalt	325	15	542	$ 3,757.40
Phase 3	Willow Bend	Hodges	Cottonwood	Poor	Asphalt	859	34	3246	$ 22,497.26
Phase 3	Woodvine	Linwood	Briar	Fair	Asphalt	276	33	1013	$ 2,269.47

Subtotal						*84,457*		*222,576*	*$574,488.06*
2027-2028									
Phase	**Street**	**From**	**To**	**Condition**	**Material**	**Linear Feet**	**Current Width**	**Square Yards**	**Cost**
Phase 4	Alabama	Fulton	Alabama	Fair/Good	Asphalt	3,385	31	11658	$ 26,114.42
Phase 4	Bolton	Sunset	Richmond	Good	Asphalt	883	17	1668	$ 3,737.18
Phase 4	Brenek	Rugeley	Nelson	Fair	Asphalt	357	24	952	$ 2,131.47
Phase 4	Burleson	Richmond	Resident	Fair	Asphalt	1,715	33	6287	$ 14,083.42
Phase 4	Burleson	Sunset	Cloud	Poor	Asphalt	439	32	1561	$ 10,820.36
Phase 4	Burleson	Cloud	Poor	Fair	Asphalt	409	32	1455	$ 3,259.77
Phase 4	Burleson	Poor	Richmond	Poor	Asphalt	372	32	1323	$ 9,171.07
Phase 4	Caney	Sunset	College	Fair	Asphalt	643	18	1286	$ 2,880.53
Phase 4	Caney	Sunset	Richmond	Poor	Asphalt	1,102	33	4040	$ 27,994.24
Phase 4	Caney	Richmond	Resident	Fair	Asphalt	1,719	22	4203	$ 9,414.42
Phase 4	Caney	Resident	Dennis	Fair	Asphalt	355	33	1303	$ 2,919.84
Phase 4	Caney	Dennis	Walnut	Poor	Asphalt	353	33	1293	$ 8,963.39
Phase 4	Caney	Walnut	East	Fair	Asphalt	577	26	1666	$ 3,732.50
Phase 4	Caney	East	Alabama	Good	Asphalt	1,383	20	3074	$ 6,885.97
Phase 4	Carolyn	FM 1299	Alabama	Fair	Asphalt	1,474	32	5241	$ 11,740.52
Phase 4	College	FM 102	Caney	Fair	Asphalt	729	18	1458	$ 3,264.82
Phase 4	Collins	End (west)	FM 1299	Fair	Asphalt	562	40	2496	$ 5,591.94
Phase 4	Correll	Carolyn	Milam	Fair	Asphalt	2227	18	4454	$ 9,977.82
Phase 4	County Road 231 / Wilke	Hendon	City Limits	Good	Asphalt	254	20	565	$ 1,264.73
Phase 4	David	FM 1299	Moutray	Fair	Asphalt	944	30	3146	$ 7,047.01
Phase 4	Davis	Resident	East	Fair	Asphalt	1285	15	2142	$ 4,799.11
Phase 4	Debbie	Davis	Alabama	Fair	Asphalt	384	12	512	$ 1,147.09
Phase 4	Dennis	End (south)	Milam	Poor	Asphalt	128	25	356	$ 2,469.02
Phase 4	Dennis	Milam	Caney	Good	Asphalt	359	28	1118	$ 2,503.82
Phase 4	Dennis	Caney	Hawes	Fair	Asphalt	374	21	872	$ 1,954.25
Phase 4	Dunraven	Wisteria	Kingston	Good	Asphalt	711	20	1579	$ 3,537.29

Phase 4	East	Milam	Caney	Fair	Asphalt	356	20	792	$ 1,774.37
Phase 4	East	Caney	Davis	Fair	Asphalt	374	33	1371	$ 3,071.68
Phase 4	East	Davis	Alabama	Fair	Asphalt	377	25	1048	$ 2,347.37
Phase 4	Grove	Milam	Alabama	Good	Asphalt	1072	21	2502	$ 5,605.51
Phase 4	Hamilton	Caney	Bolton	Fair	Asphalt	1013	17	1913	$ 4,284.18
Phase 4	Harrison	End (south)	FM 102	Fair	Gravel	2024	18	4047	$ 121,423.16
Phase 4	Hospital Medical	Regional Medical	End (north)	Good	Asphalt	1051	20	2336	$ 5,233.08
Phase 4	Jefferson	Elm	End (north)	Fair	Asphalt	164	18	328	$ 734.12
Phase 4	Jefferson	FM 1299	Moutray	Fair	Asphalt	1002	18	2004	$ 4,488.56
Phase 4	Jefferson	Moutray	Milam	Fair	Asphalt	227	30	756	$ 1,694.44
Phase 4	Kingston	Alabama	End (east)	Good	Asphalt	2347	22	5737	$ 12,850.29
Phase 4	Lincoln	Carolyn	Jefferson	Fair	Asphalt	1813	18	3626	$ 8,121.20
Phase 4	Lucky	Alabama	Bolton	Good	Asphalt	329	33	1207	$ 2,703.10
Phase 4	Maple	FM 1299	Alabama	Fair	Asphalt	1440	30	4800	$ 10,752.18
Phase 4	Moutray	Carolyn	Milam	Fair	Asphalt	2060	30	6865	$ 15,377.80
Phase 4	Murphy	End (south)	Collins	Good	Asphalt	325	20	723	$ 1,619.99
Phase 4	Nelson	Spanish Camp	FM 102	Good	Asphalt	2517	25	6993	$ 15,663.47
Phase 4	Regional Medical	FM 102	US 59 Frontage	Good	Asphalt	2034	20	4520	$ 10,124.80
Phase 4	Resident	Elm	Milam	Fair/Good	Asphalt	711	33	2606	$ 5,838.19
Phase 4	Rugeley	Brenek	Stafford	Fair	Asphalt	600	20	1333	$ 2,986.36
Phase 4	Rusk	Elm	Burleson	Good	Asphalt	356	18	711	$ 1,592.86
Phase 4	Rusk	Burleson	Caney	Fair	Asphalt	744	27	2233	$ 5,001.29
Phase 4	Salisbury	Wisteria	Kingston	Good	Asphalt	711	21	1660	$ 3,718.32
Phase 4	Sara Ann	Wisteria	Kingston	Good	Asphalt	709	21	1655	$ 3,708.12
Phase 4	Sorrell	Sunset	Richmond	Poor	Asphalt	939	22	2294	$ 15,899.51
Phase 4	Spanish Camp	FM 102	Sunset	Good	Asphalt	4386	21	10234	$ 22,923.34
Phase 4	Stafford	Rugeley	Nelson	Poor	Asphalt	275	21	641	$ 4,444.67
Phase 4	Sunset	Burleson	Milam	Poor	Asphalt	360	30	1200	$ 8,316.17
Phase 4	Sunset	Milam	Spanish Camp	Fair	Asphalt	747	32	2655	$ 5,947.85
Phase 4	Sunset	Spanish Camp	Bolton	Fair	Asphalt	705	20	1568	$ 3,511.56
Phase 4	Sunset	Bolton	Sorrell	Good	Asphalt	933	20	2074	$ 4,644.81
Phase 4	Sunset	Sorrell	FM 102	Fair	Asphalt	919	20	2043	$ 4,575.97

Phase 4	Sunset	FM 102	End (north)	Fair	Asphalt	817	18	1634	$ 3,659.29
Phase 4	Washington	Carolyn	Maple	Good	Asphalt	991	20	2203	$ 4,934.19
Phase 4	Washington	Maple	Jefferson	Fair	Asphalt	454	18	908	$ 2,034.37
Phase 4	Wells	Sorrell	End (north)	Fair	Gravel	416	12	555	$ 16,653.24
Phase 4	Wells	FM 102	Caney	Fair	Asphalt	729	18	1457	$ 3,264.71
Phase 4	Westgate	Alabama	Salisbury	Good	Asphalt	1871	21	4365	$ 9,776.65
Phase 4	Wisteria	Alabama	End (east)	Good	Asphalt	2277	20	5061	$ 11,336.83
Phase 4	Washington	Carolyn	Maple	Good	Asphalt	2227	20	2203	$ 4,934.19
Phase 4	Washington	Maple	Jefferson	Fair	Asphalt	254	18	908	$ 2,034.37
Phase 4	Wells	Sorrell	End (north)	Fair	Gravel	944	12	555	$ 16,653.24
Phase 4	Wells	FM 102	Caney	Fair	Asphalt	1285	18	1457	$ 3,264.71
Phase 4	Westgate	Alabama	Salisbury	Good	Asphalt	384	21	4365	$ 9,776.65
Phase 4	Wisteria	Alabama	End (east)	Good	Asphalt	128	20	5061	$ 11,336.83
Subtotal						*64,300*		*166,370*	*$560,043.56*
Total 2018-2028						*294,492*		*742,090*	*$2,308,575*

9 THOROUGHFARES STUDY

The Thoroughfares Study analyzes the community's ability to safely and efficiently move people and goods. After assessing the city's traffic volumes and major traffic generators, its road widths, traffic control systems and parking and truck regulations, the study provides suggestions for improvements that can be incorporated into the community's future development plans. A good thoroughfare plan considers not only the ability of the system's infrastructure to move vehicles, but also the relationship between street construction, land development, and quality of life. The result should be a pleasing and efficient transportation system for both residents and visitors.

9.1 Highlights

State roads form the majority of Wharton's thoroughfare system. At Wharton's current level of development, the major roads have enough capacity and are located at generally appropriate intervals to move residents from home to work to shopping areas and to move business vehicles in and out of the city. In central Wharton, traffic capacity is managed throuth local streets laid out in a grid pattern in the original town plat. The grid system disperses traffic through neighborhoods, which gives drivers many options for travel to their destination, reduces road wear, and limits congestion. However, development outside of the central Wharton is less internally connected and less connected to the city center, necessitating indirect routes to reach key destinations like schools and the Central Business District. A continuation of that development pattern will lead to increased congestion and limit the amount of development that can occur. The inflexibility that results from dependence on the few thoroughfares could also decrease safety during disasters.

Wharton's thoroughfare system is supported by a sidewalk network concentrated in central Wharton. Sidewalk conditions vary and some areas are so deteriorated as to significantly limit use. There are no bike lanes in Wharton. Additional multimodal improvements like sidewalks, crosswalks, medians, and bike lanes would make it easier for pedestrians and bicyclists to travel through the city and help offset traffic congestion as Wharton grows.

To ensure that traffic can circulate easily throughout the planning period, the City should do the following:

- Pursue build-out of the grid system in existing neighborhoods/areas;
- revise the City's subdivision ordinance to meet standards designated in this plan regarding subdivision connectivity, block length, and multimodal infrastructure;
- repave deteriorated portions of the existing sidewalk network; and
- communicate with the Wharton TxDOT office regarding the need for more pedestrian and bicycle infrastructure on Boling/FM 1301, Richmond Rd/BUS 59, and Milam/SH60.

Table 9A: Ranked Problems Relating to Thoroughfares

	Thoroughfare System Problems
1.	Congestion on FM 102 (at US 59 and Richmond Rd) and Alabama Road (at FM 1301)
2.	Limited interconnections between central Wharton and other areas, especially west Wharton
3.	Insufficient pedestrian and bicycle infrastructure
4.	Subdivision Ordinance allows blocks up to 1,400 feet in length

9.2 Context: History & Community Input

Previous Studies

The City of Wharton adopted a Master Transportation Plan in the form of a map in 2009. The map was last updated in July 2014. The updated plan/map illustrates improvement projects related to the conversion of US 59 into a rural freeway was part of the Texas portion of the Interstate 69 (I-69) project (further discussed in next section). The map/plan also illustratrates improvement projects for other key arterials primarily within the City of Wharton corporate limits and extraterritorial jursidction.

Tables 9B and *9C (next page)* list the planned improvements and *Figure 9A (page – 9-4)* showsthe location of each improvement as specified in the 2014 plan, except that improvement #19 has been revised to reflect route changes currently under consideration by the City of Wharton.

Table 9B: I-69 Improvements

1	Pierce overpass and ramps
2	Airport overpass, ramps, and airport road realignment
3	BUS 59 South overpass ramps and FM 951 realignment
4	Pierce Ranch overpass and ramps
5	FM 102 interchange improvements within the existing right-of-way
6	FM 1301 overpass, ramps, and frontage roads
7	Halford Road overpass, ramps, frontage roads, and Halford Road realignment
8	Hwy 60 interchange improvements, ramps, and frontage roads
9	Ponderosa Road overpass, ramps, and frontage roads
10	FM 1161 overpass, ramps, and frontage roads
11	BUS 59 North overpass and rates

Table 9C: City of Wharton Improvements

12	Extension of FM 1301 to US 59 extending to County Road 235 (Owens Road): Rerouting FM 102 from approximately Spanish Camp Road intersection to Richmond Road/FM 1301 intersection, including the construction of an overpass over the Kansas City Southern Railroad Line: Development of US Hwy 59 north bound side service road from Super 8 Motel to FM 1301 intersection on the ramp
13	Curb and gutter from FM 3012 (Old Land City Road) from SH 60 to city limits
14	Widen FM 1301 to a three-lane road with a continuous turn lane from a point east of its intersection with the Alabama Road/Jr. College Blvd. to the Wharton Independent School District new school property at the farthest point
15	Widen Richmond Road to five lanes from Joan Street to Jane Street and to realign Halford Road for a perpendicular intersection at US 59
16	East loop around city from SH 60 to FM 1301
17	East loop around city from SH 60 to US 59 North
18	Widen with curb and gutter along east Milam from Moutrey Street to city limits
19	Routing of SH 60 through the Santa Fe Railroad Right-of-Way to FM 102 and on to Hwy 59.
20	FM 1301 extension from CR 235 (Owens Road) to FM 102

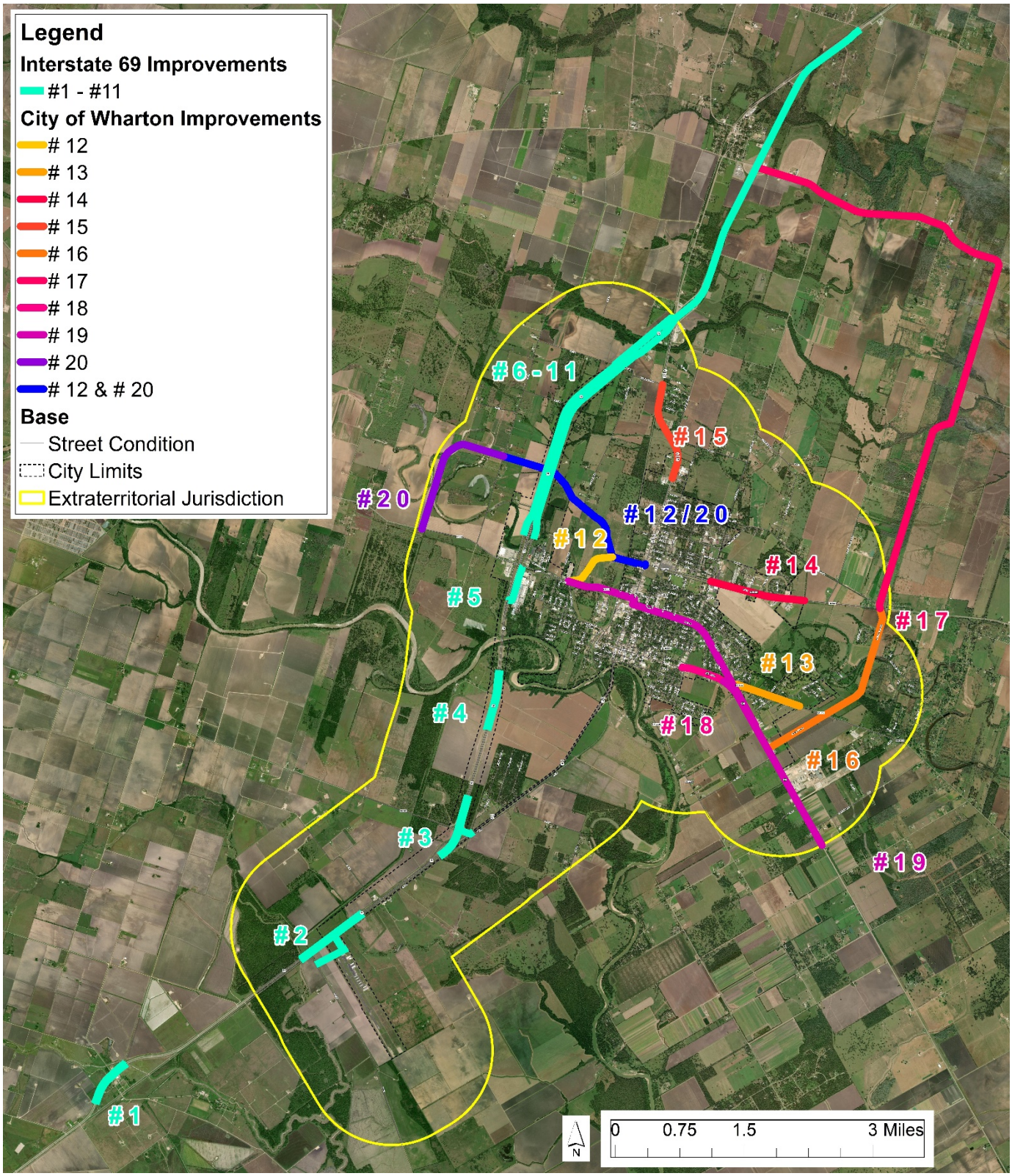


Figure 9A: 2014 Master Transportation Plan

Regional Transportation Projects

The Texas Department of Transportation (TxDOT) has several projects active, under development, or planned in the Wharton area. The largest project under development and in long term planning is the conversion of US 59 into a rural freeway as part of the Texas portion of the Interstate 69 (I-69) project. The I-69 project will connect currently disjointed sections of the interstate to form a 1,600-mile national highway that will connect Michigan, Indiana, Kentucky, Tennessee, Mississippi, Arkansas, Louisiana, and Texas. A portion of US 59/future I-69 runs through Wharton and is located within its city limits. Construction of the area proximate to Wharton is anticipated to start within the next 5 to 10 years.

Other TxDOT projects in the Wharton area include:

- BU 59-R: Reconstruct bridge and seal coat just over two miles (underway or begins soon)
- FM 102: Add safety lighting from US 59 to Matte St (underway); Construct two additional lanes to make FM 102 into a four-lane road from CR 235 to SH 60 (construction to begin in 5 to 10 years)
- FM 3102: Safety treat fixed objects (underway or begins soon)
- SH 60: Mill and overlays (construction within 4 years)

Community Input

Residents have expressed the following desires related to the City's thoroughfare system:

- Make Wharton a "walkable city"; construct more sidewalks
- Improve connectivity (e.g. moving about the city & to Riverfront, as well as thoroughfare connectivity)
- Address too narrow roadways
- Preserve thoroughfares
- Preserve trees and sidewalks on FM 102 from Richmond Rd to Highway 59
- Add traffic signals (Mattie Street/Spanish Camp)
- Eliminate heavy traffic especially on FM 102 & because of train crossing

Early transportation planning focused on moving the maximum number of vehicles at the maximum speed and reflected the belief that all traffic congestion can be solved by newer, wider roads. Beginning in the 1990's, transportation engineers realized that new construction could not stay ahead of car use and that the financial cost of road and highway expansion was unsustainable. They also began to recognize the social costs of land use patterns that require car use: isolation of the youth and elderly unable to drive or walk from their neighborhoods and dispersal of residents from the central city. As travel became restricted to those who could drive, and as families moved out of central cities, local businesses and community activities suffered. As a result of these findings, the Institute of Transportation Engineers in cooperation with the Federal Highway Administration, the Environmental Protection Agency, and the Congress for New Urbanism worked together to incorporate alternative transportation solutions into national design standards. In 2006, the ITE's Context Sensitive Solutions in Designing Major Urban Thoroughfares for Walkable Communities (the CSS manual) was released.[50] Texas was the first state to formally adopt the CSS manual in department of transportation project design and review processes. The new guidelines are considered throughout this study to ensure that the City of Wharton plans for accessibility by all methods and all populations.

9.3 Inventory & Existing Conditions

In summer 2017, an inventory was conducted of Wharton's thoroughfare system to identify and classify the city's major thoroughfares. The inventory included TxDOT traffic counts (2016); local traffic generators;[51] traffic control data; parking restrictions, pavement types and width; traffic speeds; infrastructure for pedestrian use and safety; and truck routes.

Designation & Classification of Thoroughfares

Wharton's thoroughfares are identified and located on *Map 9A: Existing Thoroughfare System* and shown in *Figure 9B (below)*. The thoroughfares are classified based on TxDOT's adopted standards (described in *Appendix 9B)* and on factors such as traffic generators, 2016 TxDOT traffic counts (the most recent available for Wharton), and a field survey of roadway width and right-of-way. The city's thoroughfare system provides residents and employers with routes from home to employment and businesses. For the most part, traffic generators which create the highest number of trips at various peak periods during the day are located on or near thoroughfares that can move heavier traffic volumes to local destinations. Hodges Street is a local street but serves a major traffic generator (Briar Pointe Apartments) and is therefore included in the thoroughfare inventory.

[50] A free copy of the CSS manual can be found at https://www.epa.gov/sites/production/files/2015-11/documents/rp036.pdf
[51] A "traffic generator" or "trip generator" is any piece of land that creates traffic by causing people to travel to the location. Trip generators that cause the most trips (generate the most traffic) typically include businesses, apartments, and schools.

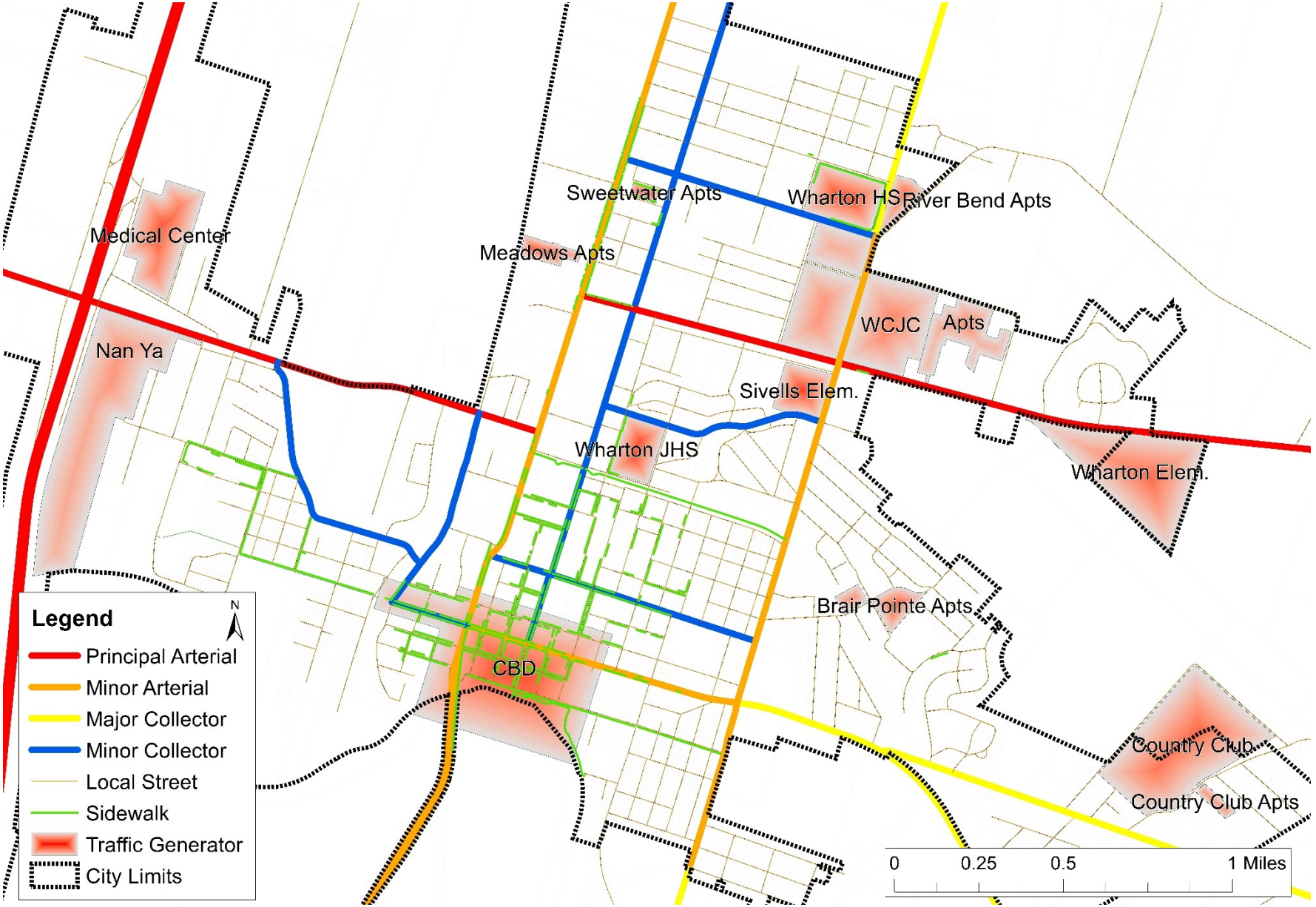


Figure 9B: Thoroughfares in Wharton

Table 9D: Functional Classifications

Road	Peak Traffic Counts	Number of Lanes	Width*	ROW	City Speed Limit	Traffic Generator	Sidewalks
Principal Arterial							
US 59	28,374	4	42	266-464	75	Medical Center; Nana Ya	None
Boling (FM1301)	17,165	3-5	40-63	40-101	35-50	Wharton Elementary; Apartment cluster; WCJC; Sivells Elementary	Small portion
FM 102	15,341	3	42-90	60-100	35-50	Nan Ya; Medical Center	None
Minor Arterial							
N Alabama	N/A	3-4	38	60-103	20-35	Sivells Elementary; WCJC; Wharton HS; River Bend Apts.	None
Richmond (BU 59-R)	12,542	2-5	26-83	43-233	30-55	CBD; Meadows Apts.; Sweetwater Apts.	Some
Milam (SH 60)	8,300	2	35-63	56-100	30	CBD	Most
Major Collectors							
FM 1299	3,047	2	28-38	100	40-60	N/A	None
FM 3012	3,709	2	27-35	75-100	35	Country Club Apts.; Wharton Country Club	None
CR 135/Lees	N/A	2	20-25	50-100	20-30	N/A	Small Portion
SH 60	4,702	2	47	100	35-45	N/A	None
Minor Collector							
N Sunset	N/A	1	20-32	50-60	30	CBD	Small portion
W Milam St	N/A	2	35	60	30	CBD	Yes
W Alabama	N/A	2	31	50-60	20-30	N/A	Most
Fulton	N/A	2	20-37	50-80	20-30	CBD;	Some
Mockingbird / Sunny	N/A	2	20-27	50	20-30	Wharton JHS; Sivells Elementary	None
Ahldag	N/A	2	22-30	54-70	20-30	Wharton HS; River Bend Apts.	Small portion
Brooks	N/A	1	20-22	60	-	N/A	None
Local							
Hodges	N/A		21-38	50-61	30	Briar Pointe Apartments	

*Width is for drive lanes; shoulders are not included *Source: GrantWorks Field Survey; TxDOT (Peak Traffic Counts) at www.dot.state.tx.us/apps*

Origin & Destination / Trip Generators

Wharton has several major traffic generators, which cause traffic congestion on some of Wharton's streets at both predictable and irregular times of the day and week. Wharton's major trip generators and destinations are identified in *Table 9E: Major Traffic Generators* and are illustrated on *Map 9A: Existing Thoroughfare System*. The methodology of trip generation calculations is explained in *Appendix 9A*.

Table 9E: Major Traffic Generators

Site	Units	Unit Type	Trip Rate Basis	Streets Effected	Avg. Daily Traffic
Central Business District *(nonresidential)* *(storage buildings excluded)*	422,773	KSF	11.08	Milam; Fulton; Richmond; Sunset	4,684
Wharton Apt Cluster *(Red River, Mill Creek, Wharton Plaza, Wharton Square, Morning Star)*	312	DU	6.65	FM 1301/Boiling	2,075
Briar Pointe Apts.	256	DU	6.65	Hodges	1,702
River Bend Apts.	104	DU	6.65	Alabama	692
Meadows Apts.	82	DU	6.65	Richmond	545
Sweetwater Apts.	56	DU	6.65	Fulton; Richmond	372
Country Club Apts.	50	DU	6.65	FM 3012	333
Wharton Co. Jr. College (WCJC)	1,400	Students	1.23	Boiling; Alabama	1,722
Wharton H.S.	607	Students	1.71	Alabama; Ahldag	1,038
Wharton Elementary	724	Students	1.29	FM 1301	934
Wharton Jr. H.S.	293	Students	1.62	Mockingbird/Sunny; Rusk; Pecan	475
Sivells Elementary	577	Students	1.29	Alabama;	744
Medical Center	1,379,299	KSF	13.22	US 59; FM 102	18,234
Nan Ya	3,706,113	KSF	1.5	US 59; FM 102	5,559
Wharton Country Club	71.1	Acres	90	FM 3012	6,399

Source: GrantWorks Field Survey, 2017, including facility size (approximate from building footprint); Institute of Transportation Engineers, 8th edition Trip Generation Report; School size from 2016-2017 TEA AEIS School Campus Reports

Curb & Gutter

Curb and gutter can be the most effective way to capture and direct run off during heavy rainfall and prevent deterioration at the edges of street pavement; however, it is very expensive to construct. The City maintains local streets with drainage ditches and culverts. TxDOT maintains approximately 173,089 linear feet of curb and gutter along FM 1301 (Boling), SH 60 (Milam), BU 59-R (Richmond), and FM 102. Drainage infrastructure is discussed in more detail in *Chapter 7: Storm Drainage System Study.*

Traffic Control System

Traffic is controlled by traffic lights, stop signs, yield signs and restrictions on parking. Wharton's traffic control infrastructure functions well and is in scale with the city size.

- Traffic Lights. The City has eight four-way traffic lights located at the following intersections: Milam and Resident; Milam and Richmond; Burleson and Richmond; Caney and Richmond; Richmond and Boling; Boling and Fulton; Boling and N Alabama; N Alabama and Milam; FM 102 and US 59. If the City decides that a traffic light could alleviate vehicle conflicts at other intersections on TxDOT roads, TxDOT's policy allows for a *traffic signal warrant analysis* requested by the community. Traffic signal warrant analysis consists of documenting and quantifying conditions such as vehicular volume, pedestrian volume, accidents, progression, and delay at a proposed site. The data gathered at the site is then compared to criteria established by the agency to determine if a traffic light will be installed. A traffic signal warrant analysis is free to the community.

- Stop Signs. An intersection where traffic flow is not properly regulated increases the potential hazards to pedestrians and motorists. Stop signs control local intersections throughout the community. The study found 554 stop signs in the city limits and an additional 69 sign in the ETJ. Within the city limits, signs are missing at the intersection of Milam and Grove and at the intersection of Olive and Santa Fe.

- Parking Restrictions. On-street parking is marked as off-limits around several schools and supporting facilities (Wharton High School, Wharton County Junior College and Football Stadium, Sivells Elementary, Wharton Junior High School, Wharton Alternative School), Briar Pointe Apartments, Nan Ya, the medical center, and areas near the intersection of FM 102 and US 59.

- Traffic Speeds. TxDOT establishes traffic speeds along state highways including US 59, BU 59-R (Richmond), and SH 60 (Milam). The speed limit on US 59 is 75 mph outside the city limits and 55 mph inside the city limits. The speed limit on BU 59-R is 55 mph outside the city limits and 30-45 inside the city. The speed limit on SH 60 is 70 mph outside the city limits and 50-30 mph inside the city. The speed limit on local streets is 30 mph, and 15-20 mph around schools, parks, etc.

Truck Routes & Traffic

Load limit and large-truck limit signs are located on some local streets and county roads leading off SH 60 (Milam), FM 1299, and FM 102. Truck traffic can bring a significant amount of money to the local economy through gas and food purchases and through wages to area residents. To avoid paying the high maintenance costs of truck traffic on local streets, the City needs to consider the availability of truck routes when siting industrial and commercial areas through future land use and zoning. The Texas Transportation Code §621.303 gives municipalities the authority to regulate truck traffic on city streets, and §623.072 covers the designation of specific routes.

Pedestrian & Bicycle Facilities

Sidewalks are available in several areas of Wharton, primarily in central Wharton (see *Figure 9C, next page*). The sidewalks were built at various times by both the City and private developers. The City of Wharton has been working on a sidewalk accessibility enhancement project in the Central Business District since 2012. Using TxDOT Transportation Enhancement Grant Funds (2012 and 2014 funding cycles), the total project length includes 3,812 Linear Feet of sidewalk, as well as ADA accessible ramps and ADA parking. The City of Wharton was finalizing this project at the time of plan production.

Due to the recent improvements, sidewalk facilities in the Central Business District area are in excellent condition. However, the condition of other sidewalks in central Wharton and elsewhere in the city varies notably. In many areas, grass/vegetation has crept onto the sidewalk and caused significant deterioration (see *Figure 9D, next page*). Flooding and poor drainage has further exacerbated poor sidewalk conditions. As a result, much of the sidewalk network in Wharton present significant impediments to users with a mobility impairment.

Wharton's sidewalk network also suffers from areas of limited connectivity; e.g. the sidewalk may "disappear" for one or more blocks. This may result from the commonly piecemeal approach to sidewalk development in established neighborhoods, wide and/or frequent curb cuts (such as for driveways), as well as dilapidation of the previous sidewalk. At the block level, gaps in the sidewalk negatively impact accessibility and use. At the network level, large gaps between sidewalks limit the system's ability to accommodate users for longer trips and thereby to provide a viable alternative to driving.

There are no marked bicycle facilities on streets in in the city of Wharton. Given Wharton's relatively flat topography, adding comfortable bike lanes and convenient bike parking can encourage both novice and more experienced bicyclists to ride for both transportation and recreation. Linking bicycle lanes with the existing Santa Fe Trail can also bring more cyclists to the trail and help connect the trail to the downtown, helping existing and future businesses. Few streets in Wharton have a wide shoulder that could easily accommodate a bike lane. Shared lane markings may be the quickest and most cost-effective way to accommodate bicyclists but the City should pursue cycle tracks and/or shared pedestrian cycle tracks as opportunities arise.

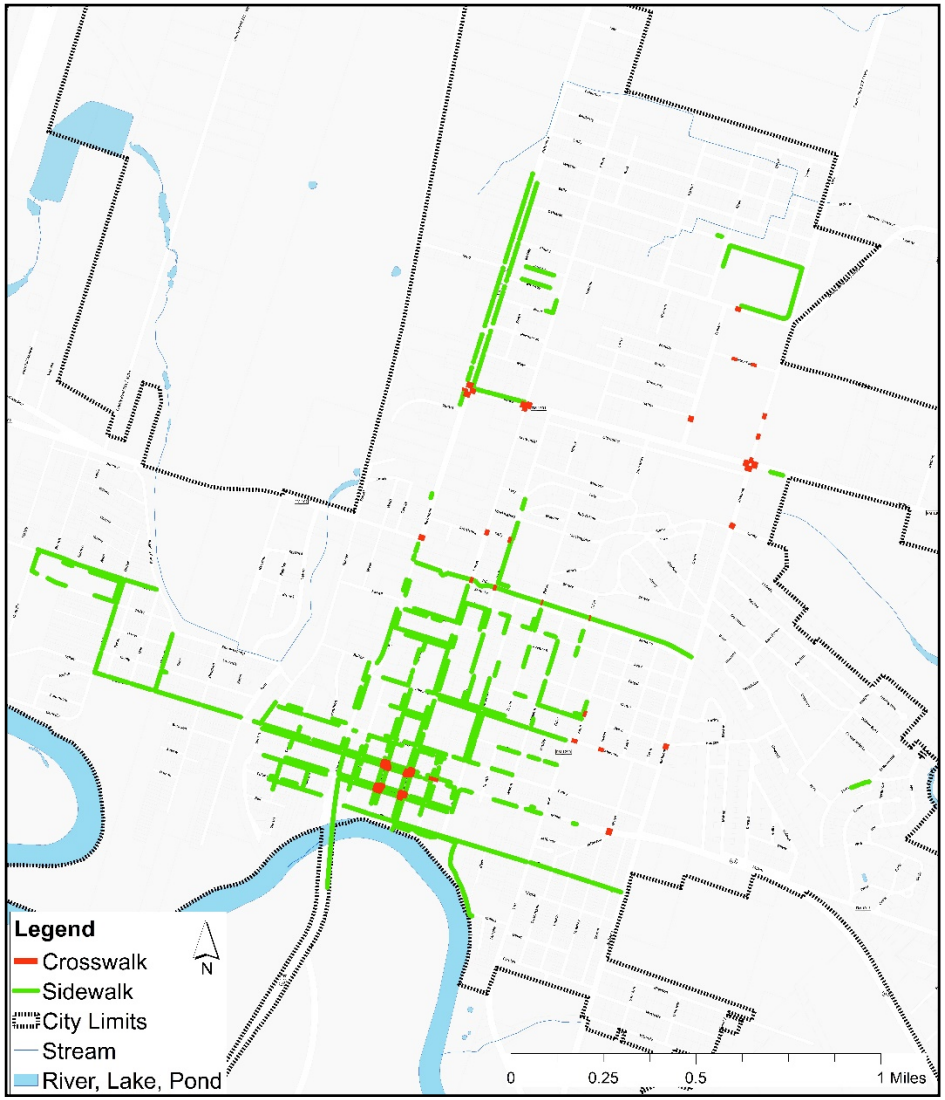


Figure 9C: Sidewalk Network

Figure 9D: Sidewalk Conditions

9.4 Key Thoroughfare Considerations

Wharton's thoroughfare system should meet the local and regional needs of employers and schools, as well as ensure that local trips are easy and safe. In addition, residents and employees should have opportunities to make some trips via walking or biking. The following key ideas should be considered when meeting the City's circulation goals.

9.4.1 System Connectivity is Tied to Land Use Patterns

Land development patterns provide a key measure of a thoroughfare system's ability to circulate traffic; and they determine the type of facilities needed to accommodate traffic. By examining its land development patterns, a city can measure its road network's "connectivity" and determine thoroughfare needs.

Areas with high connectivity are characterized by short blocks and many connections between local neighborhood streets and interlocal arterial/collector streets. Such areas provide residents with multiple routes between locations, and residents are not dependent on thoroughfares. Areas with low connectivity are characterized by long blocks, many dead-ends, and few connections between neighborhoods. Residents of such areas frequently depend on thoroughfares to enter or exit their neighborhoods.

Table 9F outlines the advantages and disadvantages of high and low connectivity in a transportation system.

Table 9F: Advantages of High vs. Low Connectivity

High Connectivity (Grid System)	Low Connectivity (Conventional System)
▪ Dispersion of traffic lowers congestion on major roads	▪ Lower traffic volumes on local streets
▪ Reduced drive time (including for emergency and utility vehicles)	▪ More very low volume local streets and cul-de-sacs, which are desirable to some residents
▪ Enables walking and bicycling	▪ Depending on street widths/lot sizes, can use less pavement/land
▪ Block structure enables land use to evolve and adapt over time (development flexibility)	▪ Possibly fewer accidents because of fewer intersections

Lack of connectivity creates/contributes to mobility challenges for residents and visitors. For example, as *Figure 9E* depicts, the typical suburban housings development design is often less efficient in terms of mobility, especially for residents on foot. Because of the 'lollipop' street network layout, a one-minute walk becomes a 10-minute walk or, without infrastructure to support non-motorized travel such as sidewalks or bike lanes, travelers may only feel safe driving, leading to congestion. In Wharton, poor connectivity contributes to the congestion on FM 102 (at US 59 and Richmond Rd) and Alabama Road (at FM 1301) during rush hour, as the residents of each house must drive the same roads regardless of their ultimate travel direction.

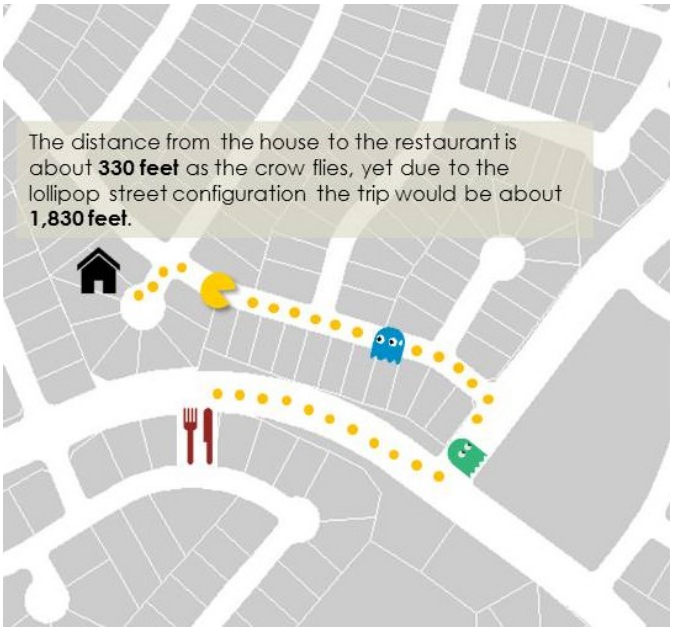


Figure 9E: Land Use Impacts Transportation

As *Figure 9F (next page)* illustrates, much of Wharton's street and thoroughfare system aligns with principles of high connectivity. For example, land development patterns have created a well-connected transportation system in central Wharton that lessens the city's reliance on major roads for local traffic. Local streets constructed in a grid of 325-foot blocks disperse traffic and allow for multiple paths to destinations. However, development outside central Wharton is less connected. Parts of west and north Wharton follow a general grid pattern, but blocks lengths are longer (up to 925 feet) and several streets dead end. Neighborhoods in east Wharton have fewer internal connections and very few direct connections with other neighborhoods (drivers must travel on an arterial road before accessing an adjacent neighborhood).

As *Figure 9F (next page)* also shows, in some locations, reduced connectivity within and between areas of Wharton results from incomplete build-out of the road network (see unbuilt right-of-way). However, limited connectivity results more from current land use, particularly large-scale uses (like schools), railroads, and in some cases parks. Strategic thinking about placement of large-scale uses and requiring shorter block lengths will help reduce the impact of similar, future uses on connectivity.

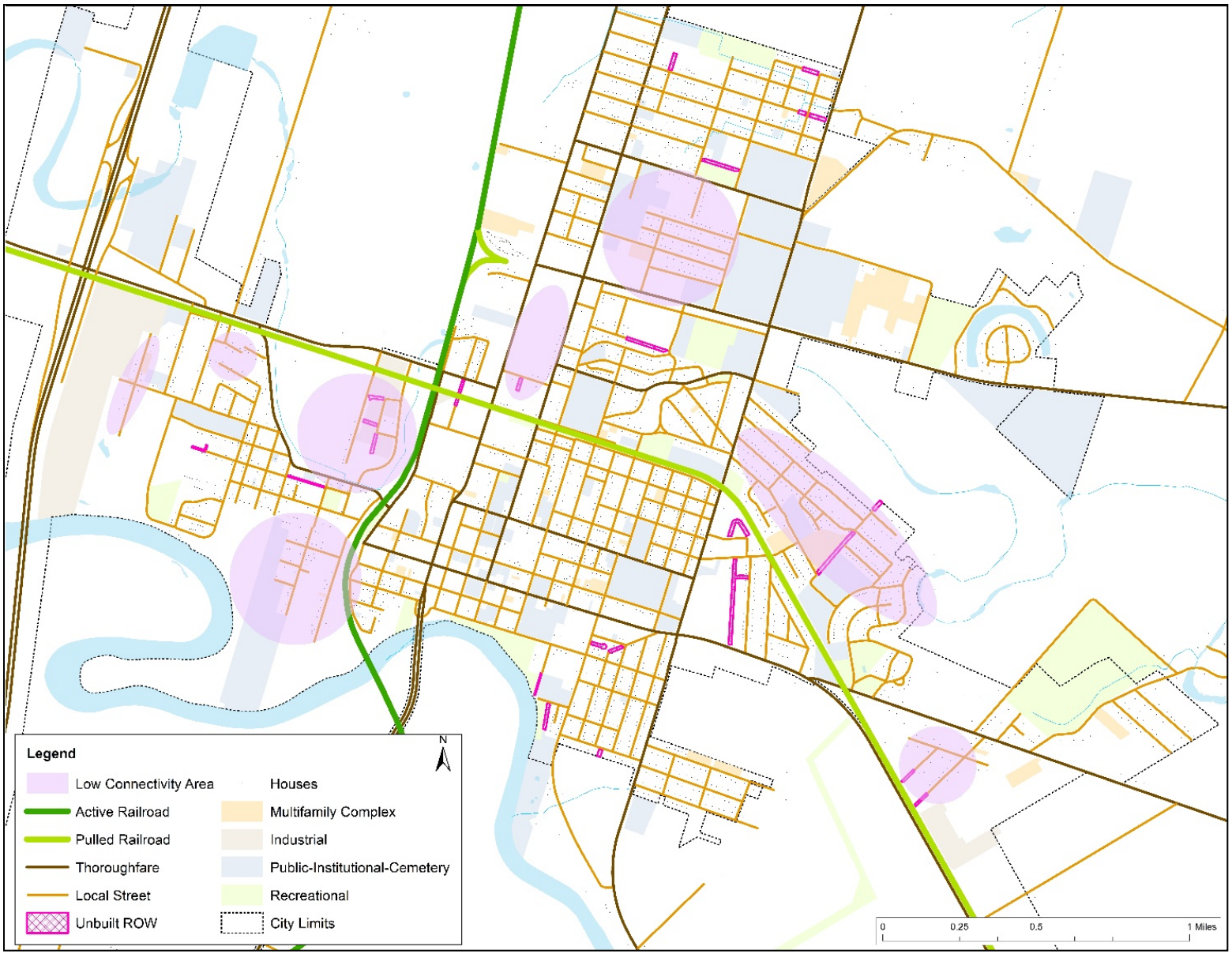


Figure 9F: Low-connectivity Areas

Because land use patterns and design have such a significant impact on traffic flow and mobility, coordination between transportation goals and land use goals is essential. Future development should focus on, building-out the existing road network to enhance connectivity and continuing the original grid system, which will require amending the City's Subdivision Ordinance to require shorter blocks, connections to existing streets, and multiple exits from new neighborhoods. Cul-de-sacs and dead-end streets serve a purpose in contributing to the diversity of residential choices available, but they should be limited to locations where topography makes them the most reasonable design choice. In areas where street connectivity cannot be fully accomplished, the City can ensure connectivity by developing pedestrian and bike connections (further discussed below)

9.4.2 Pair System Capacity Increases with Transportation Alternatives & Safety Improvements

Residents report traffic delays primarily on FM 102 (at US 59 and Richmond Rd) and Alabama Road (at FM 1301) during rush hours. TxDOT's plan to widen FM 102 into a four-lane road may alleviate congestion. However, it is important to keep in mind potential unintended consequences. Road widening without additional transportation system improvements is notorious for failing to create substantive improvements in levels of service (LOS) over the long-term. The amount of driving in an area invariably increases to fill available capacity, because the better the LOS, the worse our driving habits (e.g. driving at rush hour, making many separate trips instead of one coordinated trip, driving instead of walking even for short trips, etc.). While road widening is necessary in some cases, road widening will not solve congestion problems once an area's population has grown past a certain point. Capacity increase meets a point of diminishing returns against infrastructure and maintenance costs, less efficient use of land (sprawl), and reduced travel choice options (walking, bicycling). *Table 9G* lists some of the pros and cons of road widening.

Table 9G: Pros & Cons of Road Widening

Pros	Cons
▪ Higher maximum road capacity ▪ Short-term decrease in pollution ▪ Short-term decongestion	▪ Little change in long-term congestion ▪ Negative impact on non-automobile users ▪ Negative impact on area's appearance ▪ More expensive construction and maintenance; associated pollution ▪ Higher ambient temperature (heat island effect) and associated pollution ▪ More impermeable surface, which increases drainage problems/ infrastructure costs

While some engineers and planners advocate road widening for safety reasons, a number of parameters can make a road more or less safe. Features that can increase safety include: slower speeds, narrower lanes, medians, turn lanes, shoulders, lighting, and signals. The various features affect each other (e.g. wider lanes lead to speeding), so no single feature should be considered in isolation.

Improvements to transportation infrastructure other than or in addition to road widening include:

- Pedestrian improvements (sidewalks, street trees, benches, raised road median, crosswalks at highway intersection)
- Bicycle improvements (wide shoulder/signage or facility building)
- Safety features (speed bumps, designated truck routes, speed limit signs, flashing lights)
- Subdivisions and commercial/residential developments designed for increased connectivity (discussed above)

Pedestrian improvements such as medians can also be used to slow traffic in locations where speeding is a problem. While a larger population and increased economic activity will increase road congestion, incorporating alternative transportation infrastructure and land development patterns into the City's development regulations will offset traffic problems.

9.4.3 Adopt Design Standards Along Major Thoroughfares to Support Economic Development Goals

Development along Wharton's thoroughfares serves as publicity for the city and determines the first impression of potential residents and investors. For that reason, thoroughfare fronting development should project economic success, cooperation between landowners, and local investment.

Two streets in Dallas and Lubbock illustrate important features of thoroughfare design (see *Figures 9G and 9H, next page*). The Dallas and Lubbock street sections have a number of similarities: the buildings in both locations have masonry/hardwood/cement facades, plenty of windows, and neither street boasts amenities such as benches, decorative lighting, or underground telephone wires. Nevertheless, the basic differences in layout and maintenance give the Dallas street a much more appealing aesthetic than the Lubbock street. Reasons for the difference include:

Oak Lawn (Dallas)	34th St (Lubbock)
▪ 4 traffic lanes	▪ 5 traffic lanes
▪ Few, minimally sized parking lot entrances	▪ Frequent, wide parking lot entrances
▪ Wide, well-maintained sidewalk	▪ Narrow, poorly maintained sidewalk
▪ Deep awning and walkway in strip-mall	▪ Shallow awnings and walkway in strip-mall
▪ Vegetation along street	▪ No vegetation along street
▪ Well maintained streets and buildings	▪ Poorly maintained streets and buildings

Figure 9G: Oak Lawn, Dallas

Auto-oriented, pedestrian accessible development *(Source: Google Earth Street View)*

Figure 9H: 34th St, Lubbock

Auto-oriented development with limited pedestrian features (narrow sidewalk on right, wide driveways, no trees in right of way) *(Source: Google Earth Street View)*

As illustrated, the design elements that create appealing streetscapes include decisions about cross-property layout such as building widths, parking location and driveway widths, and building setbacks. These elements do not impact developer expense but instead depend on the city taking a role in establishing standards and enforcing those standards as new buildings are built. Other design elements, such as awnings and vegetation, are fairly low-cost methods for improving aesthetics and the experience of visitors. Additional design elements, such as sidewalks, do increase costs and may not be suitable along all thoroughfare sections. Municipal representatives, landowners, and local organizations working on economic development would need to decide which requirements return the greatest cost benefit in which locations.

Figure 9I show the intersection of two of Wharton's main thoroughfares: Boling (FM 1301) and Richmond (BU 59-R). The thoroughfares are somewhat densely developed and there are few vacant lots. These features project an image of success. However, the variation in building setbacks (from 4-to-250 feet), the poor condition of some of the buildings, the lack of façade or screening standards, and the large distance between some buildings undermines that image.

Figure 9I: US 59 / E Boiling Hwy – Setback Variation

The City of Wharton should adopt design standards to improve visual appeal on major thoroughfares like Boling and Richmond. Thoroughfare design standards describe the dimensions, layout, speed limit, amenities, and use of major roads. They are not construction standards, which regulate building material, pavement depth, testing procedures, and similar engineering requirements. The City of Wharton should also consider established standards for lot layout, landscaping, pedestrian amenities, and building design, most often regulated through a zoning ordinance. Amending what the City requires and encourages of development on its thoroughfares would, over time, contribute to local efforts to increase residents' pride and encourage new business and population growth.

9.4.4 Thoroughfare Standards Should Support Bicycle & Pedestrian Use

Based on residents' desires to increase the attractiveness of Wharton's thoroughfares and to improve walking and bicycling infrastructure, the City should adopt the Context Sensitive Solutions (CSS) manual standards for the construction of new thoroughfares and the redevelopment of existing thoroughfares. The CSS manual preserves long-standing U.S. Department of Transportation functional street classifications, which include street standards based on vehicle speed and sight distance. To those standards, it adds a new 'thoroughfare type' definition that incorporates multi-modal design standards such as bicycle lanes, medians, and sidewalks which were previously not included.

The CSS manual describes needed facility standards in detail and includes information on construction standards (e.g. sidewalk and lane width). The following facility standards are included in *Table 9F:*

- Number of through lanes. The number of lanes effect vehicle speed, traffic volume, traffic noise, and the safety of crossing pedestrians.
- Operating speed. Speed limits effect vehicle speed, traffic volume, traffic noise, and the safety of crossing pedestrians.
- Sidewalks. Sidewalks provide safe pedestrian routes. Detailed information on sidewalk standards are available from Safe Routes to School (http://guide.saferoutesinfo.org) and WalkingInfo.org (www.walkinginfo.org)
- Median. Medians slow traffic and provide safe stopping points for pedestrians crossing the street. They can also be used to plant trees, which improve aesthetics, slow traffic, reduce the heat-island effect, and reduce wear on the streets from sun and rain. Detailed information on median standards is available through the sidewalk resource sites listed above.
- Bicycle Lanes/Shoulders. Bicycle lanes provide safer routes for bicycle traffic. Detailed information on bicycle lane standards is available from www.bicyclinginfo.org
- On-street parking. On-street parking slows traffic, provides a buffer between moving traffic and pedestrians, and provides extra parking capacity.

- Landscaping. Landscaping (e.g. flowers, trees, screening walls) provides aesthetic improvements, buffers pedestrians from moving traffic, and can help slow traffic. Landscaping is not required for single-family, residential properties.
- Block length. Shorter block lengths (200-400 feet) are most conducive to pedestrian traffic and provide shorter routes for automobiles. Blocks over 660 feet in length discourage people from walking.
- Freight movement. Truck traffic discourages pedestrians.

Table 9G (next page) lists specific thoroughfare characteristics and design standards, modified slightly from the CSS manual, to serve Wharton's rural character and local conditions. *Table 9I (page 9-20)* suggests particular improvements that would be needed to bring Wharton's thoroughfares up to the standards listed.

The original CSS standards and definitions are located in *Appendix 9B.* On State roads, the City will need to work with TxDOT to meet these standards. On local roads, the City will need to amend its subdivision ordinance to require developers to meet these standards in new construction.

Table 9H: CSS Thoroughfare Type Design Standards

Type* (Classification)	Number of Through Lanes	Operating Speed (mph)	Sidewalks	Median	Bicycle Lanes/ Shoulders	On-street parking	Landscaping	Freight Movement
Expressway	4 to 6	45-44	No	Yes	No	No	Optional	Regional Truck Route
Rural Highway (Arterial)	4 to 6	45+	Optional	Optional	Optional	No	Optional	Regional Truck Route
Boulevard (Arterial)	4 to 6	30-45	Yes	Yes	Yes	Optional	Yes	Regional Truck Route
Avenue (Arterial/ Collector)	2 to 4	25-30	Yes	Optional	Yes	Optional	Yes	Local Truck Route
Rural Road	2	25-35	No	No	Shared or Shoulder	No	Optional	Local Deliveries Only
Street (Local)	2	25	Optional	No	Optional	Yes	No	Local Deliveries Only

*If type is located in the CBD or other area where walking or biking is desired, speed limits may be lowered, sidewalks and on-street parking may be required, and maximum block length lowered

Source: Adapted from field survey, Designing Walkable Urban Thoroughfares: A Context Sensitive Approach. Institute of Transportation Engineers, 2010, pg. 54 and Complete Streets Best Practices, Sacramento Transportation and Air Quality Collaborative, p. 10 as accessed on the web in 2012 at http://www.completestreets.org/webdocs/resources/cs-bestpractices-sacramento.pdf

Table 9I: Recommended Thoroughfare Improvements

	Current Functional Classification	Rural Highway	Bicycle lanes/shoulders; landscaping
US 59	Principal Arterial	Boulevard	More sidewalks; median; bike lanes/shoulders; landscaping
Boiling/FM 1301	Principal Arterial	Boulevard	Sidewalks; median; bike lanes/shoulders; landscaping
FM 102	Principal Arterial	Avenue	More sidewalks; bike lanes/shoulders; landscaping
N Alabama	Minor Arterial	Boulevard	More sidewalks; median; bike lanes/shoulders; landscaping
Richmond/BUS 59	Minor Arterial	Avenue	More sidewalks; bike lanes/shoulders; landscaping;
Milam	Minor Arterial	Rural Highway	Bicycle lanes/shoulders
FM 1299	Major Collector	Boulevard	Sidewalks; median; bike lanes/shoulders; landscaping
FM 3012	Major Collector	Avenue	Sidewalks; bike lanes/shoulders; landscaping
CR 135/Lees	Major Collector	Boulevard	Sidewalks; median; bike lanes/shoulders; landscaping
SH 60	Major Collector	Avenue	Additional lanes; sidewalks; bike lane/shoulder; landscaping
N Sunset	Minor Collector	Avenue	Bike lane/shoulder; landscaping
W Milam	Minor Collector	Avenue	More sidewalks, bikes lanes/shoulders; landscaping; on street parking
W Alabama	Minor Collector	Avenue	More sidewalks; bike lanes/shoulders; landscaping
Fulton	Minor Collector	Avenue	More sidewalks; bike lanes/shoulders; landscaping
Mockingbird / Sunny	Minor Collector	Avenue	Sidewalks; bike lanes/shoulders; landscaping
Ahldag	Minor Collector	Rural Highway	-
Brooks	Minor Collector	Local	Sidewalks; bike lanes/shoulder; on-street parking
Hodges	Local	Rural Highway	Bicycle lanes/shoulders; landscaping

9.5 Implementation Plan

The Implementation Plan organizes the action items recommended to address each issue identified in the above sections into a timeline for completion. The actions are prioritized by date.

Table 9J: Implementation Plan: 2018-2028

Goals & Objectives	Activity Year(s) 2018-2021	Activity Year(s) 2022-2024	Activity Year(s) 2025-2028	Lead Organization	Cost Estimate	Funding Sources
Goal 9.1 *Develop a thoroughfare system that accommodates pedestrians and bicyclists*						
Construct sidewalks along Fulton, Ahldag, and Pioneer to complete connections between Santa Fe Trail, Wharton Junior High, Wharton Civic Center, Boys and Girls Club, Wharton High School, WCJC		X	X	City	$375,350[52][1] (7,507 LF)	GEN, EDC, SRTS, TxDOT
Construct bike lane from Santa Fe Trail to Riverfront Park (see *Chapter 12 Central Business District)*			X	City	~$50,000	GEN, EDC, SRTS, TxDOT
Complete sidewalk network throughout Central Business District (see *Chapter 12 Central Business District)*	X	X	X	City, EDC	$333,000	GEN, EDC, THC, TxDOT
Repave existing sidewalks in deteriorated condition and continue ADA improvements	X	X	X	City	Variable	GEN, EDC, SRTS, THC, TxDOT
Ensure that all future upgrades to thoroughfares within the city limits are designed to ITE CSS standards with provisions for sidewalks and bike lanes or shoulders	X	X	X	City, TxDOT	Variable	GEN, TxDOT
Consider adopting a Zoning Ordinance with standards for thoroughfare-fronting development	X	X	X	City	<$2,000 (legal)	GEN
Goal 9.2 *Ensure that the thoroughfare system maintains its capacity as new development is built*						
Install missing stop signs as intersections of: Grove & Milam/SH 60; 3rd & Olive;	X			City	$2000 ($500/per)	GEN

[52] Cost is based on TxDOT 2010 SRTS project costs. Cost for 5' concrete sidewalk, 4" thick, 6x6 wire mesh, and ADA ramps at intersections is $50 per linear foot and includes material, labor and equipment, and engineering.

Jackson & Lees; and Jackson Quarters & CR 166.				
Adopt a Future Land Use Map/Plan that encourages infill development	X	City	Staff	GEN
Request Traffic Warrant Analysis for intersection of Spanish Camp Rd and FM 102	X	City	$0	TxDOT
Request Traffic Warrant Analysis for intersection of Mattie Rd and FM 102	X	City	$0	TxDOT
Update Subdivision Ordinance to require subdivision streets to connect to existing streets and limit block length to a minimum of 200' and a maximum of 1000'	X	City	< 2,000 (legal)	GEN

GEN = Municipal funds, including bonds; **LOCAL** = donations of time/money/goods from private citizens, developers (as required by subdivision ordinance), charitable organizations, and local businesses; **SRTS** = Safe Routes to School; **THC** = Texas Historical Commission (Downtown Revitalization Program); **TxDOT** = Texas Department of Transportation funding;

FOR A FULL LIST OF FUNDING SOURCES, SEE CHAPTER 14

9.6 Appendix 9A: Trip Generation

Major traffic generators are defined as sites that are the starting point or destination of more than 100 vehicle trips per day on average. A visit to the grocery store in one automobile generates two "trips:" the trip from the point of origin and the return trip. Trip generation rates are calculated in such a way as to account for what are known as "multi-event" trips, or those in which the driver leaves home and visits multiple destinations before returning home.

Predicting trip generation and traffic patterns on a roadway network requires the ability to determine trip rates and characteristics for various types of land use. The Institute of Transportation Engineers (ITE) compiles comprehensive listings of trip rates by land use in an informational report call Trip Generation. That document is updated periodically and is widely used in thoroughfare analysis. *Table 9A.1: Daily Trip Generation Rates* lists typical trip generation rates for land uses found in Wharton.

Table 9A.1: Daily Trip Generation Rates

Land Use	Trip Rate Basis (Unit)	Daily Trips/ Unit
Single-family	Dwelling unit (DU)	9.52
Apartment	DU	6.65
Motel	Rooms	5.63
City Park	Acres	1.89
Elementary School	Student	1.29
Middle/Junior High School	Student	1.62
High School	Student	1.71
Junior/Comm. College	Student	1.23
Church	1,000 Square Feet (SF)	9.11
Hospital	1,000 SF	13.22
Clinic	1,000 SF	31.45
Assisted Living	Beds	2.66
General Office	1,000 SF	11.03
Government Office Building	1,000 SF	68.93
Shopping Center	1,000 SF	42.70
Supermarket	1,000 SF	10.24
Heavy Industrial	1,000 SF	1.5
Manufacturing	1,000 SF	3.82
Light Industrial	1,000 SF	6.97

Source: Institute of Transportation Engineers (ITE), Trip Generation, 9th Edition

9.7 Appendix 9B: CSS Manual Thoroughfare Standards

The CSS manual preserves long-standing U.S. Department of Transportation functional street classifications, which include street standards based on vehicle speed and sight distance. To those standards, it adds a new 'thoroughfare type' definition that incorporates multi-modal design standards such as bicycle lanes and sidewalks which were previously not included. *Table 9B.1* shows the relationship between functional classification and thoroughfare type. *Table 9B.2* describes the functional and design aspects of each street type in general terms. *Table 9B.3* lists specific thoroughfare characteristics and design standards.

Table 9B.1: Relationship between Functional Classification & Type

	Thoroughfare Types						
Functional Classification	**FREEWAY/ EXPRESS-WAY/PARK-WAY**	**RURAL HIGHWAY**	**BOULEVARD**	**AVENUE**	**STREET**	**RURAL ROAD**	**ALLEY/REAR LANE**
Principal Arterial	■	■	■	■	■		
Minor Arterial		■	■	■	■		
Collector				■	■	■	
Local					■	■	■

Shaded cells represent thoroughfare types that are not addressed in this report.

Source: Designing Walkable Urban Thoroughfares: A Context Sensitive Approach. Institute of Transportation Engineers. 2010. (pg. 53)

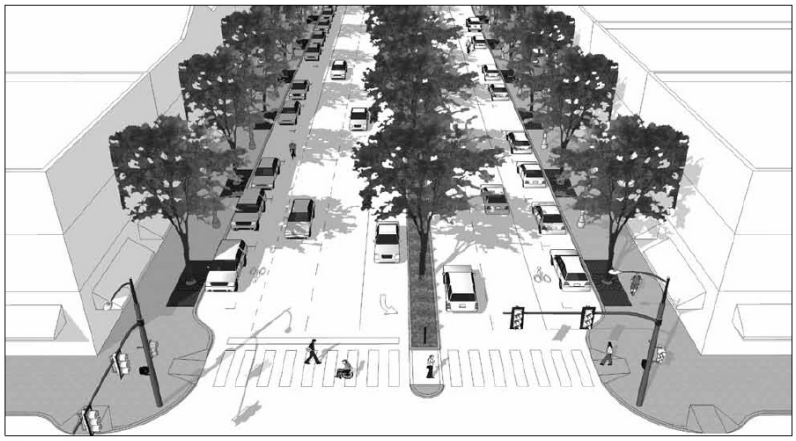


Figure 4.5 Illustration of a boulevard. Source: Claire Vlach, Bottomley Design & Planning.

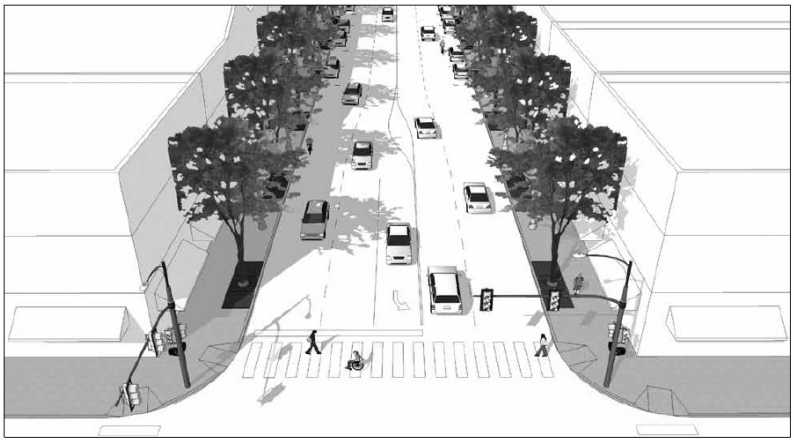


Figure 4.6 Illustration of an avenue. In this example on-street parking is dropped to gain width for a left turn lane at the intersection. Source: Claire Vlach, Bottomley Design & Planning.

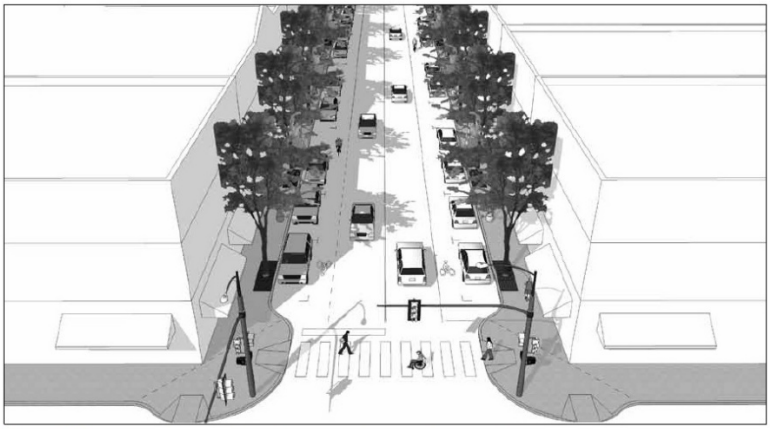


Figure 4.7 Illustration of a street. Source: Claire Vlach, Bottomley Design & Planning.

Figure 9B.1: Top to Bottom: Boulevard, Avenue, & Street

Source: Designing Walkable Urban Thoroughfares: A Context Sensitive Approach. Institute of Transportation Engineers. 2010. (pg. 50-51)

Table 9B.2: Street Functional Hierarchy

Street Type	Function and Design
Freeway/Expressway/ Parkway (Principal Arterial)	Provides efficient movement at higher speeds (50 mph or more), often with controlled access to prevent slowing of movement and grade separated intersections. No pedestrian access. *Examples: Interstates/other divided highways.*
Rural Highway (Principal/ Minor Arterial)	High speed traffic (45 mph +) for efficient movement and access to rural properties. At-grade intersections. *Examples: Long-distance county and farm-to-market roads*
Boulevard (Principal/ Minor Arterial)	Moderate speed (35 mph), urban, divided arterial with multimodal transportation facilities. Typically 4-8 lanes providing traffic movement and some degree of access management. Pedestrian and bike access are present, sometimes through a parallel facility. Function as the primary goods movement and emergency response routes. Sometimes include curb parking and parallel access lanes (multiway boulevard). *Example: Multilane streets with turn lanes.*
Avenue (Principal/ Minor Arterial, Collector)	Walkable, low to medium speed (25-35 mph), generally carries local traffic for shorter trips than boulevards. Should not exceed 4 lanes. May feature a raised, landscaped median and curb parking. Are primary pedestrian and bike routes. *Example: City streets with stoplights but few stop signs.*
Street (Principal/ Minor Arterial, Collector, Local)	Low speed (~25 mph) access roads to adjacent properties and connectors between residential, commercial, and larger thoroughfares. Streets may serve as the main road of commercial or mixed-use areas and emphasize curb parking. *Example: Neighborhood streets*
Rural Road (Collector/ Local)	Low speed (25-35 mph), rural roads *Example: Neighborhood county roads*
Alley/Rear Lane (Local)	Very low-speed (5 to 10 mph) at the rear of properties, providing access to parking, service areas, secondary residential units, and utility easements *Example: Alleys*

Shaded cells represent thoroughfare types that are not addressed in ITE report.

Source: Designing Walkable Urban Thoroughfares: A Context Sensitive Approach. Institute of Transportation Engineers. 2010.

Table 9B.3: Street Characteristics & Design Standards

Urban Thorough-fare Type	Number of Through Lanes	Desired Operating Speed (mph)	Transit Service Emphasis	Median	Driveway Access	Curb Parking	Pedestrian Facilities [1]	Bicycle Facilities	Freight Mvmt. [2]
Freeway	4 to 6+	45–65	Express	Required	No	No	No	Optional sepa-rated pathway or shoulder	Regional truck route
Expressway/ Parkway	4 to 6	45–55	Express	Required	No	No	Optional sepa-rated pathway	Optional sepa-rated pathway or shoulder	Regional truck route
Boulevard	4 to 6	30–35	Express and Local	Required	Limited	Optional	Sidewalk	Bike lanes or parallel route	Regional truck route
Multiway Boulevard	4 to 6	25–35	Express and Local	Required on access lanes	Yes from access lane	Yes on access roadway	Sidewalk		Regional route/ local deliveries only on access roadway
Avenue	2 to 4	25–30	Local	Optional	Yes	Yes	Sidewalk	Bike lanes or shared	Local truck route
Street	2	25	Local or none	No	Yes	Yes	Sidewalk	Shared	Local deliveries only
Rural Road	2	25–35	Local or none	No	Yes	No	No	Shared or shoul-der	Local deliveries only
Local Street	2	25	Local or none	No	Yes	Yes	Sidewalk	Shared	Local deliveries only
Alley/Rear Lane	1	5–10	None	No	Yes	No	Shared	Shared	Local deliveries only

Shaded cells represent thoroughfare types that are not addressed in this report.

Notes:

[1] Boulevard, Multiway Boulevard, Avenue, and Street thoroughfare types have sidewalks on both sides. Sidewalk width varies as a function of context zone, fronting land use and other factors.

[2] Freight movement is divided into three categories: 1) Regional truck route, 2) Local truck route and 3) Local deliveries only. Cells show highest order of truck movement allowed.

Source: Designing Walkable Urban Thoroughfares: A Context Sensitive Approach. Institute of Transportation Engineers. 2010. (pg. 54)

10 Economic Development

Economic development in rural America is any activity that makes the choice to remain in a community easier and more satisfying. Job opportunities are an obvious example but this list also includes the availability of decent affordable housing, quality education, an attractive, safe, and clean environment (natural and manmade), a comfortable social atmosphere, recreation and entertainment options, convenient shopping, adequate health care, a competitive and fair tax structure, responsive local government, transparent government regulations, and high-quality infrastructure (water, sewer, streets, drainage, telecommunications, etc.).

10.1 Highlights

Wharton has tools to have a healthy economy. Most residents are able to find work in Wharton County, despite its rural location, though average wages in Wharton County are significantly lower than average wages in the Gulf Coast Workforce Development Area (WDA) and the State. It is located at the intersection of two highways, S.H. 60 and U.S. 59 (future I-69), making it easily accessible to the Houston metropolitan area. It has active community groups who provide business support and work to upgrade the City's parks and downtown to improve the quality of life in Wharton. Continued volunteer and financial support will be needed to preserve and enhance key community resources such as the City's parks and downtown area.

Limiting its effectiveness, however, are vacant commercial buildings in the downtown area and generic commercial development along the City's main thoroughfare, N. Richmond Rd. The City has begun to establish a "brand" and continued development of this brand and collaboration with regional entities will strengthen its regional presence.

Wharton's residents have not turned a blind eye to either the City's weaknesses or its strengths. A strong city staff and many volunteer organizations are in place to capitalize on the City's strengths and work on local challenges described in this study.

10.2 Context: History, Location, & Community Input

Historic Development & Community Character

The area of Wharton was settled around 1846 as a plantation community by some of Stephen F. Austin's original colonists. Throughout the ensuing decades the City was settled by a variety of immigrants and formerly enslaved peoples and their descendants. The City was incorporated in 1902 and supported a variety of agricultural crops including cotton, corn, rice, sugar cane, and cattle, which led to the presence of several commercial enterprises including a cotton mill, sugar cane factory, gristmills, and dairy processing. Later the City supported oil and sulfur production. By the 1980s the City was home to the largest physical rehabilitation and therapy center in the nation, as well as medical clinics, and several petroleum, plastics, and agricultural service companies.

In 2018, Wharton remains a local job center and residential community for larger employment centers in the region. Its southeast central Texas location makes it dependent on several major highways that link it to the Houston metropolitan region. The City's location at the intersection of S.H. 60 and U.S. 59 provides direct links to El Campo, Rosenberg, and Houston. Wharton is approximately 60 miles southwest of Houston, approximately 26 miles southwest of Rosenberg, and roughly 13 miles northeast of El Campo.

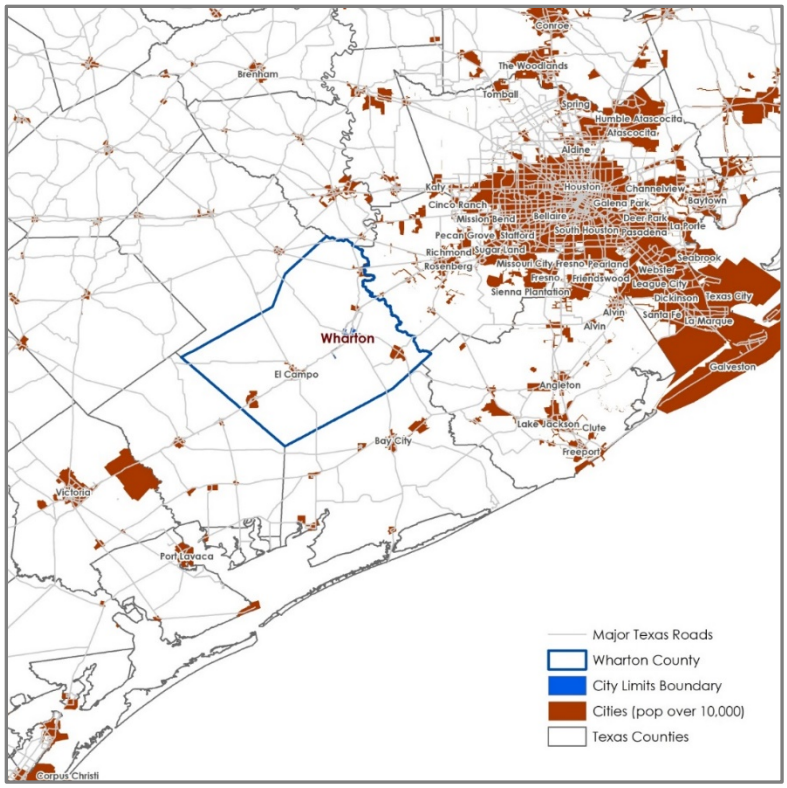


Figure 10A: Wharton Location

Wharton is a community characterized by strong school spirit, active community groups, and small-town charm. The downtown area is flanked with murals illustrating the City's history and heritage, while the County Courthouse restoration completed in 2007 has invigorated the central business district. The Economic Development Corporation (EDC) installed decorative lighting along the town square along with signage directing travelers to the downtown area. The City, Chamber of Commerce, and EDC host several festivals including the Monterey Square Wine and Arts Fair in October, and weekly Farmer's Markets.

Previous Studies

Gulf Coast Economic Development District Comprehensive Economic Development Strategy (CEDS) 2014-2018

Wharton is part of the Gulf Coast Economic Development District which serves as the Economic Development District for the Houston-Galveston Area Council (H-GAC).[53] The Gulf Coast Economic Development District (GCEDD) was incorporated in the State of Texas in 1988 to coordinate the economic development activities of the planning region, provide technical assistance to economic development organizations of the region, and maintain the region's eligibility to apply for economic development grants and assistance from the EDA. The CEDS analyzes the regional economy, establishes regional economic goals and strategies, and outlines a plan of action. The CEDS primary focus is to provide a regional economic development framework, but it also provides a vehicle through which federal agencies – namely the Economic Development Administration (EDA) – evaluate requests for grant assistance. Top economic goals outlined in the CEDs for 2014-2018 include:

A. Our Region is resilient and adaptive to economic downturns, natural disasters, and new opportunities.

B. Our Region has a diverse economy and skilled workforces that support businesses, innovation, and entrepreneurship.

C. Our Region's residents have access to education, training, jobs, and business opportunities that support a good quality of life and financial stability.

D. Our region's transportation and infrastructure promote effective goods movement and is well connected to national and global destinations.

E. Our region's local governments have access to data, tools, and solutions that facilitate informed decisions on funding and investment decisions.

[53] Houston-Galveston Area Council includes the following counties: Austin, Brazoria, Chambers, Colorado, Fort Bend, Galveston, Harris, Liberty, Matagorda, Montgomery, Walker, Waller, and Wharton

F. Our region's residents live in safe, healthy communities with transportation options and have access to services and amenities that support a high quality of life.

G. Our region's water infrastructure supports current and future demands, while promoting the growth of healthy and economically dynamic communities.

H. Our region values its unique ecosystems and understands the ecological, economic and cultural benefits they provide.

Community Input

A detailed discussion of community input during the planning process is located in *Chapter 1: Community Goals & Objectives*. The concerns expressed by residents that related to economic development and guide the discussion below are:

Achieve/Preserve	Avoid/Eliminate
▪ More job opportunities and high wage jobs ▪ More diversified and vibrant community ▪ Provide more entertainment options (movies, bowling, dancing, live music), retail options (small neighborhood shops, big box stores), and dining options (restaurants and food trucks) ▪ Continue to revitalize downtown & develop for tourism ▪ Promote as college town	▪ Non-retail business in Monterrey Square ▪ Improperly located adult & adult entertainment establishments ▪ Businesses that create environmental pollution ▪ Rundown hotels/motels ▪ High rate of business turnover in the downtown core

10.3 Conditions & Forecast

The following data includes both local and regional economic information because Wharton's local workforce and economy are closely connected to the larger region. Some data is not available at the local level and in those cases Wharton County is used for comparison.

10.3.1 Largest Industries in Wharton & Wharton County

Tables 10A-10C and *Charts 10A and 10B (next pages)* list establishment, taxable sales, and employment data.

The tables show that:

- The largest number of establishments in Wharton is in the agricultural operations industry, followed by the retail trade and accommodation and food service industries. For a more detailed breakdown of industries in Wharton, see *Appendix 10A.1.*

Table 10A: Wharton City & Wharton County Establishments

Industry	# Establishments City	# Establishments County	City as % of County
Agriculture Operations	351	1,484	24%
Mining	0	0	0%
Utilities	1	5	20%
Construction	17	112	15%
Manufacturing	7	106	7%
Wholesale Trade	10	83	12%
Retail Trade	106	825	13%
Transportation	0	0	0%
Information	2	21	10%
Finance and Insurance	7	18	39%
Real Estate and Rental and Leasing	5	43	12%
Professional, Scientific, and Technical Services	7	69	10%
Management of Companies and Enterprises	0	0	0
Administrative and Support and Waste Management and Remediation Services	11	72	15%
Educational Services	3	12	25%
Health Care and Social Assistance	7	22	32%
Arts, Entertainment, and Recreation	4	37	11%
Accommodation and Food Services	36	228	16%
Other Services (except Public Administration)	30	230	13%
Public Administration	1	2	50%
Unclassified	0	0	0%
TOTAL	605	3,369	18%

- According to the Texas Workforce Commission, wages in Wharton County in 2016 are highest in the Utilities, Mining, Quarrying, Oil & Gas Extraction, Finance and Insurance, and Transportation and Warehousing industries. Wharton County wages in the retail industry, the largest industry in the City (not including agriculture), averaged $594 per week.

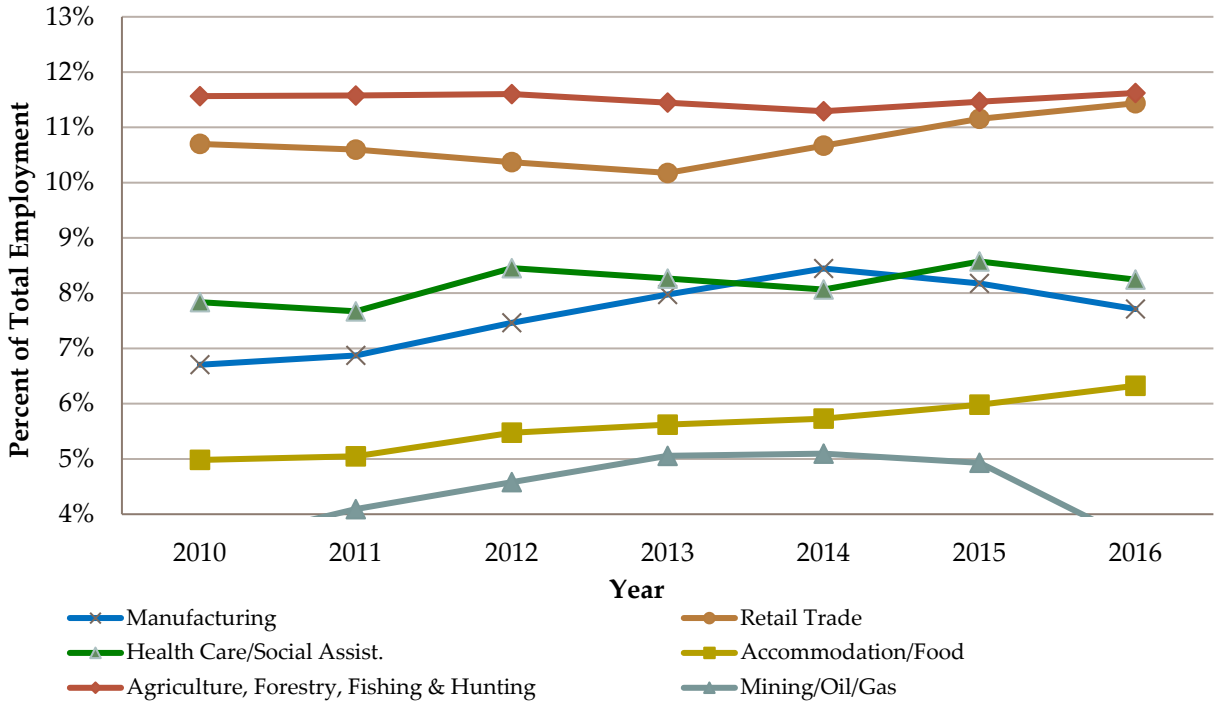
Table 10B: Highest Weekly Wages by Industry (4th Quarter 2016) [County]

Industry	Average Weekly Wage
Utilities	$1,298
Mining, Quarrying, and Oil & Gas Extraction	$1,132
Finance and Insurance	$1,120
Transportation and Warehousing	$1,049

Source: Texas Workforce Commission, Tracer quarterly employment and wages

- The agriculture, forestry, fishing & hunting industry employs 12% of workers in Wharton County. The second largest industry in terms of employment is the retail trade industry.

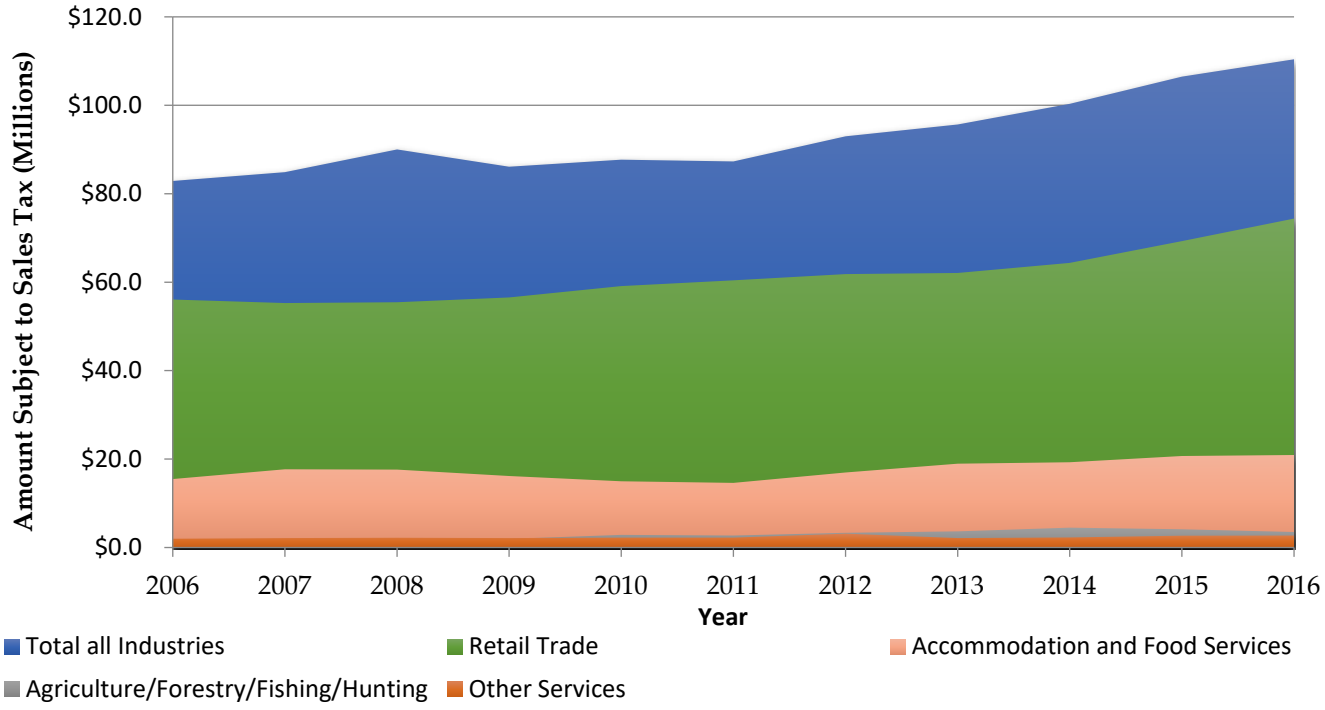
Chart 10A: Percent of Employees by Industry (2010 – 2016) [County]



Source: Texas Workforce Commission, Tracer quarterly employment and wages

- Taxable sales in Wharton increased between 2006 and 2008 before falling during the Great Recession. They have increased steadily from 2011 to the present. By far, the retail trade industry is the largest sales tax contributor, accounting for 67% of taxable sales. That is followed by the accommodation and food services industry which contributed 19%. The Comptroller's Office does not report sales tax revenue for industries with three or fewer establishments, so complete information for sales tax revenue by industry in Wharton is undisclosed.

Chart 10B: Taxable Sales (2006-2016) [County]



Source: Texas Comptroller Quarterly Sales Tax Historical Data.

- Agriculture: The Comptroller's Office does not report any sales for agricultural establishments within the City of Wharton. However, as is evident from employment data, farming is an important party of the county's economy. The USDA's Census of Agriculture data shows that Wharton's zip code has 365 farms, 27 of which produce more than $250K annually. Wharton County's agricultural crops include rice (first in acreage), cotton, milo, corn, sorghum, and soybeans. In addition, the county produces eggs, nurseries/turf grass, cattle, and aquaculture.

Table 10C: Farm Production in Wharton County

Location		Value of all agricultural products sold			
Zip Code	Place Name	Total farms	LESS THAN $50,000	$50,000 TO $249,999	$250,000 OR MORE
77488	**WHARTON**	**365**	**294**	**44**	**27**
77420	BOLING	98	83	7	8
77432	DANEVANG	12	8	1	3
77435	EAST BERNARD	217	184	16	17
77436	EGYPT	22	10	9	3
77437	EL CAMPO	552	362	109	81
77443	GLEN FLORA	15	12	2	1
77448	HUNGERFORD	43	26	7	10
77453	LANE CITY	16	9	4	3
77454	LISSIE	10	5	1	4
77455	LOUISE	133	88	26	19
77467	PIERCE	11	10	0	1
Total		**1,494**	**1,091**	**226**	**177**

Source: USDA – National Agricultural Statistics Service; 2007 Census of Agriculture, Zip Code Tabulations of Selected Items (www.agcensus.usda.gov/)

10.3.2 Characteristics of Wharton & Wharton County Workers

Types of Workers

Most residents of Wharton are employed in educational services, retail trade, and construction industries. The table below shows the types of industries in which Wharton residents are employed. They may not necessarily be employed in Wharton.

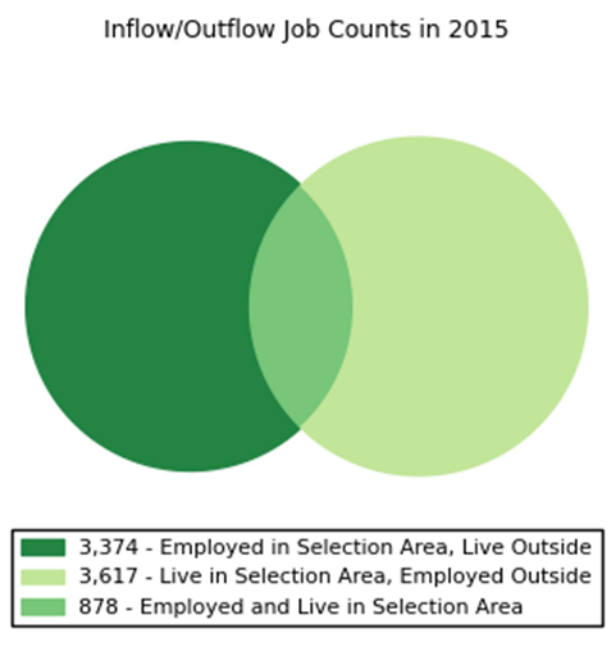
Table 10D: Wharton Residents who work by industry

INDUSTRY	Estimate	Margin of Error	Percent
Civilian employed population 16 years and over	3,400	+/-278	100%
Agriculture, forestry, fishing and hunting, and mining	134	+/-64	4%
Construction	422	+/-177	12%
Manufacturing	352	+/-160	10%
Wholesale trade	81	+/-59	2%
Retail trade	538	+/-189	16%
Transportation and warehousing, and utilities	190	+/-117	6%
Information	0	+/-18	0%
Finance and insurance, and real estate and rental and leasing	115	+/-68	3%
Professional, scientific, and management, and administrative and waste management services	325	+/-138	10%
Educational services, and health care and social assistance	805	+/-196	24%
Arts, entertainment, and recreation, and accommodation and food services	188	+/-80	6%
Other services, except public administration	192	+/-89	6%
Public administration	58	+/-34	2%

Source: US Census, 2012-2016 American Community Survey, 5-Year Estimates, DP03: Selected Economic Characteristics for Wharton. Note: Margins of error are large, data cited for trends only.

Location of Work

The following data comes from www.OnTheMap.com, a product of the U.S. Census Bureau, Center for Economic Studies and presents figures for the year 2015, the latest for which data was made available. As the data shows there is a significant imbalance between where people live and work. A large majority (80.5%) of Wharton residents travel outside of the City for employment, while a large majority of those employed within Wharton (79.4%) live outside of the City. Approximately 19.5% of those who live in Wharton also work in Wharton.

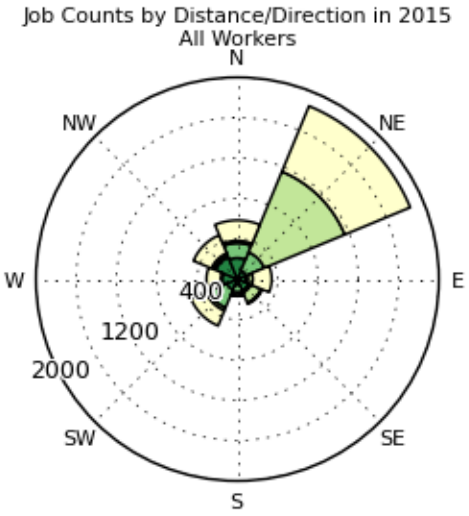


Inflow/Outflow Job Counts (Primary Jobs)

	2015 Count	2015 Share
Employed in the Selection Area	4,252	100.0%
Employed in the Selection Area but Living Outside	3,374	79.4%
Employed and Living in the Selection Area	878	20.6%
Living in the Selection Area	4,495	100.0%
Living in the Selection Area but Employed Outside	3,617	80.5%
Living and Employed in the Selection Area	878	19.5%

Figure 10B: Inflow/Outflow Job Counts (2015)

In addition, residents of Wharton travel considerable distances to reach their place of employment. Approximately 61% of residents travel more than 25 miles for work, with 36% traveling more than 50 miles. Roughly a quarter of Wharton residents travel less than 10 miles to get to work.

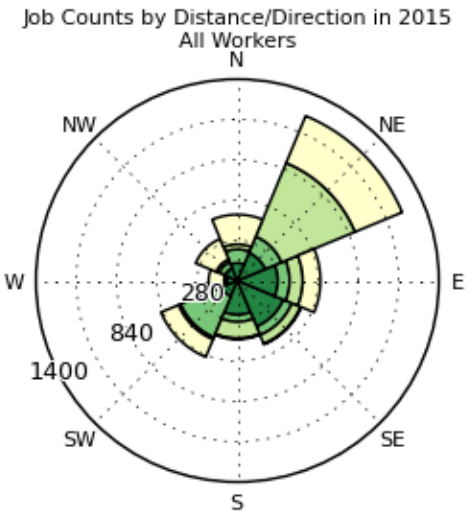


Jobs by Distance - Home Census Block to Work Census Block

	2015 Count	2015 Share
Total Primary Jobs	4,495	100.0%
Less than 10 miles	1,064	23.7%
10 to 24 miles	688	15.3%
25 to 50 miles	1,139	25.3%
Greater than 50 miles	1,604	35.7%

Figure 10C: Distance & Direction Traveled by Wharton Residents to Work (2015)

Those working in Wharton do not have to travel as far for work as Wharton's residents; however, almost half are traveling more than 25 miles to reach Wharton, and a quarter travel more than 50 miles.



Jobs by Distance - Work Census Block to Home Census Block

	2015 Count	2015 Share
Total Primary Jobs	4,252	100.0%
Less than 10 miles	1,481	34.8%
10 to 24 miles	782	18.4%
25 to 50 miles	902	21.2%
Greater than 50 miles	1,087	25.6%

Figure 10D: Distance & Direction Traveled by Workers Employed in Wharton from Home (2015)

Residents of Wharton find work throughout the region. The city they are most likely to travel to for work is Houston, followed by Wharton itself, Rosenberg, and El Campo. Residents of other cities working in Wharton also come from throughout the region including from Houston, El Campo, and Bay City.

Jobs Counts by Places (Cities, CDPs, etc.) Where Workers are Employed - Primary Jobs

	2015 Count	2015 Share
All Places (Cities, CDPs, etc.)	4,495	100.0%
Houston city, TX	944	21.0%
Wharton city, TX	878	19.5%
Rosenberg city, TX	182	4.0%
El Campo city, TX	149	3.3%
East Bernard city, TX	127	2.8%
Sugar Land city, TX	106	2.4%
Austin city, TX	78	1.7%
Bay City city, TX	61	1.4%
Victoria city, TX	52	1.2%
San Antonio city, TX	50	1.1%
All Other Locations	1,868	41.6%

Jobs Counts by Places (Cities, CDPs, etc.) Where Workers Live - Primary Jobs

	2015 Count	2015 Share
All Places (Cities, CDPs, etc.)	4,252	100.0%
Wharton city, TX	878	20.6%
Houston city, TX	249	5.9%
El Campo city, TX	235	5.5%
Bay City city, TX	101	2.4%
Rosenberg city, TX	88	2.1%
Boling CDP, TX	61	1.4%
Sugar Land city, TX	50	1.2%
Victoria city, TX	49	1.2%
East Bernard city, TX	46	1.1%
Missouri City city, TX	43	1.0%
All Other Locations	2,452	57.7%

Figure 10E: Location of Wharton Residents Employment

Skills

According to the US Census, 2012-2016 ACS data, approximately 44% of adults in Wharton work in professions that require high school completion, while 18% work in professions that typically require a bachelor's degree or higher. Occupations with high educational entry barriers usually require at least a college degree, while those with moderate educational barriers generally require a high school diploma, an associate degree from a two-year/technical college, or specialized coursework/certification. Occupations with low educational barriers do not require completion of high school. A lower percentage of workers in Wharton and Wharton County hold positions that require college degrees than in the state. The City has a higher percentage of workers in positions that require high-school completion, an associate's degree, specialized coursework, or other significant training to the state's percentage. Detailed occupation by education tables are located in *Appendix 9B*.

Table 10E: Workforce Education

	City	% of City	County	% of County	Texas	% of State
High Education	622	18%	4,893	27%	4,382,313	37%
Moderate Education	1,497	44%	6,971	38%	3,957,808	34%
Moderate-Low Education	651	19%	3,461	19%	1,371,380	12%
Low Education	630	19%	3,082	17%	1,980,651	17%
Total	3,400	100%	18,407	100%	11,692,152	100%

Source: Summarized from 2012-2016 American Community Survey, Table C24010

Wages & Unemployment

Overall, Wharton County employee wages are lower than the region and the State. Average wages in the Gulf Coast WDA are high as a result of the oil and gas industry, which has an average weekly wage of $3,281 for the region, as well as other industries related to the Mining, Quarrying, and Oil and Gas Extraction industry, such as Professional and Technical Services ($2,116). The oil and gas industry in the greater region also result in a low unemployment rate for the Gulf Coast WDA (5.3%), though the unemployment rate in Wharton County is even lower (5%). Both unemployment rates are slightly higher than the State at 4.6%.

Table 10F: Wages (4th Quarter 2016)

	Wharton County	Gulf Coast WDA	Texas
Average Weekly Wage (all industries)	$713	$1,239	$1,072

Source: Texas Workforce Commission, Tracer quarterly employment and wages

Table 10G: Unemployment (2015, 2016) [County]

Year	Area	Labor Force	Employment	Unemployment	Unemployment Rate
2015	State	13,044,089	12,463,031	581,058	4.5
2015	WDA	3,318,731	3,165,349	153,382	4.6
2015	Wharton County	21,164	20,229	935	4.4
2016	State	13,284,623	12,671,801	612,822	4.6
2016	WDA	3,358,990	3,182,436	176,554	5.3
2016	Wharton County	21,009	19,954	1,055	5.0

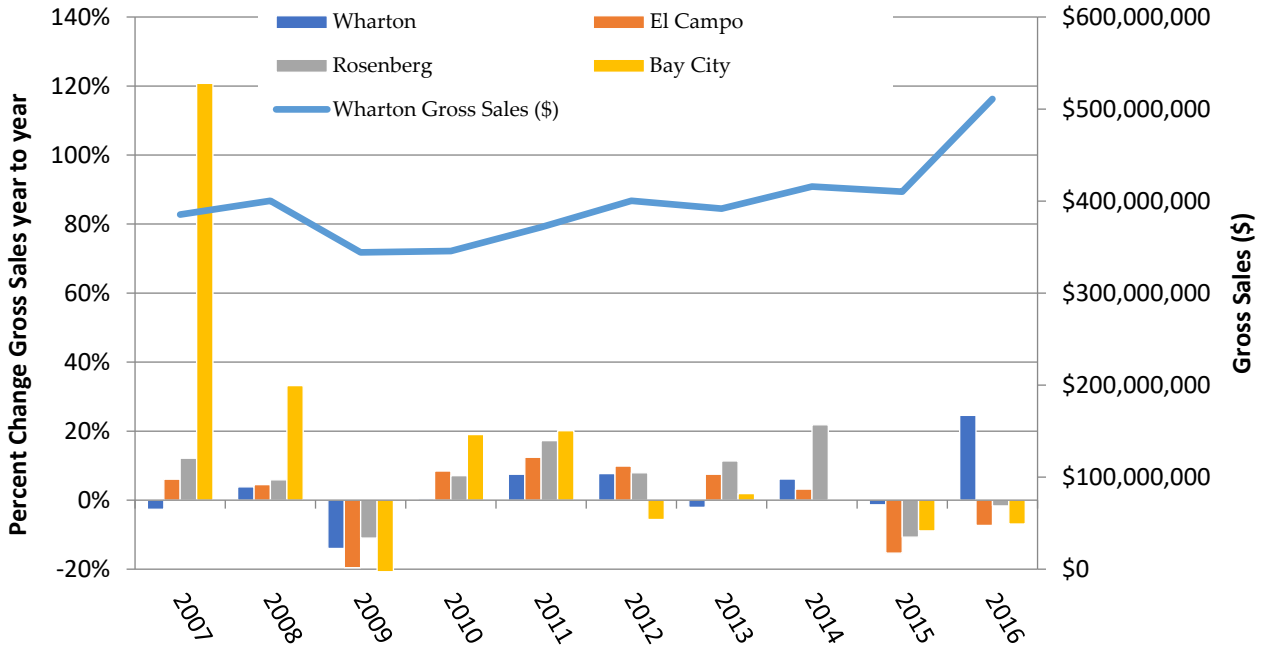
Source: Texas Workforce Commission, Civil Labor Force Employment (LAUS), 2015 vs. 2016

10.3.3 Regional Competitiveness

Sales Growth

Gross sales in Wharton increased from $385 million in 2007 ($446 million adjusted for inflation to 2016 dollars) to approximately $511 million in 2016. Since 2008, trends in Wharton's gross sales over the past decade have corresponded to the trends experienced by other cities in the county and region, though Wharton was the only city of those selected in *Chart 10C* to experience positive gross sales between 2015 and 2016. Accounting for inflation, Wharton experienced positive growth in gross sales (14.6%) between 2007 and 2016.

Chart 10C: Gross Sales Annual Growth (2007-2016) [County]



Source: Quarterly Sales Tax, Texas State Comptroller www.ourcpa.cpa.state.tx.us/allocation/HistSales.jsp

Specialization

As compared to the State and the U.S., Wharton County appears to have specializations in agriculture, forestry, fishing, and hunting; mining and oil and gas extraction; utilities; manufacturing; and retail trade.

Location quotients (LQ)[54] are used to detect the presence of an industry cluster. The calculation determines whether the local economy has a greater share of each industry than expected when compared to a reference economy. The Bureau of Labor Statistics determines share based on employment by industry. When an industry's LQ is less than 1.0, businesses/residents have a lesser share of employment than the comparison area. When the LQ is greater than 1.0, businesses/residents have a greater share of employment in that industry than the comparison area. The direction of change in an industry's LQ over time indicates whether that industry is growing in that location or declining. LQs greater than 1.0 are highlighted in *Table 9I*.

Table 10H: Industry Concentration

	2005		2010		2015	
Wharton County Employment Compared to:						
	TX	**U.S.**	**TX**	**U.S.**	**TX**	**U.S.**
Agriculture, forestry, fishing and hunting	22.45	12.38	23.15	12.31	20.50	11.40
Mining, quarrying, oil and gas extraction	1.76	9.06	2.13	8.99	2.84	11.84
Utilities	1.50	1.44	1.58	1.44	1.01	1.05
Construction	0.69	0.69	0.70	0.89	0.71	0.88
Manufacturing	1.45	0.96	1.29	1.00	1.45	1.20
Wholesale trade	0.95	1.05	1.00	1.11	0.80	0.93
Retail trade	1.33	1.21	1.39	1.27	1.34	1.29
Professional and technical services	0.65	0.73	0.66	0.73	0.94	1.02
Management of companies and enterprises	0.47	0.33	0.41	0.31	0.33	0.28
Administrative and waste services	0.79	0.72	0.96	0.90	0.70	0.71
Educational services	0.69	0.70	0.49	0.52	0.46	0.51
Healthcare and social assistance	0.26	0.27	0.29	0.28	0.23	0.22
Transportation and warehousing	0.00	0.00	0.00	0.00	0.00	0.00
Information	0.00	0.00	0.00	0.00	0.00	0.00

[54] The LQ is calculated by dividing the percentage of employees in an industry in the County by the percentage of employees in that industry in the larger regions. Data for small cities is not available for direct comparison.

Finance and insurance	0.00	0.00	0.07	0.05	0.20	0.13
Real estate and rental and leasing	0.00	0.00	0.97	0.83	0.98	0.84
Arts, entertainment, and recreation	0.43	0.32	0.43	0.30	0.61	0.43
Accommodation and food services	0.70	0.77	0.75	0.77	0.84	0.84
Other services, except public administration	1.07	0.85	0.92	0.69	0.81	0.70

Source: http://data.bis.gov/locatopm_quotient

Cost Factors

The following table lists basic costs that most companies consider when choosing where to open a facility. Companies will view each cost differently depending on their specific needs. Some costs are similar between Wharton, Wharton County, and State averages. Those that may deter businesses in Wharton include water, sewer, and land costs, while advantages include low electricity, fuel, and building costs.

Table 10I: Comparative Cost Factors

Factor	Wharton	Rating for a Business	Wharton County	Texas
Wage Levels	$713	Asset	$713	$1,072
Electricity Costs	$0.095/kWh	Asset	$0.095/kWh	$0.1127/kWh
Fuel Costs	$1.89	Asset	$2.02	$2.22
Water Rate (Commercial, $/50,000 gallons)	$214.69	Liability	$174.42	$300.86 [1]
Sewer Rate (Commercial, $/50,000 gallons)	$240.54	Liability	$225.08	$188.32
Garbage Rate (Commercial, per cart)	$25.67		NA	NA
Building Costs [2]	$143,006	Asset	$143,006	$150,951
Land costs (median price per acre) [3]	$3,800	Liability	$3,800	$2,531
Local Property Taxes [4]	0.42%	Similar	0.38%	0.46%
Financing Costs [5]	4.9	Similar	4.9	5.56

[1] Average for Texas cities under 5,000-10,000 population (TML Survey, 2017)
[2] Derived from national price per square foot data from RSMeans cost plus air conditioning cost multiplied by the location factor. Priced based on a 2,000-square-foot home. County and city price used BRYAN location factor. Texas price is average of Texas cities listed.
[3] 2016 Texas rural land prices for Gulf Coast-Brazos Bottom Region from Real Estate Center of Texas A&M University
[4] County rate is average of cites in county. State rate is range for the largest 10 cities.
[6] Percentages are not interest rates charged; they are the amount of profit banks report on loans as an indicator of interest rate charges.

Sources include Texas Workforce Commission TRACER data (2017 Q2); RSMeans Building Construction Cost Data (2013); U.S. Bureau of the Census, Construction Reports, Series C-25, New One Family Homes Sold and For Sale; Texas Municipal League Annual Water and Wastewater Surveys (2017); Texas Comptroller's Office Biennial Property Tax Report (2015); Real Estate Center at Texas A&M University Rural Land Prices for Gul Coast-Brazos Bottom (LMA 20) (2017); Uniform Performance Reports, Federal Financial Institutions Examinations Council (FFIEC)(07.2017)

Operating Factors

The following table lists data that can impact the ability of businesses to operate. The "Rating" column indicates Wharton's relative advantage/disadvantage under each factor compared with the county and state. The City can boast higher high school graduation rates, low per capita school costs, and post-High School level education. Its liabilities include higher levels of unskilled labor and lower levels of skilled labor than the state and lower productivity than the state. Other factors are similar to neighboring cities in the County and other areas around the state.

Table 10J: Local Operating Condition Factors

Factor	Wharton	Rating for a Business	Wharton County	Texas
Workforce				
Unskilled Labor [1]	38%	Liability	36%	27%
Skilled Labor [2]	62%	Liability	64%	73%
Productivity (avg annual sales growth 2006-2016) [3]	3%	Liability	8%	5%
HS Graduation Rate [4]	95%	Asset	90%	89%
Unionization [5]	6%	Similar	5%	4%
Transportation				
Motor carrier operators [6]	66	Asset	151	Variable
Rail/Freight service (closest shipping yard)	Wharton	Similar	Wharton/El Campo	Variable
Air service	Wharton Regional Airport	Similar	Wharton Regional Airport	D/FW Int'l Airport
Existing Facilities				
Site Availability	22% of land in City undeveloped	Similar	Variable	Variable
Medical Services [7]	Multiple	Similar	Multiple	75% of counties have at least 1 hospital

School District per Pupil Expenditure [8]	$9,671	Asset	$9,671	$12,264
Post-HS Education	Wharton County Junior College	Liability	Wharton County Junior College	Variable
Natural Resources				
	agribusiness	Liability	agribusiness	Variable
Non-Competitive Factors				
Electric Power	Readily Available	Similar	Readily Available	Readily Available
Water/Sewer Capacity	Readily Available	Similar	Readily Available	Variable
Gas availability	Readily Available	Similar	Readily Available	Readily Available

[1] From 2012-2016 American Community Survey, Table C24010. Includes food prep, maintenance, and similar occupations.
[2] From 2012-2016 American Community Survey, Table C24010. Includes professional occupations.
[3] Gross sales; www.texasahead.org
[4] From 2016-2017 TEA report: http://www.tea.state.tx.us/
[5] From www.bls.gov and 2012-2016 American Community Survey, Table C24030
[6] See www.txdmv.gov/motor_carrier/records_tracking.htm
[7] Texas Department of State Health Services, Texas Hospital List (2016)
[8] http://txsmartschools.org/results/downloads.php

10.4 Key Economic Development Strategies

Based on the community input and local economic development data described above, the City of Wharton and its residents should focus on the following key issues related to economic development. *Chapter 14: Funding Sources* has detailed information on grant and loan agencies and programs available to assist with economic development projects. Local and regional resources that provide economic development support services related to the recommendations in this section can be found in *Appendix 10D*.

10.4.1 Continue to Enhance Marketing Efforts

City officials involved in economic development can do at least two things to market themselves to prospective businesses and tourists. These include: develop a clear "brand" based on a unique aspect that Wharton wants to promote; and participate in regional economic development and tourism initiatives to ensure Wharton continues to be in future plans and to keep city officials abreast of programs and financing opportunities related to economic development.

Strengthen the City's Brand

One of the most basic marketing tools a town has at its disposal is its identity, or "flavor." Once clearly defined, a town's strongest identifying characteristics can become the centerpiece of an economic development plan and be used to attract businesses and residents and build community pride. The easiest place to start is with current businesses, icons, and landmarks that are a part of Wharton's history and economy.

Several murals located throughout Wharton showcase this very history. These include murals highlighting notable residents, cultural history, and depictions of the city's agricultural roots.

Figure 10F: Wharton's Many Murals

A city's brand can take the form of a logo or a motto and can be used to define and sell the city and its activities to potential investors/residents as well as to build city pride. Wharton's motto, "Gateway to the Texas Gulf Coast", is located on the City's website and on a sign at the city limits on S. Richmond Avenue.

Figure 10G: Welcome to Wharton

When developing a brand and a town motto it is important to focus on the aspects of the city that are actually part of the city – things that exist within the city that visitors and residents can see or interact with. Cities that label themselves as "Gateways" to other places are not inviting people to visit the home cities themselves, but rather to that place to which the home city is a gateway. While Wharton is indeed less than an hour from the gulf coast, it does not have a coastal feel nor can it boast any sort of coastal amenities. In addition, there are several other Texas cities that use the phrase "Gateway to the Gulf Coast."

To develop an effective motto, residents of Wharton need to reflect on the City's history, its current assets, and its desired future in order to reflect something unique and attractive about the City. The City's history of multiculturalism and diversity is noteworthy and reflected in several of the murals around town; the location along the Colorado River is an asset not to be ignored; and the cultural and artistic history of the City is something that not only speaks to the past but could also inform the future.

Wharton's many murals are an important asset that could be used to draw both tourists and potential artists to town. A "Wharton, City of Murals," motto might attract people looking for a day trip from the Houston metro area. Plaques could be erected next to the murals describing the artist, artwork, and its historical significance, while the Chamber of Commerce or Historical Society could organize tours based on the murals. The City could work with the ISD and Junior College to attract young artists to create new murals and engage residents on ideas for those murals.

Whatever the City decides on, once that motto is developed it should appear on an updated website, on signs, at annual events, in partner organizations' materials when demonstrating city support, and in marketing materials. City events can also be tweaked to support the image the city wants to project; for extreme examples, think of Christmas Town USA (www.mcadenville-christmastown.com) and the Bavarian Village of Leavenworth, WA (www.leavenworth.org). Wharton could take a literal approach to strengthening their brand by decorating the downtown commercial area with twinkling lights along store fronts. Also, city ordinances can be used to support the city's marketing/branding goals.

The City of Wharton can also build its brand by installing wayfinding and wayshowing signage; Wayfinding signage attract potential travelers and wayshowing signage indicates how to get to a specific location. Such signage provides a public convenience and public safety, elevates Wharton's marketability as a tourism destination, and elevates the products, attractions, and services that make Wharton unique. In addition to aesthetic improvements (see *Chapter 9 Thoroughfares Study*), signage could be placed on key thoroughtfares like US 59 and FM 102 to enhance Wharton's visibility as an attractive tourist destination.

Kansas Sampler Foundation (http://kansassampler.org/rce/), a rural community development organization in Kansas, Center for Rural Affairs (http://www.cfra.org), and rural economic development specialist Jack Shultz's *Boomtown USA: The 7 ½ Keys to Big Success in Small Towns* book, provide strategies for building and strengthening a city's brand.

Increase Regional Presence & Collaboration

A number of local, neighboring, and regional organizations focus on economic development. Building relationships with those organizations would simplify basic marketing activities such as:

- Ensuring that the City, EDC, and Chamber of Commerce websites are linked to each other and the websites of related organizations, including the Houston-Galveston Area Council and the Texas Independence Trail Region. The City of Wharton should also erect signage on key throughfares that identifies the city as a stop on the Texas Independence Trail to increase visibility and attact visitors.

- Publicizing information about Wharton tourism and events in neighboring cities such as El Campo, Bay City, and Houston.

- Consider membership in the GO TEXAN Rural Community Program for increased internet marketing opportunities and other economic development resources.
- Stronger presence on Texas Historical Commissions' Texas Independence Trail website by adding a more detailed history of the city, including a description of attractions beyond the County Courthouse, such as the many buildings on the national historic register, and posting upcoming events.
- Continued Participation by Wharton officials at Gulf Coast Economic Development District meetings.
- Coordination of training for "first responders," retail employees on primary thoroughfares who provide information to visitors.

The City should focus collaborative efforts with Gulf Coast Economic Development District, Wharton County Chamber of Commerce, GO TEXAN Rural Community Program, and the Texas Historic Commission Heritage Trails Program. Contact information for these organizations is located in *Appendix 10D*.

10.4.2 Focus on Business Growth & Recruitment

Three common business and job growth strategies form the basis of an economic development plan: existing company growth, start-up companies, and company recruitment. In general, enabling local entrepreneurship and helping existing companies expand is considered more productive for local economic development in rural America than "smokestack chasing."[55] Statistically speaking, "there are literally thousands of communities involved in industry attraction, yet fewer than 200 major plant relocations occur annually."[56]

When compared to building a business park, creating tax incentives, and competing with other towns in marketing campaigns, it is more cost-effective for a community to foster opportunities for existing and home-grown businesses than it is for a community to devote resources to attracting new businesses. Nevertheless, many of the activities that support existing and start-up businesses will also encourage out-of-town companies to consider relocating, and there are specific actions that cities can take to lower barriers to relocation.

Existing Business Support

Retaining existing businesses is relatively straightforward, because such businesses usually have vested interests in the community. However, with other localities actively recruiting successful

[55] Kotval, Z., J. Mullin, and K. Payne. 1996. *Business Attraction and Retention: Local Economic Development Efforts*. International City/County Management Association, Washington, D.C.
[56] Cothran, H.M. "Business Retention and Expansion (BRE) Programs: Why Existing Businesses Are Important". (included in Digital Appendix, and online at http://edis.ifas.ufl.edu/pdffiles/FE/FE65100.pdf)

companies, businesses do not always have the incentive to remain in a town that does not support their interests. The City's Economic Development Corporation (EDC) engages in several ongoing activities to support existing businesses including:

- Acting as a clearinghouse for information related to existing resources
- Providing grant funds and
- Helping with expedited permitting

In addition to the above activities, the city could further support existing businesses by:

a) Asking businesses what they need. Schedule an annual informal meeting with each local employer to express appreciation for their presence; determine whether infrastructure facilities adequately support existing business operations; and learn of any planned expansions that will require city infrastructure improvements. Alternatively, hold a business appreciation summit or other event to create an ongoing dialogue on future improvements and business strategies.

b) Investing in infrastructure that contributes to residents' quality of life. Beyond basic infrastructure maintenance, gaining businesses' input on investments they believe would make their employee's lives better can increase community buy-in to public expenditures, make it easier for companies to retain a skilled workforce, and create opportunities for public-private partnerships.

c) Prioritizing marketing and tourism efforts. Happy visitors lead to more customers and more residents.

d) Considering a "Buy Local" campaign.[57] Often started by or with the support of a city, such campaigns can help residents understand the importance of shopping at home. Dollars spent at local businesses provide a larger return through taxes, payroll, and other expenditures than do dollars spent at national chains or online at businesses outside the city or region.

Many rural communities lose businesses through owner retirement. Building stronger connections between generations through high school entrepreneurship clubs, mentoring programs, and organized systems for connecting business owners with younger generations can: provide employers with more focused employees, give students specific education goals, provide businesses with the employees they need to expand, give Wharton residents reasons to remain in or return to the community, and create a new generation of entrepreneurs able to take over from retirees.

[57] For more information on starting buy local campaigns, see www.the350project.net/home.html

The HomeTown Competitiveness Approach is an example of a model for existing business growth and youth engagement that has been successful for many small towns. The HomeTown Competitiveness Approach highlights youth engagement and existing business growth through a series of collaborative task forces. One of the key components to the approach is its "come-back/give-back mentality" that focuses on cultivating opportunities to encourage and enable younger generations to return to their hometown. Information on the Hometown Competitiveness Approach is located in *Appendix 10C*.

Entrepreneurial Support

Often rural towns are dependent on one or two companies. That can be detrimental to the town if those companies close or shift operations. Supporting local entrepreneurship (start-ups) gives local economies greater flexibility and residents more choice about how to live. Entrepreneurial support generally involves:

- Public infrastructure investment, especially in telecommunications
- The creation of temporary office space (incubator facilities)
- Programs that defray rents, taxes or other start-up expenses
- Start-up capital such as access to micro loan sources

New business owners are also much more likely to succeed if they have access to supportive business groups, mentors, and other entrepreneurs. While cities can provide infrastructure and financial assistance to start-ups, the long-term success of entrepreneurs will depend on local business leadership.[58]

The Wharton EDC currently supports entrepreneurs through tax incentives, grants, and expedited plan review and permitting. In addition, the EDC provides listings of available space to locate businesses and mapping applications to identify assets and access current infrastructure via geographic information systems.

In addition to its existing activities, the EDC could start a revolving loan fund with help from the US Department of Agriculture (https://www.rd.usda.gov/programs-services/rural-business-development-grants). USDA funds may be used to capitalize a revolving loan fund that could support entrepreneurs through site acquisition, development, rehabilitation, or purchase of equipment.

[58] See Startup America Partnership, a company focused on aggregating information on and providing support for entrepreneurship in the U.S.: www.startupamericapartnership.org/entrepreneurial-communities-must-be-led-entrepreneurs

Company Recruitment

Existing businesses often determine what businesses might be interested in moving to an area. Companies to target should include those that:

- Supply raw materials/input products to existing businesses;
- Use existing businesses' waste and by-products; and
- Package and transport locally produced goods.

This strategy is often referred to as clustering, building business around existing business. Educational institutions, including college systems and small business development centers, often work with industry to supply workforce training and to assist with the attraction and creation of companies that expand existing industry clusters. *Table 10K* lists the top clusters in Wharton County. The data suggests that Wharton could capitalize on the County's strengths by supporting the growth of businesses active in the following industries:

Table 10K: Top Wharton County Clusters (2015)

	Texas	U.S.
NAICS 11 Agriculture, forestry, fishing and hunting	20.50	11.40
NAICS 21 Mining, quarrying, and oil and gas extraction	2.84	11847
NAICS 31-33 Manufacturing	1.45	1.20
NAICS 44-45 Retail trade	1.34	1.29

Source: http://data.bis.gov/location_quotient

Also, surveying existing businesses would provide additional information for targeted economic development plans. A survey should ask Wharton area businesses:

a) what supplies they purchase to run their business;

b) what goods customers ask for that they don't sell;

c) what goods they would like to buy for their businesses but can't easily access;

d) how and where they are transporting products; and

e) what types of skills their workers need.

That data would provide area schools the information they need to plan classes that would place students into jobs; provide residents thinking about starting up businesses with ideas for what is needed; and provide companies interested in the area with information about existing market opportunities.

Rural Outsourcing

The U.S. business community is beginning to recognize rural America as a valuable resource for affordable labor. "Rural outsourcing" is the term for outsourcing work to rural communities in the U.S. as opposed to overseas developing countries. From the perspective of a community like Wharton, this trend is valuable because adding nation-wide employers to the local economy: provides a buffer against the risks of relatively undiversified local industry; enables residents to remain in the community; and provides higher-paying jobs. In order to capitalize on the trend, the City/EDC should support enhanced local telecommunications infrastructure and publicize information like commercial real estate availability to companies that manage rural outsourcing. Most of those companies focus on information technology, but some also provide services such as marketing, design, and business analysis. Examples of rural outsourcing companies include: www.ruralsourcing.com, www.cross-usa.com, and www.onshoretechnology.com.

Agritourism

One of the most rapidly developing sectors of the tourism industry is agritourism, which gives tourists the opportunity to see, participate in, and/or stay at working farms. Agritourism operations can range from "harvest your own fruit" afternoons to horseback riding – bed and breakfast weekends. In Wharton, agritourism could be centered on pecan orchards and cattle ranching. Texas A&M provides information about agritourism on its website at http://naturetourism.tamu.edu/, and Fredericksburg provides a good example of a community whose farmers have capitalized on the trend www.fredericksburgtexas-online.com/Agritourism.

Resources for Business Growth & Recruitment

Several local, regional, and state organizations work on business growth and recruitment efforts. An overview of organizations and programs that can assist the City with sharpening their recruitment skills is located in *Appendix 10D*.

10.4.3 Prioritize Quality of Life Improvements that Promote Economic Growth

Quality of life aspects of the community can play a tremendous role in attracting companies to an area, retaining businesses, increasing property values, and enabling a city to market itself to tourists, businesses, and prospective residents. For all of those reasons, Wharton should continue to invest in activities that improve housing, city infrastructure systems, local parks, and central business district features such as walkable streets and small businesses. The following summarizes key activities related to quality of life improvements found throughout the plan that most heavily impact economic development.

Housing

Business owners seeking a place to locate often look for communities that have adequate housing options for employees. There are 56 vacant, dilapidated homes within the City Limits, located throughout the central city. The prevalence of dilapidated homes is a primary concern of residents and is also a deterrent to attracting new business. The City has begun to take a proactive stance in addressing dilapidated housing by planning to utilize Hurricane Harvey recovery funds to demolish or repair affected housing. In addition to this, the City should: continue to apply for HOME grant funding; continue to enforce existing ordinances related to substandard buildings; and provide homeowner education of local and regional housing assistance grant/loan programs. In depth discussions of strategies for substandard housing and structure removal or rehabilitation are located in *Chapter 3: Housing Study.*

In addition, the City should reach out to developers in the region and land-owners within the city to encourage new housing development on semi-developed land within the city limits.

Infrastructure Systems

Maintaining reliable infrastructure systems is a key component to economic development. Businesses and residents look for communities with dependable water and sewer systems and well-maintained city streets and drainage features. *Chapter 5: Water Supply & Distribution Study* through *Chapter 8: Street System Study* outline improvement projects and estimated costs for those infrastructure systems.

Park Frontage

One of the City's main assets (and disadvantages) is its location on the banks of the Colorado River. While access to the river itself is currently infeasible, Riverfront Park serves as the gateway between the built-environment of the City and the natural world below. However, at present the park itself needs substantial improvements, both to its man-made amenities and to its natural character. In addition, the City should take advantage of the views afforded by the river and work to increase pedestrian-friendly commercial development along the north side of Elm Street. Locating restaurants, pubs, and other businesses that allow patrons to enjoy the atmosphere provided by the river will help create a strong identity for the city, and draw tourists and locals alike. *Chapter 12: Central Business District Study* describes this strategy in detail.

Resources for Quality of Life Improvements

Several local, regional, and state organizations work toward improving quality of life amenities that impact economic development. An overview of local and regional organizations and programs is located in *Appendix 10D* and a comprehensive summary of grant opportunities can be found in *Chapter 14: Funding Sources.*

10.4.4 Make Wharton More of a College Town

Wharton County Junior College, a two-year college, held its first classes in 1946 and opened its first dedicated facilities after voters approved a $600,000 bond for construction and friends of the college donated a 20-acre site in 1948. The system currently serves roughly 7,000 students, the majority of whom are part-time and roughly half of whom are over 20 years old. Over three-quarters of the students are from outside of the taxing district. While the system has four campuses in the region, the Wharton campus was the first and remains the flagship of the system.[59]

In public workshops and in the online survey residents of Wharton expressed a desire to make Wharton more of a college town. The presence of the Wharton County Junior College is a great first step in accomplishing this goal. To increase the presence of college students in the city and to increase the role that the college plays in the economic and social life of Wharton, the City should focus on the following areas.

[59] https://www.wcjc.edu/About-Us/administration/offices/institutional-research/documents/Student-Demographics-Fall.pdf

Student Housing

Currently, the Wharton campus provides dormitory rooms for 158 students, while there are approximately 1,400 students enrolled at the campus (Spring 2018). Additional student housing would serve the students of the junior college by providing decent housing, in addition to encouraging those students to live within Wharton, helping to create more of a student district near the campus, and enabling businesses to locate in or near that district to cater to those students.

Encourage Wharton County Junior College to Offer Bachelor Degrees

Another way to expand the allure of the college is to begin offering Bachelor's Degrees. In the 2017 Texas legislative session, lawmakers approved a bill to allow junior and community colleges to offer bachelor's degrees in applied science, applied technology, and nursing. These are fields in which Wharton County Junior College already provides associates degrees. By offering four-year degrees Wharton County Junior College could expand the pool of interested students and increase the time they spent at the school.

In addition, the previously mentioned degree areas are ones in which there are job opportunities within Wharton. This opens up opportunities for increased apprenticeships and internships for students, adding another incentive to attend school in Wharton and stay.

While the decision to expand into four-year degrees would be one the Junior College would have to make, the City can play a role by holding talks with the College to encourage them to expand and offering institutional support as the College seeks approvals to do so.

Apprenticeships/Internships

The City/EDC can also help to serve as a conduit between the College and local businesses by serving a clearinghouse for job opportunities, apprenticeships, and internships for local businesses looking to hire current and recent students. The City/EDC could also work with local businesses to establish apprenticeships/internships with preferential hiring given to students at the Junior College.

Align Course Offerings with Local Business Needs

The City can also work with the Junior College and the local Workforce Development Board to align the course offerings at the school with the existing job needs in the area. Currently, the school does have several areas of focus that could serve the local economy; however additional vocational offerings in building sciences could be offered to fill the gap in qualified general contractors in Wharton.

10.4.5 Continue to Invest in Downtown

Downtown Improvements

The physical appearance and amenities of Wharton's downtown have a direct fiscal impact on property values and retail sales as well as indirect impacts on residents' sense of pride and community belonging. Working with residents and property owners to identify a set of voluntary or mandatory design guidelines that convey a sense of community investment and cooperation will contribute to economic development. Specific strategies for improving the appearance and functionality of the downtown area can be found in *Chapter 12: Central Business District Study.*

In addition to downtown appearance and functionality, creating a "lively" downtown area attracts visitors and new businesses to this part of town. Like many small communities, Wharton has several commercial storefronts that are either vacant or closed in the downtown area. Many communities have been successful in energizing vacant storefronts with community or school art exhibits or other installations. Wharton city officials and other community groups should work with property owners of vacant commercial buildings to use these spaces for community engagement and promotion.

10.5 Implementation Plan

The Implementation Plan organizes the action items recommended to address each issue identified in the above sections into a timeline for completion. The actions are prioritized and organized by date.

Table 10L: Implementation Plan: 2018 – 2028

Goals & Objectives	Activity Year(s)			Lead Organization	Cost Estimate	Funding Sources
	2018-2021	2022-2024	2025-2028			
Goal 10.1 *Wharton markets itself as an attractive place to visit, live, and work*						
Contact Texas Independence Trail Region organization to add additional information about Wharton to website	X			City, EDC	Staff	GEN, EDC
Update Wharton's "brand" and use it in City publications, signage, downtown amenities and websites. Select a narrow focus for the brand.	X			City, Chamber	Volunteers, appointed committee, students	GEN, Local
Identify and train "First Responders" in downtown area to serve as an information point for visitors	X	X		EDC	Staff/Volunteers	EDC, Chamber, Local
Continue to update EDC and City websites to include current figures, pictures, and other information related to economic development	X	X	X	City, EDC	Staff/ Volunteers	GEN, EDC
Continue to market available downtown buildings on City and EDC websites	X	X	X	City, EDC	Staff/ Volunteers	GEN, EDC
Coordinate with regional organizations to advertise local events and festivals and consider membership in the GO TEXAN Rural Community Program	X	X	X	EDC	Staff/ Volunteers $150 biennial (GO TEXAN Program)	GEN, EDC
Work with ISD students to create new murals around the city	X	X	X	City, ISD	Staff	GEN

Goal 10.2 *Wharton has a support system for existing businesses, resources for business startup/recruitment, and information readily available on the local economy*						
Create a "resource center" in City Hall that supplies information about the Houston-Galveston Area workforce solutions, the Small Business Development Center, and the Prospect Kit (can also include housing resource information)	X			City	Staff/ Volunteers	GEN
Launch a "Buy Local" campaign to raise the profile of local businesses (reference "how to" document in Digital Appendix)		X	X	City, Chamber, EDC	Staff	GEN, EDC, Chamber
Maintain website with resource information for residents, business owners, and potential investors including job training organizations, small business financing opportunities, and "prospect kit"	X	X	X	City, EDC	Staff/ Volunteers	GEN, EDC
Create revolving loan program	X	X	X	EDC	Variable	EDC, USDA-RD
Continue EDC business support	X	X	X	EDC	Staff	EDC
Survey local businesses annually about City services and general business needs	X	X	X	EDC	Staff	EDC
Host annual "business appreciation" breakfast or lunch for area companies	X	X	X	EDC	$250, Staff	GEN, EDC
Prioritize capital improvements for infrastructure throughout the planning period	X	X	X	City	$1.5 million (Annual average)	Various
Goal 10.3 *Wharton's facilities are attractive and functional and improve the quality of life for residents and businesses*						
Prioritize capital improvements for infrastructure throughout the planning period	X	X	X	City	$1.5 million (Annual average)	Various
Implement strategies in *Chapter 3: Housing Study* that address dilapidated	X	X	X	City	Variable	See chapter

housing along the main thoroughfares						
Implement strategies in *Chapter 4: Land Use Study*	X	X	X	City	Variable	See chapter
Implement strategies in *Chapter 11: Recreation & Open Space Study*	X	X	X	City	Variable	See chapter
Goal 10.4 *Wharton becomes more of a college town*						
Invest in new student housing	X	X	X	WCJC, City	Variable	WCJC, GEN
Offer bachelors degrees at Wharton County Junior Collect (WCJC)	X	X	X	WCJC	Variable	WCJC
Connect college students to local business owners/managers through a mentoring or internship program	X	X	X	EDC, WCJC	Staffs	EDC, WCJC
Encourage WCJC to add vocational course offerings in needed job fields	X	X	X	WCJC, City	Staff	WCJC
Goal 10.5 *Wharton's downtown is a vital and thriving economic engine for the city*						
Coordinate with residents, ISD, and property owners of vacant commercial storefronts to implement an "Art in Storefronts" project to revitalize vacant buildings	X	X	X	City, ISD, EDC	Staff/ Volunteers	GEN, Local, EDC
Implement recommendations from *Chapter 12: Central Business District Study*	X	X	X	City, EDC	Variable	See chapter

GEN = Municipal funds; **County** = Wharton County; **EDC** = Wharton Economic Development Corporation, 4B Entity; **Local** = donations of time/money/goods from private citizens, charitable organizations, and local businesses; **H-GAC** = Houston-Galveston Area Council; **ISD** = Wharton Independent School District; **Staff** = Staff time (City); **TDA**= Texas Department of Agriculture funds including TxCDBG (Community Development Block Grant) and TCF (Texas Capital Funds); **TDHCA** = Texas Department of Housing and Community Affairs; **TxDOT =**Texas Department of Transportation Statewide Transportation Enhancements Grants; **USDA-RD**=United States Department of Agriculture Rural Development; **Utility** = City of Wharton water and wastewater utility fund; **WCJC** = Wharton County Junior College

FOR A FULL LIST OF STATE FUNDING SOURCES, SEE CHAPTER 14

10.6 Appendix 10A: Establishments by Industry (Detailed)

Table 10A.1: Detailed Establishments by Industry (2017)

Accommodation and Food Services	**92**	**15%**
Caterers	2	
Food Service Contractors	4	
Mobile Food Services	7	
Hotels (except Casino Hotels) and Motels	3	
Rooming and Boarding Houses, Dormitories, and Workers' Camps	56	
Limited-Service Restaurants	2	
Drinking Places (Alcoholic Beverages)	16	
All Other Traveler Accommodation	1	
Full-Service Restaurants	1	
Administrative and Support and Waste Management and Remediation Services	**19**	**3%**
Carpet and Upholstery Cleaning Services	1	
Exterminating and Pest Control Services	2	
Office Administrative Services	1	
Landscaping Services	4	
All Other Support Services	5	
Janitorial Services	2	
Solid Waste Landfill	1	
Other Services to Buildings and Dwellings	1	
All Other Travel Arrangement and Reservation Services	1	
All Other Business Support Services	1	
Agriculture, Forestry, Fishing and Hunting	**12**	**2%**
Horses and Other Equine Production	1	
Nursery and Tree Production	4	
All Other Miscellaneous Crop Farming	3	
Floriculture Production	1	
Soil Preparation, Planting, and Cultivating	1	
Hay Farming	2	
Arts, Entertainment, and Recreation	**13**	**2%**
Golf Courses and Country Clubs	1	
Theater Companies and Dinner Theaters	1	
Museums	1	
Independent Artists, Writers, and Performers	6	
All Other Amusement and Recreation Industries	1	
Fitness and Recreational Sports Centers	2	
Other Performing Arts Companies	1	
Construction	**26**	**4%**
All Other Specialty Trade Contractors	2	
Electrical Contractors and Other Wiring Installation Contractors	1	
Finish Carpentry Contractors	1	
Site Preparation Contractors	3	
Oil and Gas Pipeline and Related Structures Construction	1	
Plumbing, Heating, and Air-Conditioning Contractors	8	
Highway, Street, and Bridge Construction	2	

Masonry Contractors	1	
Other Building Equipment Contractors	2	
Water and Sewer Line and Related Structures Construction	2	
New Multifamily Housing Construction (except For-Sale Builders)	1	
Residential Remodelers	2	
Educational Services	**5**	**1%**
Educational Support Services	1	
Colleges, Universities, and Professional Schools	1	
Elementary and Secondary Schools	1	
Flight Training	2	
Finance and Insurance	**7**	**1%**
Consumer Lending	3	
Monetary Authorities-Central Bank	1	
Commercial Banking	2	
Mortgage and Nonmortgage Loan Brokers	1	
Health Care and Social Assistance	**10**	**2%**
Offices of Optometrists	2	
Kidney Dialysis Centers	1	
Other Individual and Family Services	1	
Community Food Services	1	
General Medical and Surgical Hospitals	2	
Offices of Physicians (except Mental Health Specialists)	1	
Specialty (except Psychiatric and Substance Abuse) Hospitals	1	
Continuing Care Retirement Communities	1	
Information	**8**	**1%**
Cable and Other Subscription Programming	4	
Data Processing, Hosting, and Related Services	2	
Book Publishers	2	
Manufacturing	**24**	**4%**
Ready-Mix Concrete Manufacturing	1	
Sign Manufacturing	3	
Sporting and Athletic Goods Manufacturing	4	
Wood Container and Pallet Manufacturing	1	
Soft Drink Manufacturing	1	
Plastics Packaging Film and Sheet (including Laminated) Manufacturing	1	
Industrial Mold Manufacturing	1	
All Other Miscellaneous Chemical Product and Preparation Manufacturing	1	
Non-upholstered Wood Household Furniture Manufacturing	1	
All Other Converted Paper Product Manufacturing	1	
Pottery, Ceramics, and Plumbing Fixture Manufacturing	1	
Coffee and Tea Manufacturing	1	
Commercial Bakeries	1	
Tire Retreading	1	
Cut and Sew Apparel Contractors	1	
Other Cut and Sew Apparel Manufacturing	1	
Apparel Accessories and Other Apparel Manufacturing	2	
All Other Miscellaneous Manufacturing	1	

Mining, Quarrying, and Oil and Gas Extraction	**1**	**0%**
Support Activities for Oil and Gas Operations	1	
Other Services (except Public Administration)	**67**	**11%**
Re-upholstery and Furniture Repair	2	
Beauty Salons	9	
Commercial and Industrial Machinery and Equipment (except Automotive and Electronic) Repair and Maintenance	8	
Home and Garden Equipment Repair and Maintenance	1	
Appliance Repair and Maintenance	3	
Cemeteries and Crematories	1	
Funeral Homes and Funeral Services	2	
Dry-cleaning and Laundry Services (except Coin-Operated)	3	
General Automotive Repair	12	
All Other Personal Services	2	
Computer and Office Machine Repair and Maintenance	4	
Other Personal and Household Goods Repair and Maintenance	3	
Automotive Body, Paint, and Interior Repair and Maintenance	4	
Other Electronic and Precision Equipment Repair and Maintenance	3	
Pet Care (except Veterinary) Services	2	
Religious Organizations	1	
Other Automotive Mechanical and Electrical Repair and Maintenance	1	
Other Personal Care Services	2	
Automotive Glass Replacement Shops	1	
Automotive Oil Change and Lubrication Shops	1	
All Other Automotive Repair and Maintenance	2	
Professional, Scientific, and Technical Services	**25**	**4%**
All Other Professional, Scientific, and Technical Services	1	
Interior Design Services	2	
Lessors of Nonfinancial Intangible Assets (except Copyrighted Works)	1	
Other Computer Related Services	1	
Other Specialized Design Services	1	
Graphic Design Services	3	
Surveying and Mapping (except Geophysical) Services	1	
Title Abstract and Settlement Offices	2	
Photography Studios, Portrait	11	
Administrative Management and General Management Consulting Services	1	
Veterinary Services	1	
Public Administration	**1**	**0%**
Courts	1	
Real Estate and Rental and Leasing	**11**	**2%**
Consumer Electronics and Appliances Rental	1	
General Rental Centers	3	
Other Commercial and Industrial Machinery and Equipment Rental and Leasing	2	
Construction, Mining, and Forestry Machinery and Equipment Rental and Leasing	1	
Lessors of Miniwarehouses and Self-Storage Units	1	
All Other Consumer Goods Rental	3	

Retail Trade	**269**	**43%**
Nursery, Garden Center, and Farm Supply Stores	4	
Pharmacies and Drug Stores	2	
Gasoline Stations with Convenience Stores	17	
All Other Miscellaneous Store Retailers (except Tobacco Stores)	25	
Automotive Parts and Accessories Stores	7	
News Dealers and Newsstands	7	
Supermarkets and Other Grocery (except Convenience) Stores	6	
Book Stores	1	
Paint and Wallpaper Stores	1	
Fuel Dealers	1	
Family Clothing Stores	7	
Shoe Stores	1	
All Other General Merchandise Stores	17	
Sporting Goods Stores	7	
Beer, Wine, and Liquor Stores	6	
New Car Dealers	3	
Confectionery and Nut Stores	1	
Furniture Stores	6	
Tire Dealers	6	
All Other Home Furnishings Stores	10	
Musical Instrument and Supplies Stores	3	
Gift, Novelty, and Souvenir Stores	23	
Women's Clothing Stores	7	
Used Merchandise Stores	15	
Convenience Stores	10	
Other Direct Selling Establishments	27	
Florists	7	
Jewelry Stores	4	
Other Gasoline Stations	1	
Hobby, Toy, and Game Stores	1	
Wholesale Trade Agents and Brokers	1	
Tobacco Stores	3	
Electronics Stores	1	
Children's and Infants' Clothing Stores	5	
All Other Health and Personal Care Stores	1	
Outdoor Power Equipment Stores	1	
Other Clothing Stores	1	
Used Car Dealers	3	
Electronic Shopping and Mail-Order Houses	6	
Luggage and Leather Goods Stores	1	
Other Building Material Dealers	2	
Clothing Accessories Stores	4	
Pet and Pet Supplies Stores	1	
Cosmetics, Beauty Supplies, and Perfume Stores	1	
Men's Clothing Stores	1	
Recreational Vehicle Dealers	1	
Art Dealers	1	

Motorcycle, ATV, and All Other Motor Vehicle Dealers	1	
Fruit and Vegetable Markets	1	
Transportation and Warehousing	**9**	**1%**
Other Support Activities for Air Transportation	1	
Other Warehousing and Storage	1	
Scenic and Sightseeing Transportation, Other	1	
Motor Vehicle Towing	2	
All Other Support Activities for Transportation	1	
General Freight Trucking, Local	2	
Special Needs Transportation	1	
Utilities	**1**	**0%**
Fossil Fuel Electric Power Generation	1	
Wholesale Trade	**28**	**4%**
Farm and Garden Machinery and Equipment Merchant Wholesalers	2	
Farm Supplies Merchant Wholesalers	2	
Lumber, Plywood, Millwork, and Wood Panel Merchant Wholesalers	1	
Petroleum Bulk Stations and Terminals	1	
Grain and Field Bean Merchant Wholesalers	1	
Confectionery Merchant Wholesalers	1	
Other Miscellaneous Durable Goods Merchant Wholesalers	3	
Other Electronic Parts and Equipment Merchant Wholesalers	1	
Refrigeration Equipment and Supplies Merchant Wholesalers	1	
Automobile and Other Motor Vehicle Merchant Wholesalers	1	
Other Farm Product Raw Material Merchant Wholesalers	1	
Other Miscellaneous Nondurable Goods Merchant Wholesalers	3	
Flower, Nursery Stock, and Florists' Supplies Merchant Wholesalers	3	
Tire and Tube Merchant Wholesalers	1	
Other Commercial Equipment Merchant Wholesalers	1	
Brick, Stone, and Related Construction Material Merchant Wholesalers	1	
Women's, Children's, and Infants' Clothing and Accessories Merchant Wholesalers	1	
Printing and Writing Paper Merchant Wholesalers	1	
Motor Vehicle Supplies and New Parts Merchant Wholesalers	1	
Jewelry, Watch, Precious Stone, and Precious Metal Merchant Wholesalers	1	
Grand Total	**628**	**100%**

Source: Texas State Comptroller's office, open records request (2017)

10.7 Appendix 10B: Occupation by Education Tables

Table 10B.1: Detailed Occupation by Education (2016) [City, County, Texas]

	Occupation	City	% of City Total	County	% of County Total	Texas	% of State Total
High Education	Management occupations	155	4.6%	1,733	9.4%	1,229,439	9.9%
	Business & financial operations occupations	70	2.1%	331	1.8%	590,208	4.8%
	Computer & mathematical occupations	15	0.4%	48	0.3%	325,478	2.6%
	Architecture & engineering occupations	17	0.5%	159	0.9%	248,228	2.0%
	Life, physical, & social science occupations	10	0.3%	77	0.4%	87,612	0.7%
	Community & social service occupations	22	0.6%	338	1.8%	168,855	1.4%
	Legal occupations	6	0.2%	96	0.5%	127,644	1.0%
	Education, training, & library occupations	177	5.2%	1,190	6.5%	773,473	6.3%
	Arts, design, entertainment, sports, & media occupations	27	0.8%	169	0.9%	194,469	1.6%
	Health diagnosing & treating practitioners & other technical occupations	79	2.3%	455	2.5%	418,201	3.4%
	Health technologists & technicians	44	1.3%	297	1.6%	218,706	1.8%
Moderate Education	Healthcare support occupations	167	4.9%	664	3.6%	280,331	2.3%
	Firefighting & prevention, & other protective service workers including supervisors	64	1.9%	105	0.6%	137,837	1.1%
	Law enforcement workers including supervisors	18	0.5%	360	2.0%	138,927	1.1%
	Personal care & service occupations	193	5.7%	601	3.3%	412,402	3.3%
	Sales & related occupations	371	10.9%	2,166	11.8%	1,369,993	11.1%
	Office & administrative support occupations	378	11.1%	1,718	9.3%	1,618,318	13.1%
	Production occupations	306	9.0%	1,357	7.4%	679,240	5.5%
Moderate - Low Education	Farming, fishing, & forestry occupations	103	3.0%	561	3.0%	58,329	0.5%
	Construction & extraction occupations	408	12.0%	1,939	10.5%	833,082	6.7%
	Transportation occupations	140	4.1%	961	5.2%	479,969	3.9%
Low Education	Food preparation & serving related occupations	127	3.7%	513	2.8%	702,106	5.7%
	Building & grounds cleaning & maintenance occupations	301	8.9%	1,156	6.3%	514,059	4.2%
	Installation, maintenance, & repair occupations	88	2.6%	870	4.7%	451,148	3.6%
	Material moving occupations	114	3.4%	543	2.9%	313,338	2.5%

Source: Summarized from 2012-2016 American Community Survey, Table C24010

Table 10B.2: Detailed Occupation by Gender (2016) [City]

	Occupation	Male	Female	Total	% Total
High Education	Management occupations	62	93	155	4.6%
	Business & financial operations occupations	6	64	70	2.1%
	Computer & mathematical occupations	15	0	15	0.4%
	Architecture & engineering occupations	17	0	17	0.5%
	Life, physical, & social science occupations	10	0	10	0.3%
	Community & social service occupations	4	18	22	0.6%
	Legal occupations	6	0	6	0.2%
	Education, training, & library occupations	29	148	177	5.2%
	Arts, design, entertainment, sports, & media occupations	27	0	27	0.8%
	Health diagnosing & treating practitioners & other technical occupations	0	79	79	2.3%
	Health technologists & technicians	0	44	44	1.3%
Moderate Education	Healthcare support occupations	43	124	167	4.9%
	Fire-fighting & prevention, & other protective service workers including supervisors	64	0	64	1.9%
	Law enforcement workers including supervisors	18	0	18	0.5%
	Personal care & service occupations	18	175	193	5.7%
	Sales & related occupations	144	227	371	10.9%
	Office & administrative support occupations	102	276	378	11.1%
	Production occupations	208	98	306	9.0%
Moderate - Low Education	Farming, fishing, & forestry occupations	56	47	103	3.0%
	Construction & extraction occupations	408	0	408	12.0%
	Transportation occupations	90	50	140	4.1%
Low Education	Food preparation & serving related occupations	48	79	127	3.7%
	Building & grounds cleaning & maintenance occupations	208	93	301	8.9%
	Installation, maintenance, & repair occupations	88	0	88	2.6%
	Material moving occupations	114	0	114	3.4%
	Total:	1,785	1,615	3,400	

Source: Summarized from 2012-2016 American Community Survey, Table C24010

10.8 Appendix 10C: HomeTown Competitiveness Approach

The HomeTown Competitiveness approach to rural community development emphasizes strong community involvement by creating interconnected committees and task forces centered around four pillars: Entrepreneurship, Charity (Transfer of Wealth), Youth Engagement, and Leadership. The pillars were specifically designed to deal with the four critical issues that are inhibiting rural America—the generational wealth transfer problem, the historical youth out-migration trend, the loss of farms and small businesses, and the erosion of leadership capacity. The approach is one of intense community involvement and so the types of people who lead the task forces need to be passionate, invested in community progress, and willing to work.

The primary objectives of each task force are summarized below:

- *Entrepreneurial Task Force*: Focuses on growing businesses within the community and expanding existing businesses. Develops strategies for producing increased entrepreneurial activity, fostering an entrepreneurial culture, and helping the community realize economic goals.
- *Charitable Assets Task Force*: Establishes a Community Affiliated Fund governed by a Fund Advisory Committee to capture the transfer of wealth from rural America to larger cities over generations. It accomplishes this by encouraging resident and business donations to the Fund.
- *Youth Task Force*: Mobilizes youth engagement and cross generational collaboration on community projects and assists youth in putting their ideas into action. The primary goal here is to encourage youth to return to their communities after college. The innovation center is a good resource for youth engagement (www.theinnovationcenter.org).
- *Leadership Task Force*: Cultivates leadership within the community through training and awareness to share leadership roles and smoothly transition leadership to new generations. There are two main leadership programs: "skill-based" emphasizes conflict management, and "civic-based" emphasizes learning detailed knowledge about the community to more effectively live/work in it.

These task forces work best when in collaboration with one another and in conjunction with an oversight committee. More information on the Home Town Competitiveness Approach and success stories can be found at http://htccommunity.org/.

10.9 Appendix 10D: Local & Regional Economic Development Resources

The following is a summary of local and regional technical and support resources available to the City of Wharton or residents of Wharton. In addition, *Chapter 14: Funding Sources* Provides a comprehensive list of specific grant information related to economic development.

Resources Currently Available/Active in Wharton

Wharton Economic Development Corporation: The Wharton Economic Development Corporation (EDC) is a 4B sales tax EDC, which allows funds to be used for a wide range of activities and purposes that pertain to economic development. The EDC is active in recruiting new businesses to the region as well as working with existing businesses to expand their operations

For more information on eligible fund usage, see the Texas Comptroller website (http://www.texasahead.org/tax_programs/typeab/).

Organization / Office:	Wharton Economic Development Commission
Contact:	Chad Odom, Executive Director
Address:	1944 North Fulton Street Wharton, Texas 77488
Phone / Email:	(979) 532-0999 / chad@whartonedc.com
Website:	www.whartonedc.com

Chambers of Commerce: The Wharton Chamber of Commerce & Agriculture is a non-profit corporation in the business of helping businesses do business. With some 350 members, the chamber has a wide spectrum of members with numerous products and services that are used locally, in our nation, nation and globe. The chamber, in addition to helping members, spends considerable effort promoting our town to visitors

Organization / Office:	Wharton Chamber of Commerce & Agriculture
Contact:	Ron Sanders, Executive Director
Address:	225 North Richmond Road Wharton, Texas 77488
Phone / Email:	(979) 532-1862 / admin@whartonchamber.com
Website:	www.whartonchamber.com

Houston-Galveston Area Council (H-GAC): H-GAC's mission is to serve as the instrument of local government cooperation, promoting the region's orderly development and the safety and welfare of its citizens. It encompasses a 13-county area.[60] H-GAC also houses the Gulf Coast Economic Development District which produces a Comprehensive Economic Development Strategy for the region every five years and provides technical and support services to local economic development efforts, including regional economic development corporations.

Organization / Office:	Houston-Galveston Area Council
Address:	3555 Timmons, Suite 120 Houston, Texas 77027
Phone / Email:	(13) 627-3200
Website:	www.h-gac.com

Wharton County AgriLife Extension: The Wharton County AgriLife Extension Service of Texas A&M University provides programs, tools, and resources that teach people how to improve agriculture and food production, advance health practices, protect the environment, strengthen our communities, and enrich youth. The County Extension offers free and low-cost educational programs and manages the 4-H programs in Wharton County.

Organization / Office:	Wharton County Office
Address:	315 East Milam Street Wharton, Texas 77488
Phone / Email:	(979) 532-3310
Website:	http://wharton.agrilife.org

Organizational Resources Available to the City

Texas Center for Rural Entrepreneurship (TCRE): TCRE is a non-profit corporation that seeks to provide educational and technical support to meet the needs of rural entrepreneurs and organizations supporting entrepreneurship in their communities. The main services provided through this organization pertain to small business development and funding and must be initiated by residents or businesses. However, TCRE does provide a number of free online courses to community economic development leaders such as "Developing Entrepreneur Ready Communities" and "Developing Diversified and Value-Added Agribusiness."

Organization / Office:	Texas Center for Rural Entrepreneurship
Contact:	Greg Clary, Chairman
Address:	3115 Fall Crest Drive San Antonio, Texas 78247
Phone / Email:	(903) 714-0232
Website:	www.tcre.org

[60] Service area includes: Austin, Brazoria, Chambers, Colorado, Fort Bend, Galveston, Harris, Liberty, Matagorda, Montgomery, Walker, Waller, and Wharton

Texas Independence Trail Region Heritage Trails Program: The Texas Independence Trail Region Heritage Trails program is a non-profit organization developed in conjunction with the Texas Historical Commission. The organization's mission is to develop the unique culture, heritage, and natural resources of the area to stimulate economic development. Several Wharton County cities are mentioned on the website including Wharton and El Campo. The Texas Independence Trail Region website provides several advertising opportunities for city events and amenities.

Organization / Office:	Texas Independence Trail Region Heritage Trails Program
Address:	2305 South Day Street; #208 Brenham, Texas 77833
Phone / Email:	(281) 239-9235
Website:	http://texasindependencetrail.comc.com

GO TEXAN Rural Community Program: The GO TEXAN Rural Community Program (RCP) is administered through the Texas Department of Agriculture and provides technical and financial assistance related to tourism and economic development to member cities and associate members (chambers of commerce, EDCs). Memberships are for two years and cost $150. Members receive emails and an info-letter discussing workshops and available resources for rural development. Members are also linked to the GO TEXAN website and its social media contacts, including a GO TEXAN App for iPhone which promotes restaurants, agricultural products and other retailers and services in member communities.

Contact:
Texas Department of Agriculture
877/99-GOTEX
website: http://www.gotexan.org/

GO TEXAN Certified Retirement Community Program: The GO TEXAN Certified Retirement Community Program (CRC) is designed to help Texas communities encourage retirees and potential retirees to make their homes in Texas communities by helping Texas communities market themselves as retirement locations; assisting in developing retirement and long-term living communities that attract retirees; encouraging tourism to Texas and promoting Texas as a retirement destination. The program application requires a $5,000 fee, a local sponsor/contact, and names of members of a Retirement Board. Information about the community application and other guidelines can be found on the CRC website: http://www.retireintexas.org/

Contact:
Texas Department of Agriculture
877/99-GOTEX
Website: http://www.retireintexas.org/

Organizational Resources Available to Residents/Business Owners

Texas Center for Rural Entrepreneurship (TCRE): TCRE is a non-profit corporation that seeks to provide educational and technical support to meet the needs of rural entrepreneurs and organizations supporting entrepreneurship in their communities. TCRE is a resource for residents seeks to start or grow small businesses in rural communities. The organization provides a number of educational resources including various "how-to" online courses and information about funding options, small business incubators, and Higher Education resources.

Organization / Office:	Texas Center for Rural Entrepreneurship (TCRE)
Contact:	Gary Clary, Chairman
Address:	3115 Fall Crest Drive
	San Antonio, Texas 78247
Phone / Email:	(903) 714-0232
Website:	www.tcre.org

Small Business Development Centers: The Coastal Plains Small Business Development Center (SBDC) housed at The University of Houston serves Wharton County. The SBDC offers general business advice, technical assistance, training, workshops, and reference resources free of charge to those wanting to start or expand a small business.

Organization / Office:	Small Business Development Center, Coastal Plains
Address:	1900 Fifth Street
	Bay City, Texas 77414
Phone / Email:	(979) 244-8466
Website:	www.coastalplains.sbdcnetwork.net

Workforce Solutions: This organization serves residents of Wharton County and is a part of the larger Texas Workforce System providing one-stop assistance to job seekers and employers in the region. Services include: labor market information, job training skills, youth services, career planning, childcare, and information or referral. The closest office is in located in Wharton.

Organization / Office:	Wharton Workforce Center
Address:	1506 North Alabama Road
	Wharton, Texas 77488
Phone / Email:	(979) 531-0730
Website:	www.worksolutions.com

11 Recreation & Open Space Study

Over the past 20 years, population growth in Texas has been accompanied by increases in obesity and natural disasters, as well as a decline in children's connection with nature as the state continues to urbanize. As a result, the State of Texas recognizes the importance of continued support for popular outdoor sports; amenities critical to the use of local parks such as pedestrian connections and safety features; and the strategic construction of park and open space features that will also reduce drainage infrastructure costs, support local economic development, and lead to better health for Texas residents.[61] ***In communities like Wharton recreation areas play a key role not only in the health of the individual but also in the health of the community. Parks and recreation areas provide pleasant places for family reunions, friendly competition, exercise, and socializing.***

To encourage healthy living, every city has the responsibility of providing adequate parks and open space. However, limited funds for these public uses generally require foresight in planning for future development and expansion of parks and public open spaces. To adequately plan for the future, it is important to understand the community's historical background and demographic profile. Several demographic and cultural factors contribute to increased demand for parks and recreational facilities in many Texas towns and cities (including Wharton): the increase in life expectancy coupled with earlier retirement ages for many people; the spread of competitive sporting programs to the youngest and oldest age groups; and the understanding that a healthy diet and regular exercise are good for mental and physical well-being.

This Parks Master Plan includes analysis that is based on survey responses as well as on the cultural and economic characteristics of Wharton's residents. The Parks Master Plan also analyzes the lack of facilities currently available in Wharton. Wharton has several parks with an array of recreation opportunities (detailed in *Section 11.5 Inventory & Assessment of Existing Resources)*. However, residents do not have sufficient access to several recreational opportunities that allow for quality leisure time pursuits or activities which lead to a healthy lifestyle. For example, residents do not have access to sufficient sports-related facilities, such as general use/soccer fields, and passive recreation facilities, such as picnic tables and light activity areas. Wharton residents and visitors would also benefit from expanding the city's trails network and further developing the area around the Colorado River as a public amenity.

[61] T*exas Outdoor Recreation Plan (2012)*

11.1 Introduction

The city of Wharton is located at the intersection of US 59 and SH 60, approximately 57 miles southwest of Houston, in the Houston-Galveston Area Council (H-GAC) region.[62] Incorporated in 1902, Wharton is a home rule city[63] with a mayor-council form of government. The city of Wharton is also the county seat of Wharton County.

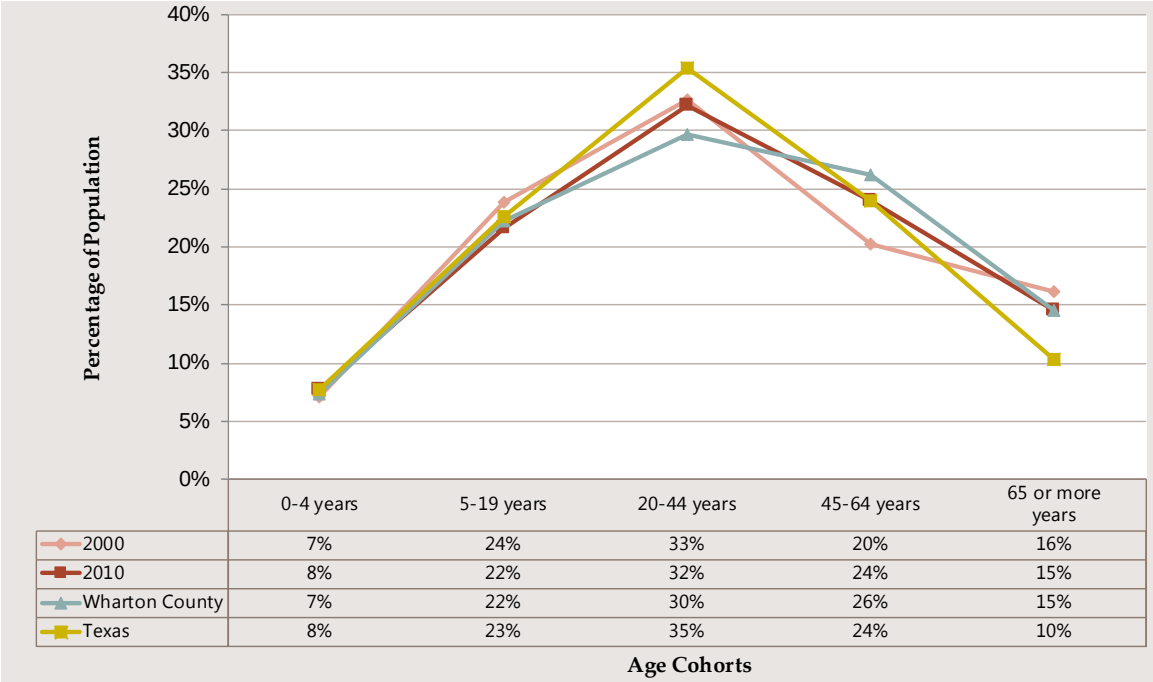
The Wharton area was initially settled as a plantation community in 1846 by some of Stephen F. Austin's "Old Three Hundred" colonists. By the early 1850s, Wharton was home to settlers from across the United States and around the world. The arrival of the New York, Texas, and Mexican Railway (1881) and the Gulf, Colorado, and Santa Fe Railway (1899) further supported population growth. The population continued to expand throughout the 20th century, as did local institutions and business. By the 1980s, the city had a public library, a junior college, a local theater, and a diverse array of businesses including health care, manufacturing, and agricultural services. Wharton's population remained relatively stable over the past 30 years, fluctuating around 9,000 residents. During the last decade (2000-2010) Wharton's population decreased by 4.4%, or -405 residents.

Population Changes (2000-2010)

Chart 11A (next page) illustrates age cohort distributions for Wharton (2000, 2010), Wharton County (2010), and the state of Texas (2010). An age distribution peaked by the 20-to-44-year-old age cohort generally indicates a stable-to-expanding or "healthy" population distribution. The Texas distribution is an example of "healthy" population change. In contrast, a flatter distribution can indicate relatively stationary or declining population change. As the chart demonstrates, the city of Wharton's age distribution in 2000 was pyramid-like. Adults over 44 comprised a somewhat larger percentage of the population than residents under 20, but adults 20-to-44-years of age comprised approximately 1/3 of the population. Wharton's age distribution in 2010 was very similar but residents over 44 comprised a slightly larger percentage of the population.

[62] The H-GAC is a voluntary association of local governments in the 13-county Gulf Coast Planning Region of Texas. For more information visit http://www.h-gac.com/home/residents.aspx.
[63] A home rule city is a city that has adopted a home rule charter for their local governance. For more information visit https://www.tml.org/pdftexts/HRHChapter1.pdf.

Chart 11A: Population by Age Group (2000, 2010)



	0-4 years	5-19 years	20-44 years	45-64 years	65 or more years
2000	7%	24%	33%	20%	16%
2010	8%	22%	32%	24%	15%
Wharton County	7%	22%	30%	26%	15%
Texas	8%	23%	35%	24%	10%

Source: 2000 and 2010 Census of Population and Housing, Summary Population and Housing

The U.S. Census distinguishes between two minority population groups: "racial minorities" - all non- "White" residents - and "ethnic minorities" - all "Hispanic or Latino" residents.

Table 11A (next page) provides a population profile of residents in the city of Wharton, as well as Wharton County, in terms of race and ethnicity. As the table demonstrates, racial minorities comprise a slightly higher percentage of Wharton residents in 2010 than in 2000. This change appears to result from both a decrease in the "White" population and an increase in several non-White populations, primarily in the number of residents that identify as "Other". Ethnic minorities also comprise a higher percentage of residents in 2010 compared to 2000. In terms of relative representation, the city of Wharton is more racially and ethnically diverse than Wharton County.

Students of all races and ethnicities who attend Wharton Independent School District (ISD) were included in those surveyed about park needs.

Table 11A: Population by Race & Ethnicity (2000, 2010)

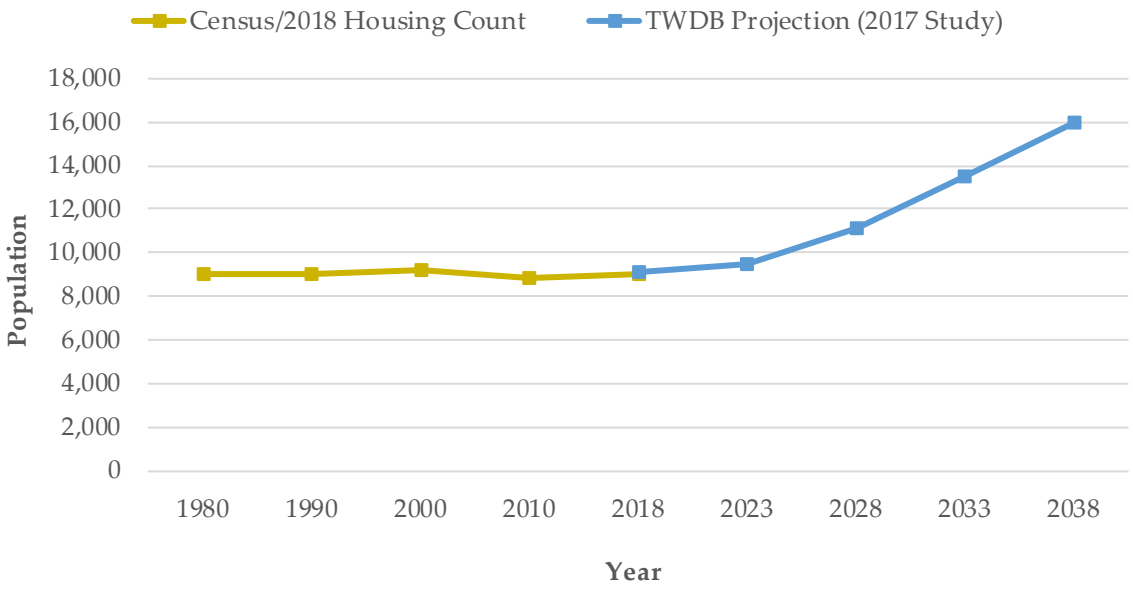
Characteristic	Wharton				Wharton County	
	2000		2010		2010	
	%	#	%	#	%	#
Total Population	***100%***	***9,237***	***100%***	***8,832***	***100%***	***41,280***
Race						
White	*56%*	5,203	*53%*	*4,690*	*72%*	*29,793*
Black or African American	*26%*	2,441	*27%*	*2,415*	*14%*	*5,817*
American Indian, Alaskan Native	*0.4%*	38	*0.6%*	*55*	*0.4%*	*161*
Asian	*0.7%*	66	*0.6%*	*51*	*0.4%*	*160*
Native Hawaiian / Hawaiian / Another Pacific Islander	*0.2%*	15	*0.01%*	*1*	*0.005%*	*2*
Other	*14%*	1,310	*16%*	*1,410*	*11%*	*4,596*
Two or More Races	*2%*	164	*2%*	*210*	*2%*	*751*
Ethnicity						
Hispanic or Latino	*31%*	2,871	*39%*	*3,477*	*37%*	*15,445*
Not Hispanic or Latino	*69%*	6,366	*61%*	*5,355*	*63%*	*25,835*

Note: Figures may be rounded to next whole number
Source: U.S. Census Bureau.

2010 Popuation Estimate & 2028 Projection

Wharton's estimated 2018 population is 9,063 residents. The preferred population projection, based on a projection from the Texas Water Development Board, projects that Wharton will experience moderate population growth over most of the planning period (2018-2025) but sizable growth in the last few years (2025-2028). Based on the selected projection, Wharton's population is expected to increase by 2,057 residents over the next 10 years, reaching approximately 11,120 residents in 2028 (see *Chart 11B*).

Chart 11B: Forecasted Population (1980 – 2038)



Source: Texas Water Development Regional Water Supply Study (2017) and GrantWorks, Inc. windshield survey (2017)

Recreation & Open Space Survey

A demand-based assessment of local recreation facilities was made using results from an online survey distributed to Wharton ISD students in March 2018 and made available to other Wharton residents throughout April and May 2018. In addition to newspaper notice, the City of Wharton encouraged resident participation by hanging flyers and posters at all public buildings, advertising on City Facebook pages, and sending text messages to residents using the City callout system. City partners like the Economic Development Corporation and the Chamber of Commerce also posted information on signs and sent notification emails to encourage participation. One hundred ninety-four (194) surveys were completed. Over 3/4 of the survey respondents live in the city of Wharton (see *Chart 11C, next page*).

The average household size for survey respondents is 3.39 members. Most survey respondents live in households with one primary-school age child (5-to-12-years-old), one high-school age child (13-to-18-years-old), two adults (19-to-50 years-old), and one-to-two adults between 51 and 65. Approximately 60% of respondents live with a very young child (four years or younger) whereas approximately 45% of respondents live with a household member over the age of 65 (see *Chart 11D, next page*).

Chart 11C: Do you live within the city of Wharton?

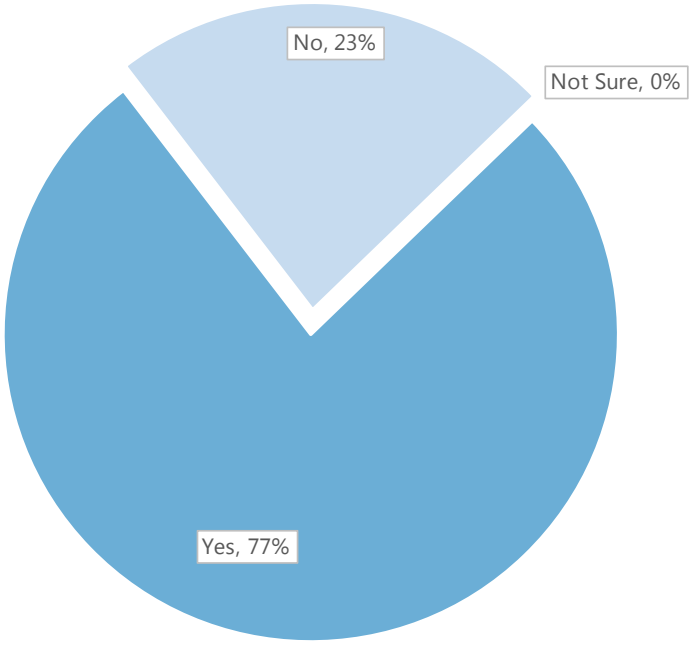
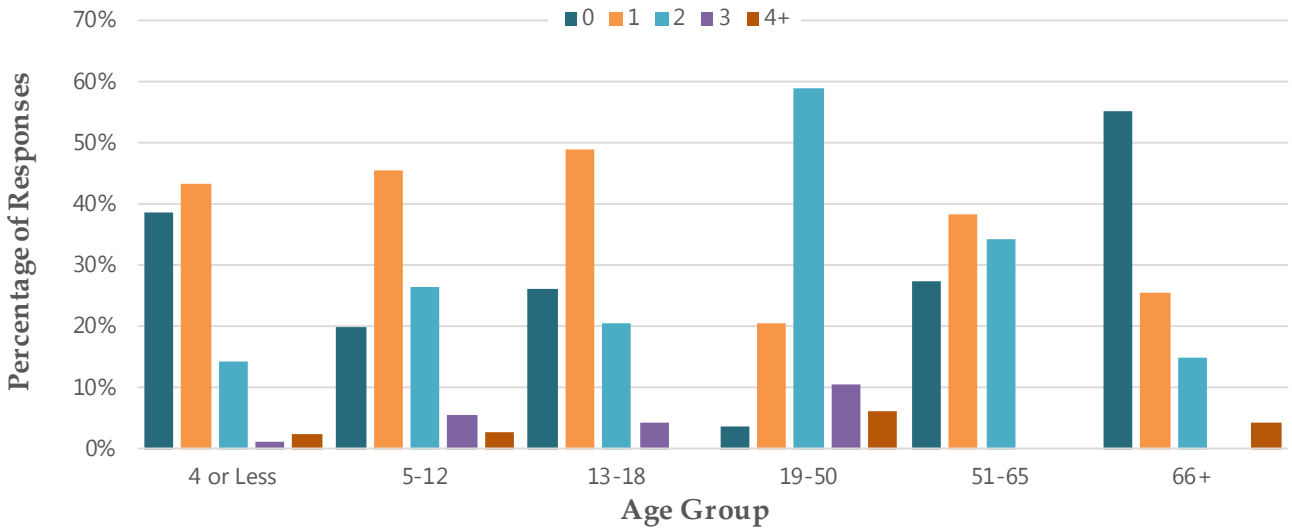


Chart 11D: Household Composition (Number of members by age)



Data gathered from the surveys identified common recreational activities of adults and children, favorite parks and needed improvements, and important/prioritized additional recreational facilities.

The City of Wharton desires to provide recreational activities for all segments of the population regardless of age.

Anticipated Financial Resources for Parks & Recreation Facilities

An estimated 27.8% of Wharton residents live below the poverty level.[64] The unemployment rate in Wharton County – 5.0% - is slightly lower than the unemployment level in the Gulf Coast Workforce Development Area (WDA) – which includes Colorado, Wharton, Matagorda, Brazoria, Fort Bend, Austin, Waller, Walker, Montgomery, Harris, Galveston, Chamber, and Liberty counties – and higher than the average for the state of Texas (5.3% and 4.6%, respectively).[65] Average weekly wages in Wharton County ($694) are lower than average wages for both the Gulf Coast WDA and the state of Texas ($1,184 and $1,035, respectively).[66]

Based on the above-referenced measures, the City has some ability to fund recreation facilities through increased taxes, bond issues, or user fees. Residents use local parks frequently because they have fewer resources to travel outside of Wharton and less money to spend on private recreation than residents of wealthier municipalities.

11.2 Goals & Objectives

Wharton's Parks Master Plan provides a foundation for development of future park and recreation facilities and guidance for maintenance of existing facilities in the city. To realize this vision for the future, actions suggested in this plan relate to specific goals that the citizens of Wharton hope to accomplish.

The goals and the objectives presented here were determined through formal surveys of local residents, public hearings related to community development projects, and four public meetings held to discuss city-wide aspirations for recreation facilities and other improvements.

[64]From the American Community Survey 5-year estimates 2012-2016, Table DP03, Poverty level of "All people", accessible from http://factfinder2.census.gov/main.html
[65] Texas Workforce Commission (TWC) Labor Market & Career Information Department (LMCI) TRACER 2016 Annual Data
[66] Texas Workforce Commission (TWC) Labor Market & Career Information Department (LMCI) TRACER 2017 Q2 Data

Table 11B: Recreation & Open Space Goals & Objectives 2018-2028

Goals & Objectives	Activity Year(s) 2018-2021	2022-2024	2025-2028	Lead Organization	Cost Estimate	Funding Sources
Goal 11.1 *Maintain recreation facilities in good condition*						
Develop a shared-resources plan with Wharton ISD and other community partners to ensure all available area facilities are properly maintained and can be utilized year-round.	X			City	< $1,000 (legal)	GEN; ISD; WCJC; WGS; WYS; Local
Establish a voluntary park donation fund for maintenance, repair, upgrade of city parks, neighborhood mini-parks, and play lots. Solicitation could be added to city utility bill.	X			City	< $1,000	GEN
Schedule creation of new Parks Master Plan.			X	City	$10,000	GEN; CDBG
Budget sufficient funds for park maintenance and for on-going facility development. **[1]**	X	X	X	City	$350,000+	GEN; EDC
Schedule biennial review of the Parks Master Plan and update priority list as needed. Solicit new public input every five (5) years.	X	X	X	City	< $1,000	GEN
Conduct biennial review of a shared-resources plan with Wharton and community partners to ensure all available area facilities are well-maintained and can be utilized year-round.	X	X	X	City	< $1,000	GEN; ISD; WCJC; WGS; WYS; Local
Goal 11.2 *Improve existing recreation facilities to permit and encourage additional use and construct new facilities that fulfill residents' expressed needs and bring the city more up to standard.*						
Adopt updated subdivision ordinance with mandatory park land dedication.	X			City	< $1,000 (legal)	GEN
Develop policy to educate public regarding benefits of private donation of land to be used for parks, greenbelts, and open space.	X			City	< $1,000	GEN
Establish Riverfront Park concept planning as a key subject for further review, study, and recommendation by CC Parks & Recreation Committee and Wharton Economic Development	X			City; EDC	Staff	GEN

Goals & Objectives	Activity Year(s)			Lead Organization	Cost Estimate	Funding Sources
	2018-2021	2022-2024	2025-2028			
Corporation; continue discussions until a concept plan is finalized.						
Apply for funding in fall 2020 to the TPWD Local Parks Small Community Recreation Program to improve Harris Park	X			City	Variable	GEN
Conduct "community work day" at parks to accomplish a portion of development using volunteer labor. Remove debris and dilapidated equipment from all park areas. Tasks can include site preparation, clean-up, and preliminary construction tasks. Seek volunteers from residents, City Staff, community service workers, EDC, school district, religious and civic groups, etc..	X	X		City	<$1,000	GEN; Local
Construct improvements to Harris Park, including at least three (3) general use/soccer fields, one (1) light activity area, picnic tables with BBQ grills, and park benches as appropriate.	X	X		City	$75,000 (or 50% match of TPWD grant funds)	GEN; EDC; TPWD (Total grant and match not to exceed $150,000)
Install passive activity areas that can be enjoyed by elderly residents (such as horseshoes or domino/card tables) at Harris Park, and/or elsewhere as appropriate.		X		City	$2,000/per	GEN; EDC
Install inclusive play activities (such as "scent or sensory garden") and inclusive playground equipment that can be enjoyed by children with physical disabilities at Harris Park, and/or elsewhere as appropriate.		X		City	$2,000/per	GEN; EDC

Goals & Objectives	Activity Year(s)			Lead Organization	Cost Estimate	Funding Sources
	2018-2021	2022-2024	2025-2028			
Develop master plan for Wharton Pathway Connections sidewalk/trails network.		X		City	Variable	GEN
Apply to TPWD Recreational Trails Fund (January 2025) and/or to TxDOT-Transportation Alternative Program to extend Santa Fe Trail through Mayfair Park, and/or elsewhere as specified in the Wharton sidewalk/trails network master plan.			X	City	Variable	GEN
Apply for funding in fall 2025 to the TPWD Small Community Recreation Program to improve Mayfair Park.			X	City	Variable	GEN
Encourage development of other indoor activities typically operated by private businesses such as a movie theater, bowling alley, roller-skating rink, gymnastics/twirling center, and indoor rodeo facilities.			X	City	Staff	GEN; Chamber; EDC; Local
Encourage development of other outdoor activities typically operated by private businesses such as a skate park, equestrian facilities, miniature golf, bicycle motor-cross, and a mountain bike trail.			X	City	Staff	GEN; Chamber; EDC; Local
Extend Santa Fe Trail through Mayfair Park and/or elsewhere as specified in the Wharton sidewalk/trails network master plan.			X	City	Up to $240,000 + TxDOT Funds (variable)	GEN; EDC: TPWD (City contribution would be up to $40,000 as 20% of match); TxDOT-TA (20% match required)

Goals & Objectives	Activity Year(s)			Lead Organization	Cost Estimate	Funding Sources
	2018-2021	2022-2024	2025-2028			
Construct improvements to Mayfair Park according to facility needs in the updated Parks Master Plan.			X	City	Up to $75,000 (or 50% match of TPWD grant funds)	GEN; EDC; TPWD (total grant and match not to exceed $150,000)
Continue Riverfront Park concept planning discussion until a concept plan is finalized.	X	X	X	City; EDC	Staff	GEN
Continue programming and festivals at Wharton parks. *Festivals and events provide diverse activities not normally available in the park and enhance the usefulness of the facilities. These events can also highlight the community's cultural diversity or offer special events such as kite-flying contests or bike-a-thons. Earmark any proceeds from activities for use in park improvement projects*.	X	X	X	City, EDC	$5,000 - $10,000	GEN; Local
Goal 11.3 *Establish ongoing maintenance and improvements to open spaces and highway right-of-way to demonstrate local pride and attract visitors, investors, and new residents.*						
Start annual Tree Planting Campaign; plant 10 trees per year. Prioritize public spaces and thoroughfares.	X			City	< $1,000 per year	GEN; Local
Conduct cleanup of vacant lots and improvements to property with frontage on thoroughfares. Establish annual "community work day" to accomplish a portion of related projects.	X			City	< $1,000 per year	GEN, EDC; Local, TDA-DRP; TxDOT

Goals & Objectives	Activity Year(s)			Lead Organization	Cost Estimate	Funding Sources
	2018-2021	2022-2024	2025-2028			
Develop exhibits at park facilities and floodplain areas to foster nature appreciation and to educate visitors about local flora, fauna, and geology. This can include community gardens and/or xeriscape gardens.		X		City	$2,000	GEN; Local
Develop native grass and garden areas along floodplain to preserve habitat and support natural functioning of floodplain. Encourage residents to do the same on private property.		X		City	$2,000	GEN; Local
Dedicate open space and natural areas to limit future floodplain development and to ensure that unique features are preserved.			X	City	Varies by program	GEN; Local
Continue annual "community work day" to accomplish a portion of projects related to cleanup of vacant lots and improvements to properties with frontage on thorough-fare, as well as parks improvements.	X	X	X	City	< $1,000	GEN; Local; TDA-DRP
Continue annual Tree Planting Campaign; plant 10 trees per year. Prioritize public spaces and thoroughfares.	X	X	X	City	< $1,000 per year	GEN; Local

[1] Budget based on median operating expenditures for per acre park and non-park sites for parks and recreation agencies servicing a population between 500 to 1,500 residents per square miles from the 2018 National Parks and Recreation Agency Performance Review https://www.nrpa.org/siteassets/nrpa-agency-performance-review.pdf. Per acre spending is $5,846. Total developed park land in Gregory is 59.8 acres.

GEN = City of Wharton Municipal Funds; **CDBG** = Community Development Block Grant Program; **EDC** = City of Wharton Economic Development Corporation (4B); **ISD** = Wharton ISD; **Local** = Donations from private citizens, organization, and local businesses; **TDA DRP** = Texas Department of Agriculture Downtown Revitalization Program; **TPWD** = Texas Parks & Wildlife Department; **TxDOT** = Texas Department of Transportation Statewide Transportation Enhancement Grants, Transportation Alternative Program; **WCJC** = Wharton County Junior College; **WGS** = Wharton Girls Softball Club; **WYS** = Wharton Youth Soccer Club

11.3 Plan Development Process

Previous Studies

The City of Wharton has one existing document with recommendations for its parks and recreation strategy – *City of Wharton Parks Master Plan 2006-2015.* The plan was developed by the Lower Colorado River Authority (LCRA) starting in 2004 and is informed by a parks and recreation survey developed by the Wharton Parks Planning Committee and mailed out to residents.

The Parks Planning Committee set the following goals for Wharton Parks, Recreation, and Open Space development:

1. Improve existing parks to meet anticipated future park and recreation need of Wharton residents.
2. Provide facilities easily accessible from any part of the community.
3. Develop a system of connected pathways between parks, businesses, schools, and residential areas to make Wharton a more 'walkable' community.
4. Promote sports and special events (such as tournaments, arts and crafts festivals, and concerts).
5. Update the plan every five years to reflect change.
6. Promote business and tourism growth through quality park and open space development.

Objectives to meet these goals include:

1. Complete development of the Santa Fe Trail and develop other trail connections throughout Wharton.
2. Develop playground resources which are safe and secure, but challenging.
3. Provide new and renovated restrooms in all parks.
4. Install safety lighting in all parks.
5. Develop facilities to accommodate special events and sports tournaments.

The plan references a sidewalk master plan under development at the same time and references several "objectives to complete this concept in regard to parks and recreation": pathways connections within neighborhoods to parks, to schools, and to the college; pathway connections from primary business areas to parks, and three "loops". The sidewalk plan was not available at the time of plan production. However, *Figure 11A* illustrates the three loops based on the text description in Wharton's previous park plan.

Wharton's previous plan also references concept plans for further development of abandoned railroad right-of-way to connect Croom Park 1 and Croom Park 2. The plan notes that "The right-of-way will accommodate a new drainage ditch, the trail and future road connection between State Highway 60 to South Alabama Road. These concept plans were not available at the time of plan production.

Figure 11A: Wharton Pathway Connections Loops

2018-2028 Plan

Development of this plan began in September 2016 when the City of Wharton hired a professional planning firm, GrantWorks Inc. of Austin, to create a Parks Master Plan as part of a comprehensive planning process.

To begin judging the level of interest in park needs, planners consulted with City staff, City officials, and residents of all ages. An online survey was made available to Wharton ISD students and Wharton residents. In addition to newspaper notice, the City of Wharton encouraged resident participation by hanging flyers and posters at all public buildings, advertising on City Facebook pages, and sending text messages to residents using the City callout system. City partners like the Economic Development Corporation and the Chamber of Commerce also posted information on signs and sent notification emails to encourage participation.

One hundred ninety-four (194) surveys were completed. Over ¾ of survey respondents live within the city limits (see *Chart 11C, page 11-6*). Most survey respondents (85%) agree that existing park facilities in Wharton need to be updated or expanded; 12% of residents indicate that they are "not sure". Survey results are further discussed in Section 10.6: Needs Assessment & Identification.

Appendix 11A provides a copy of the survey form.

In addition to community input, this plan evaluates the Wharton's recreation resources in relation to its existing and projected population and an inventory of existing facilities, a method called Standards-Based Assessment.[67] The analysis is used to develop a logical and cost-efficient strategy to address the identified needs over a 10-year planning period.

Following adoption of this plan by the City Council, the City's ongoing responsibility will be: to maintain and improve City-managed facilities; to identify funding resources; and to engage in cooperative projects with local volunteer groups and local schools.

Texas Parks and Wildlife recommends that parks and recreation plans be updated every five years to reflect changing realities in recreation trends, participation, area population, and funding. An update would include: revised goals and objectives that raise items of lower priority to higher priority as higher priority items are accomplished; a new facility inventory; and a new survey.

A new plan will be required in 2028.

[67] The Standards-Based Assessment starts on page 35 of the plan.

11.4 Area & Facility Concepts and Standards

Several basic principles guide successful development of parks and recreational opportunities in communities of all sizes and types. These standards and guidelines provide direction to community leaders who know generally what their community's needs are but require more specific information to guide the planning process.

The City's standards for needed recreation and open-space include facility type, facility size, facility service area, and needed equipment at the facility. The criteria are based on nationwide standards developed by the National Recreation and Park Association (NRPA)[68] and small-community standards developed by the State of Colorado.[69] The standards were tailored to Wharton based on knowledge about financial capacity, popular sports, community activities, and which facilities would provide participation opportunities to the broadest segments of residents.

The City of Wharton's standards are as follows:

General Standards for all Facility Development

- Residents should have access to a minimum of five acres and an ideal 15 acres of developed park land per 1,000 residents.
- When possible, active recreation areas should be separated according to the users' ages, primarily to protect younger children from injury. Some areas should be designated for use by all ages so entire families can enjoy being together.
- Residents of all age groups should have access to recreational facilities.
- Recreational areas should be accessible to the age group they are designed to serve. For example, neighborhood playgrounds usually serve an area with a radius of ½-mile, which is a reasonable distance for a child to walk. Safe pedestrian routes should provide access to those facilities.
- All City park facilities will be made accessible to physically challenged and special needs populations when required by applicable laws. The items mentioned as needed for other categories apply equally to special needs populations. Additional special needs facilities may be developed as warranted by local demand.

[68] *NRPA-suggested classification system (Berke, Kaiser, Godschalk and Rodriguez, Urban Land Use Planning, University of Illinois Press, Fifth Edition.)*

[69] *State of Colorado Small Community Park & Recreation Planning Standards* (2003). RPI Consulting, Inc. and Colorado Heritage Planning Grant program, Office of Smart Growth, Colorado Department of Local Affairs. (Page 16). Accessed at www.dola.state.co.us/osg/docs/Park%20Standards%20Report.pdf

- All facility construction is required to meet the minimums found in the International Building Code.
- Combined municipal and school recreational facilities are recommended. Lack of coordination often leads to the construction of redundant facilities. When possible, school recreational areas, including parking areas, drinking fountains, and restrooms, should remain open on weekends and during the summer months.
- Greenbelts, hike and bike trails, parkways, or paths should be provided to connect large recreational areas to improve access to facilities, scenic views, and recreational opportunities.
- Vehicular routes should be encouraged only when recreational areas are separated by more than one mile.
- Ideally, each recreation area should include public access to restrooms and water fountains and should be equipped with lighting and trash cans.

Standards for Service Area and Park Types

Table 11C describes the size and service area standards for types of park and recreation areas already located in Wharton or considered possible as future City recreation areas.

Table 11C: Types of Parks: Size & Service Area Standards

Park Type	Use	Service Area	Desirable Size	Desirable Site Characteristics
Minipark	Specialized facilities that serve a concentrated or limited population or specific group such as tots or senior citizens	< 1/4-mile radius	≤ 1 acre	Within neighborhoods and close to apartment complexes, townhouses, housing for the elderly or Central Business District.
Neighborhood Park/ playground	Area for intense recreational activities such as field games, court games, crafts, skating, and picnicking; also for wading pool and playground apparatus area	¼- to ½-mile radius to serve a population up to 5,000.	1 to 15+ acres	Suited for intense development; easily accessible to neighborhoods; geographically centered with safe walking and bike access; may be developed as a school-park facility
Community Park	Includes areas suited for intense recreational facilities, such as athletic complexes, large swimming pools; may be an area of natural quality for outdoor recreation, such as walking viewing, sitting, picnicking.	Several neighborhoods . 1- to 2-mile radius	15 to 25+ acres	May include natural features, such as water bodies, and areas suited for intense development; easily accessible to neighborhoods
Linear Park	Area developed for one or more mode of recreational travel, such as hiking, biking, canoeing, horseback riding. May include active play areas.	N/A	Sufficient width to protect the resources and provide maximum use	Built on corridors, such as utility right of way, bluff lines, vegetation patterns, or roads that link other components of the recreation system or community facilities such as schools and libraries.
Special Use	Areas for single-purpose recreational activities such as golf courses, nature centers, zoos, conservatories, gardens, outdoor theaters. Also, plazas or squares in or near commercial centers, boulevards, and parkways	N/A	Variable	Within city limits
Conservancy	Protection and management of the natural or cultural environment with recreational use as a secondary objective	N/A	Sufficient to protect the resource	Variable, depending on the resource being protected.

Facility Standards

Table 11D presents recommended standards for Wharton's park equipment and sports fields/courts. The activities and facilities listed are based on existing facilities and feedback from the Parks & Recreation Survey. In the future, as standards are changed or upgraded, part of the Parks Master Plan review process should address any discrepancies. The City's standards should conform to nationally-recognized organizations' most recent standards.

Table 11D: Facility Standards

Activity/ Facility	Service Radius	Space Requirements *SF = Square feet;* *Min. = Minimum*	Suggested #/ Population	Characteristics
Team Sport Courts and Fields				
General Use / Soccer Field	1- to 2-miles	1.7-to-2.0 acres	1 per 3,200	Usually in school, recreation complex, or neighborhood/community park.
Softball/ Little League Field	¼- to ½-mile	1.5-to-2.0 acres	1 per 2,600	Slight difference in dimensions for 16" slow pitch. May also be used for youth baseball.
Adult Baseball	¼- to ½-mile	3.0-to-3.85 acres	1 per 10,000	Part of neighborhood park. Lighted field part of community park.
Basketball Court	¼- to ½-mile	7,000 SF/ 0.16 acres	1 per 2,400	Usually in school, recreation complex, or church. Safe walking or bike access. Outdoor courts in neighborhoods and community parks.
Tennis Court	¼- to ½-mile	Min. 7,200 SF per court (0.17 acres)	1 per 3,000	Best in batteries of 2-4. Located in community or neighborhood park or near schools.
Volleyball Court	¼- to ½-mile	Min. 3,000 SF	1 per 6,300	Usually in school, recreation, or church facility. Safe walking or bike access. Outdoor courts in neighborhoods and community parks.
Football	¼- to ½-hour travel time	2 acres	1 per 20,000	Usually part of a sports or school complex
Multiple Recreation Court/Field	¼- to ½-mile	Varies	1 per 10,000	Designed to accommodate two or more sport courts/fields, such as tennis and basketball
Soccer (dedicated)	1- to 2-miles	1.7-to-2.2 acres	1 per 10,000	Part of neighborhood park. Lighted field part of community park.
Softball (dedicated)	¼- to ½-mile	1.5-to-2.0 acres	1 per 10,000	Slight difference in dimensions for 16" slow pitch

Little League (dedicated)	¼- to ½-mile	1.2 acres	1 per 10,000	Part of neighborhood park. Lighted field part of community park.
Activity/ Facility	**Service Radius**	**Space Requirements**	**Suggested #/ Population**	**Characteristics**
Individual & Specialty Use				
¼-mile Running Track	¼-hour travel time	4.3 acres	1 per 20,000	Usually part of a high school or in community park complex.
Dirt/Gravel Multiuse Trail (per mile)	N/A	N/A	Per mile: Unpaved: 924; Paved: 2,100	Capacity: rural trail – 40 hikers per day per mile; urban trail – 90 hikers per day per mile.
Paved Multiuse Trail (per mile)	N/A	N/A	Per mile: Unpaved: 924; Paved: 2,100	Capacity: rural trail – 40 hikers per day per mile; urban trail – 90 hikers per day per mile.
Swimming Pool	¼- to ½-hour travel time	Varies with size of pool and amenities. Usually 1/3-to-2-acres	1 per 14,200	Pools for general community use should be planned for teaching, competitive, and recreational purposes with enough depth (3.4m) to accommodate 1m and 3m diving boards. Located in community parks or school sites.
Racquetball/Handball	15-30-minute travel time	800 SF for 4-wall; 1,000 SF for 3-wall	1 per 20,000	4-wall usually indoor as part of multi-purpose facility. 3-wall usually outdoor in park or school setting
Golf (9-hole)	½- to 1-hour travel time	50 acres min.	1 per 25,000	Accommodates 350 people/ day.
Golf (18-hole)	½- to 1-hour travel time	90 acres min.	1 per 50,000	Accommodates 500-550 people/ day.
Group & Passive Recreation				
Playground	¼- to ½-mile	3,200 SF	1 per 3,700	Part of neighborhood park.
Family Picnic Area/ Picnic Table	¼- to ½-mile	435 SF	1 per 150	1 garbage can within 150 ft. of every 4 picnic tables; 40 ft. between uncovered picnic tables; Picnic tables within 400 ft. of parking
Group Picnic Area (Covered)	¼- to ½-mile	1-to-2 acres	1 per 2,300	
Light Activity Area	¼- to ½-mile	Estimated 500 SF	1 per 3,000	Could include facilities for horseshoe pit, shuffleboard, chess, meditation, gardening, or similar activity
Outdoor Events Venue	Variable	3.2 acres	1 per 8,000	

11.5 Inventory & Assessment of Existing Resources

This section provides information on the availability of recreation facilities to Wharton's residents and existing organizations that are involved in recreation and open space activities and development. Existing resources are assessed as they relate to opportunities for improvements to each recreation area, Wharton's demographics, and organizations available to pursue recreation and open space improvements in Wharton.

11.5.1 Local Outdoor Recreation Areas

Croom Park 1 (9.96 acres)

Croom Park 1 is a neighborhood park located in west Wharton off Old Land City Road (FM 3012). The park includes a playground area with a variety of equipment including a playscape, swings, monkey bars, and a merry-go-round. The playground area includes picnic tables (covered and uncovered) and BBQ grills for passive recreation. At the time of fieldwork, the City was installing two bathrooms at the playground area. The park also includes four ball fields with supporting facilities such as dugouts and batting cages (see *Figure 11B*). The Wharton Girls Softball Association leases the park land where these fields/facilities are constructed from the City of Wharton and has sole authority to permit field/facility use. The Association maintains all internal areas (i.e. all maintenance that is not mowing). There are two restrooms located near the ball fields.

Figure 11B: Croom Park 1

Park facilities are in generally good condition. A few facilities, like the see-saws, show some deterioration and may need to be reconditioned or replaced by the end of the planning period. Although most land in Croom 1 Park is developed, there is some room for additional, supporting facilities. Additional facilities that may be appropriate at the park include play equipment (inclusive play equipment recommended) and facilities for passive recreation like picnic tables, benches, or gazebos. The City should also consider installing a walking path around the playground area's perimeter. The City owns two undeveloped lots just north of Croom 1 Park. The lots are not included in the current park boundaries but could be used to expand the park in the future and are sufficient in size to accommodate additional sports courts/fields such as tennis courts or volleyball courts.

Croom Park 2 (2.19 acres)

Croom Park 2 is a neighborhood park located in central-north Wharton off North Alabama Road. The park includes two basketball courts and a playground area with a variety of equipment including a playscape, swings, a slide, a see-saw, and monkey bars. The playground area includes picnic tables (covered and uncovered) and BBQ grills for passive recreation (see *Figure 11C*). At the time of fieldwork, the City was installing two public restrooms at the park.

Figure 11C: Croom Park 2

Park facilities are in generally good condition. However, the park's water fountain is broken. Most land in Croom 2 park is developed but there is room for additional facilities. Additional facilities that may be appropriate at the park include play equipment (inclusive play equipment recommended) and facilities for passive recreation like picnic tables, benches, or gazebos. The park may also accommodate an additional sports court/field, such as a tennis court, but resources may be better used to convert one of the existing basketball courts into a multi-sport court.

Dinosaur Park (2.96 acres)

Marked by a life-size dinosaur at the entrance, Dinosaur Park is a neighborhood park located in south-central Wharton east of South Richmond Road along the Colorado River (see *Figure 11D*). The park includes a basketball court and playground area with a variety of equipment including two playscapes, swings, and monkey bars. The playground area includes picnic tables (covered) for passive recreation. A sidewalk leads into the park from Colorado Street and connects with a .016-mile concrete path that encircles the park's basketball court. A second sidewalk extends from the park path and runs under the Colorado Street Bridge (I—59) toward Riverfront Park. Dinosaur Park does not have restrooms.

Figure 11D: Dinosaur Park[70]

Park facilities are in generally good condition but the basketball court shows some deterioration and may need to be renovated toward the end of the planning period. The City should consider replacing the basketball court with a multi-sport court. Most land in Dinosaur Park is developed but the park may accommodate additional passive recreation facilities such as picnic tables and/or benches.

[70] www.raocharch.com

The City should also continue developing plans to improve Dinosaur Park's connection to Riverfront Park (further discussed in *Section 11.7 – Prioritization of Needs*).

Guadalupe Park (2.17 acres)

Guadalupe Park is a neighborhood park located in west Wharton at the intersection of North Sheppard Street and West Caney Street. The park includes a basketball court and a playground area with a variety of equipment including a playscape, a merry-go-round, monkey bars, springs riders, and several swings, as well as picnic tables (covered), benches, and BBQ grills for passive recreation (see *Figure 11E*). At the time of fieldwork, the City was installing two public restrooms at the park. The City of Wharton leases the park land from the Victoria Archdiocese.

Figure 11E: Guadalupe Park

Most park facilities are in good condition with the exception of the swing sets (six swings) in poor condition that should be replaced. Most land in Guadalupe park is developed but the park may accommodate additional play equipment (inclusive play equipment recommended) and/or facilities for passive recreation like picnic tables, benches, or gazebos.

Harris Park (6.36 acres)

Harris Park is a neighborhood park located in west Wharton south of Martin Luther King Boulevard on Camelia Avenue. The park includes a ball field and two basketball courts, as well as a playground (see *Figure 11F, next page*). The playground area includes two playscapes, a merry-go-round, jungle-gyms, a see-saw, several swings, picnic tables (covered and uncovered), and BBQ grills. The park also has two restrooms. The City of Wharton leases the park land from the Wharton Independent School District.

Figure 11F: Harris Park

Repeated flooding and resulting lack of investment have left many facilities in Harris Park in generally deteriorated condition. In particular, two concrete picnic tables lack seats and should be replaced. The City should also consider replacing wood picnic tables with more durable metal/plastic tables. Most land in Harris Park is developed but the park may accommodate additional play equipment (inclusive play equipment recommended) and/or facilities for passive recreation like picnic tables or benches. At the time of plan production, the City and ISD were finalizing an expanded lease to incorporate 11.6 additional acres. The City was also developing an agreement with the Wharton Youth Soccer League to develop the area for use during soccer season (starting with three fields).

Mayfair Park (10.38 acres)

Mayfair Park is a neighborhood park located in central Wharton just north of the intersection of North Alabama Road and the Santa Fe Trail. The developed portion of the park includes a ball field, a picnic table, and a chin up bar (see *Figure 11G*). The City considers two additional lots north of this area part of the park. At this time the land is undeveloped and used for drainage. An additional, small lot contains a park bench and sign that says Mocking Bird Park. County Appraisal District data does not specify ownership for this parcel so the facilities are included as part of Mayfair Park.

Figure 11G: Mayfair Park

The ball field at Mayfair Park includes a fence and a backstop. Additional facilities such as bleachers and dugouts would make this location more inviting for users. However, the City should consider repurposing this park as several Wharton parks already include ball fields, most of which are more developed. Mayfair Park's proximity to the Santa Fe Trail makes it an ideal extension of the trail and could be designed to have a minimal impact on the area's drainage function. The City should consider extending the trail up to Mocking Bird Park and installing supporting facilities such as benches and/or workout stations. The current ball field area could be turned into a passive recreation and/or light activity area with gardening and landscaping that supports drainage. Alternatively, the City could develop a general use/soccer field in this area.

Pleasure Park (12.43 acres)

Pleasure Park is a neighborhood park located in north Wharton at the end of North Walnut Street. The park includes a ball field with several bleachers permitting both active and passive recreation. The park also has a playground area with swings, a slide, and monkey bars, as well as picnic tables (uncovered) and BBQ grills (see *Figure 11H*). The park has two restrooms.

Figure 11H: Pleasure Park

Park facilities are in generally good condition. One wood picnic table is in poor condition and should be replaced. Approximately 66% of the land in Pleasure Park is developed. Additional facility installation in this area should be limited to avoid overcrowding. However, the remaining 4.2 acres in the park's western section are undeveloped and could accommodate a general use/soccer field or a sport court/field.

Riverfront Park (12.32 acres)

Riverfront Park is a neighborhood park located in south-central Wharton. The park runs along ½-mile of the Colorado River's north shore. Park amenities include two fishing docks; a 0.4-mile path (concrete and dirt/sand) for walking/running; a workout area with wood workout equipment; a basketball court; a playground with a playscape and swings; and facilities for passive recreation including picnic tables (covered and uncovered), park benches, and BBQ grills (see *Figure 11I*). The park has two restrooms.

Repeated flooding and resulting lack of investment have left Riverfront Park in generally deteriorated condition. With the installation of a levee upstream, flooding issues should be abated, and future investment in amenities will not be washed downstream. Suggested improvements can be organized into three general groups: park facilities, park connections, and river function/access.

Figure 11I: Riverfront Park

Park facilities refers to facility improvements or additions. Several picnic tables in the park are in poor condition and/or lack seats. The concrete portion of the park path is deteriorated in several areas and should be repaved. The City should also consider replacing the aging wood workout equipment with equipment made of more durable materials. The City may also want to consider replacing the existing basketball court with a multi-sport field to increase use options. Additional facilities that may be appropriate for Riverfront Park include an amphitheater or outdoor events venue; a light activity area; additional play equipment (inclusive play equipment recommended); additional passive recreation facilities (picnic tables, benches); and additional sport courts/field (tennis court, volleyball court, etc.).

Park connections refers to existing or desired connections with nearby parks and activity areas. For example, the City could further develop the sidewalk that extends from Dinosaur Park under the Colorado Street Bridge (BU 59-R) toward Riverfront Park. The City should also consider developing a pedestrian mall to connect Riverfront Park with Monterrey Square (see *Chapter 12: Central Business District*).

River function and access refers to improvements to prevent/manage flooding and develop the river as an amenity for visitors and residents. In addition to the installation of the levee upstream the City should focus on the removal of invasive species and the planting of native grasses and trees – particularly Bald Cypress and River Birch – to aid in bank stabilization and to increase the visual appeal of the riverfront. Along with these interventions, the City should create a pathway – the design of which should be done with bank stabilization in mind – allowing visitors access to the river itself. Although drafted in reference to the Nueces River Basin, the Nueces River Authority's "Your Remarkable Riparian" is a helpful initial resource for learning more about native plant species and the roles that they play for rivers (report available at http://www.nueces-ra.org/).

Santa Fe Trail (9.09 acres)

The Santa Fe Trail is constructed along a section of the abandoned Santa Fe Railroad in central Wharton. The park features mostly linear, 0.8-mile, asphalt trail. Several north-south road connections cross the trail but intersections include crosswalks and supporting signage. The trail includes decorative lighting, numerous trees, and four small pavilions with benches for rest and/or passive recreation (see *Figure 11J*) Several benches surround a fountain near the western trail entrance.

Figure 11J: Santa Fe Trail

As survey results in the demand-based assessment demonstrate, Santa Fe Trail is a very popular recreational amenity. The City should continue work to extend the trail and form connections with nearby parks and activity centers (see *Figure 11A, page 11-14*).

Train Depot (1.2 acres)

The Train Depot is a neighborhood park located in central Wharton at the intersection of East Milam Street and South Sunset Street. The park consists of a winding, 0.1-mile path lined with trees and benches and illuminated by decorative lighting at night. Further seating surrounds the front of the former Southern Pacific Railroad Depot building in the park's center. Originally constructed in 1912, over $1 million dollars in restoration projects have returned the depot to its former appearance when, over a century ago, it served as a key social and transport hub (*see Figure 11K*). The depot building is included on the National Register of Historic Places and is open on Saturdays for tours. Depot facilities are in good condition. Room for additional facilities is very limited so the City should focus on maintenance.

Figure 11K: Train Depot

Wharton Municipal Pool

Wharton's municipal swimming pool is an attractive amenity in good condition (see *Figure 11L*). However, survey responses indicate that some residents are not aware that Wharton has a public pool. This may be due in part to the pool's location on the Wharton High School campus. The City should consider installing signage in front of the pool that specifies: (1) that the pool is public and (2) pool hours or website information where pool hours are posted.

Figure 11L: Wharton Municipal Pool[71]

[71] http://www.cityofwharton.com/page/Pool

11.5.2 Inventory

Table 11E provides the shared inventory for all public parks in Wharton. Only facilities open to the public are included in the recreation facility inventory. *Appendix 11B* includes individual inventories for each park.

Table 11E: Recreation Facility Inventory

AMENITIES	Total	OPERATION / MAINTENANCE City									
		Croom 1	Croom 2	Dinosaur	Guadalupe	Harris	Mayfair	Pleasure	Riverfront	Santa Fe	Train Depot
TEAM SPORT COURTS & FIELDS											
Softball / Little League Field	7	4	-	-	-	1	1	1	-	-	-
Basketball Court	7	-	2	1	1	2	-	-	1	-	-
COURT/FIELD SUPPORTING											
Announcer's Box	1	1	-	-	-	-	-	-	-	-	-
Batting Cage	1	1	-	-	-	-	-	-	-	-	
Bike Rack	1	-	-	-	-	-	-	-	-	-	--
Bleachers	16	11	-	-	-	1	-	4	-	-	-
Dugout	8	8	-	-	-	-	-	-	-	-	-
Flagpole	3	1	1	-	-	-	-	1	-	-	-
Lights	12	-	-	-	-	6	-	6	-	-	-
Scoreboard	4	3	-	-	-	-	-	1	-	-	-
Trashcan	50	8	3	3	1	6	-	8	-	-	-
Water Fountain	1	-	-	-	-	-	-	-	-	-	-

AMENITIES	Total	Croom 1	Croom 2	Dinosaur	Guadalupe	Harris	Mayfair	Pleasure	Riverfront	Santa Fe	Train Depot
PLAYGROUND											
Playground	7	1	1	1	1	1	-	-	1	-	-
Merry-Go-Round	3	1	1	-	1	-	-	-	-	-	-
Monkey Bars/Jungle Gym	5	1	-	1	-	2	-	-	-	-	-
Playscape	8	1	1	2	1	2	-	-	1	-	-
See-Saw	3	2	1	-	-	-	-	-	-	-	-
Slide	1	-	-	-	-	1	-	-	-	-	-
Spring Rider	2	-	-	-	2	-	-	-	-	-	-
Swings	32	4	2	4	10	4	-	-	4	-	-
PASSIVE											
Picnic Tables – Covered	39	4	4	5	2	9	-	-	15	-	-
Picnic Tables – Uncovered	28	1	2	-	-	5	1	9	10	-	-
Pavilions	11	1	1	1	1	1	-	-	2	4	-
BBQ Grills	18	2	1	-	1	3	-	3	8	-	-
Park Bench	25	-	-	-	1	-	1	-	5	13	6

AMENITIES	Total	Croom 1	Croom 2	Dinosaur	Guadalupe	Harris	Mayfair	Pleasure	Riverfront	Santa Fe	Train Depot
ADDITIONAL AMENITIES											
Paved Multiuse Trail (miles)	1.5	-	-	0.16	-	-	-	-	0.4	0.8	0.1
Fishing Docks	2	-	-	-	-	-	-	-	2	-	-
OTHER SUPPORTING AMENITIES											
Bike Rack	1	-	-	-	-	-	-	-	-		1
Bus Stop	1	-	-	-	-	-	-	-	-	-	1
Lighting	46	-	-	-	-	-	-	-	2	32	12
Restrooms	8	2	-	-	-	2	-	2	2	-	-
Trashcans	50	8	3	3	1	6	-	8	14	5	2
Water Fountain	1	-	-	-	-	-	-	-	1	-	-

Source: GrantWorks Field Survey, 2017-2018

11.5.3 Additional Local Areas Used for Outdoor Activities

ISD & WCJC Facilites

Local schools in Wharton have a variety of recreational facilities including tennis courts, basketball courts, 0.25-mile running tracks, and playgrounds. Most of these facilities are secured (fenced/locked) and not available to the public. The City should pursue an interlocal agreement with Wharton Independent School District (ISD), Wharton County Junior College (WCJC), and other institutions to make appropriate facilities available to the public at all times or during certain days/hours. The agreement should also clarify public access to unsecured areas. For example, the Wharton High School campus includes unsecured picnic tables and play equipment. An interlocal agreement would ensure that these areas are formally available to the public and/or apply appropriate limitations for use.

Open Space

A city's park system often includes dedicated open spaces to provide opportunities for passive recreation, to provide habitat for local flora and fauna, to preserve landmarks or vistas, or to ensure no development occurs in areas where potential hazards exist, such as flooding (e.g. land within a FEMA 100-year Floodplain). Wharton has land that could be used for dedicated open space. Approximately 22% of land in the city limits is currently undeveloped or used for farmland (1,045 acres) and another 12% is subdivided but not developed (544 acres). Combined, that totals over 1,589 acres of "open" land within the city limits, some of which could become dedicated open space.

The City should prioritize preserving floodplain land as open space and incorporating these sensitive areas into the City's park land. Approximately 2,858 acres of land in the city limits is located within the FEMA-identified 100-year Floodplain. Most land in the floodplain has an active use; active residential uses are particularly prominent. However, this land includes several vacant parcels that could be preserved as open space.

While it may not be practical to entirely prohibit construction in the FEMA 100-year Floodplain, the City can discourage floodplain development by educating residents about floodplain locations and the costs of floodplain development. Where development does occur, the City can support floodplain functions and prevent property damage by continuing to enforce the heightened construction standards in its Flood Damage Prevention Ordinance. The City should also consider adopting a subdivision ordinance that enables the City Council to restrict construction in the floodplain (both within the city limits and within the extraterritorial jurisdiction (ETJ)) and that requires park land dedication. The proposed subdivision ordinance in *Chapter 15* of this plan includes these standards.

Cemeteries

In the 1800s, cemeteries served as areas for relaxation and walking before the institution of public parks in cities. While communities no longer rely on cemeteries to serve that purpose, they are still considered valuable open spaces for walking and for passive activities like reflection and meditation. The Wharton City Cemetery – located in central Wharton – consists of approximately 14.7 acres and is considered a Historic Texas Cemetery by the Texas State Historical Association. The state historic marker at the site includes information about the cemetery's historical development starting formally in the mid-19th century. The marker also includes a few interesting facts about the site. For example, the marker notes that "The Wharton Cemetery Exhibits detail in planning and development. Features include obelisks, brick cairns, decorated fencing, curbed plats and a large number of vertical stones". The cemetery includes walking paths (paved and unpaved).

Across the street the smaller Wharton Mexican Cemetery (also known as the Latin American Cemetery and the Wharton Hispanic Cemetery) includes approximately 1.2 acres. According to the Texas Historical Society the cemetery was abandoned at the end of 2014 but since early 2015 Preservation of Our Ancestors (a non-profit group) has led restoration and maintenance efforts. The cemetery does not include formal walking paths.

There are two additional cemeteries located in Wharton's extraterritorial jurisdiction (ETJ): the Beth Yeshun Cemetery (approximately 4.2 acres) and Evergreen Memorial Park (approximately 19.4 acres). Both cemeteries include walking paths but are privately owned and therefore may not be generally available to the public.

11.5.4 Regional Recreation Areas

Brazos Bend State Park

Brazos Bend State Park is approximately 45 minutes east of Wharton off FM 762. Popular activities include camping, swimming, hiking, fishing, and biking. The park is also home to a Nature Center and the George Observatory. Information on reservations and ranger programs is available from Texas Parks and Wildlife (https://tpwd.texas.gov/state-parks/brazos-bend).

Attwater Prairie Chicken National Wildlife Refuge

The Attwater Prairie Chicken National Wildlife Refuge is located approximately 50 minutes northwest of Wharton off FM 3013. The refuge is home to the critically endangered Attwater's prairie chicken. Visitors have access to trails and an auto tour loop, as well as guided tours. The refuge also hosts an annual festival. More information is available at https://www.fws.gov/refuge/Attwater_Prairie_Chicken.

Privately Owned Recreational Facilities

Wharton Country Club, located off FM 3012, is partially within the city limits. The club includes a nine-hole golf course, a pool, and tennis courts, as well as a club house and restaurant. For more information visit https://whartoncountryclub.com/index.html.

The Brackenridge Recreation Complex is located approximately 45 minutes southwest of Wharton off SH 111. Spread over approximately 1,107 acres, the complex includes campgrounds, paintball, miniature golf, hike and bike trails, and an equestrian trail. Texana Park (formerly Lake Texana State Park) offers additional campsites and trails as well as the Main Event Center, a large day use area, and a nature center. For more information visit http://www.brackenridgepark.com/.

11.6 Needs Assessment & Identification

This section outlines local recreational needs using a standards-based assessment and a demand-based assessment.

11.6.1 Standards-Based Assessment

The standards-based assessment uses three criteria to determine the city's recreational needs: the current and future population; acreage devoted to parks and open space; and the number of households within/outside of a recreational facility service area. The standards-based assessment does not consider residents' desires or a community's capacity to maintain facilities.

Wharton's facilities include opportunities for several age groups. Parks include playground equipment for children and, to a lesser extent, toddlers. Depending on size, courts and fields offer team sport opportunities for children, teens, and adults. Adults and seniors can walk/run/bike along Santa Fe Trail and/or Riverfront Park. Many City parks also provide passive recreation opportunities for all residents including benches, pavilions, picnic tables, and cooking facilities.

According to a standards-based assessment, Wharton needs the following sports-related recreational facilities: three (3) general use/soccer fields, three (3) tennis courts; and one (1) volleyball court. By the end of the planning period, Wharton will require at least one (1) additional general use/soccer field (see *Section 11.4-Area & Facility Concepts & Standards)*.

Wharton should consider investing in multiple recreation facilities. For example, the standards recommend that the City provide one (1) multiple recreation court for each 10,000 residents. By developing one or more multiple recreation courts, the City of Wharton could address facilities needs for basketball and volleyball/tennis in one space.

Wharton should also consider investing in dedicated facilities for more popular sports. For example, the standards recommend that Wharton provide one dedicated field for each of the following sports by the end of the planning period: soccer, softball, and little league (see *Section 11.4-Area & Facility Concepts & Standards)*. Dedicated facilities should adequately meet design standards for the specified sport. To dedicate a field to specific use, the City would need to ensure that field design factors such as baselines pitching, foul line, and center field distances comply with National Softball Association Standards or other applicable standards.

According to the standards-based assessment, Wharton also needs the following passive recreation facilities: one (1) outdoor events venue, twelve (12) park benches, and three (3) light activity areas. By the end of planning period, Wharton will require seven (7) additional picnic tables and twenty (20) additional park benches (see *Section 11.4-Area & Facility Concepts & Standards)*.

By then end of the planning period Wharton will also require: 3-to-12 additional miles of multiuse trails/paths (depending on whether paved) and 1-to-2 miles of fishing accessible shoreline (see *Section 11.4-Area & Facility Concepts & Standards)*.

Detailed Standard-Based Assessment Data

Facility Needs by Population Size

Table 11F (next page) identifies the Wharton's existing and future needs based upon the population projection and standards for facilities described earlier in the chapter.

Table 11F: Facilities Standards & Existing Facilities Comparison

Facility	2018		Additional Facilities Needed	
	Existing within service area	*Suggested (#/population)*	*Currently needed*	*Total needed by 2028*
Facilities needed locally (within 2 miles)				
General-Use / Soccer Field	-	1 per 3,200	3	4
Softball / Little League Field	7	1 per 1,300	-	-
Adult Baseball	-	1 per 15,000	-	0
Basketball Court	7	1 per 2,400	-	-
Tennis Court	-	1 per 3,000	3	3
Volleyball Court	-	1 per 6,300	1	1
Multiple Recreation Court	-	1 per 10,000	-	1
Soccer Field (dedicated)	-	1 per 10,000	-	1
Little League (dedicated)	-	1 per 10,000	-	1
Softball (dedicated)	-	1 per 10,000	-	1
¼-mile Running Track	-	1 per 20,000	-	-
Playground	7	1 per 3,700	-	-
Picnic Tables	67	1 per 150	-	7
Group Picnic Area (Covered)	5	1 per 2,300	-	-
Benches	26	1 per 240	12	20
Light Activity Area	-	1 per 3,000	3	3
Outdoor Events Venue	-	1 per 8,000	1	1
River Amenities	**Existing**	**Suggested Pop.**		
Fishing Accessible Shoreline (miles)	-	1 per 6,250	1.5	1.8
River Put-In/Take Out W/ Boat Ramp	-	1 per 14,200	-	-
Multiuse Paths/Trails	**Actual Mileage**	**Pop Per Mile**		
Multiuse Trails (Dirt/Gravel)	-	924	9.8	12.0
Multiuse Trails (Paved)	1.46	2,100	2.9	3.6
Facilities needed within region (< 30 min. drive time; golf and hike/bike trail< 1hr.)				
Football [1]	2	1 per 20,000	-	-
Swimming Pool [2]	1	1 per 14,200	1	1
Racquetball/Handball	-	1 per 20,000	-	-
Golf (9-hole)	-	1 per 25,000	-	-
Golf (18-hole) [3]	2	1 per 50,000	-	-
Hike / Bike Trails [4]	Numerous	1 system per region	-	-

Notes: **[1]:** Wharton Junior College Tiger Stadium and ISD facilities; **[2]:** Wharton Municipal Pool; **[3]:** Waxahachie County golf club is semi-private; **[4]** Hike/bike trails available at several regional recreation areas (see Section 11.5.4)

Source GrantWorks Fieldwork 2017-2018

Acreage Needs by Population Size

Level of Service (LOS) is the term used to describe the park system's role in the community. The LOS for parks and open space is based on useable space per 1,000 residents; therefore, undeveloped parkland is not included. As expressed in the City's facility standards, Wharton's residents should have access to a minimum of five (5) acres and an ideal 15 acres of developed park land per 1,000 residents. Due to policies restricting the availability of use by the public, the acreage of private recreational facilities and areas of school campuses not open to the public or open only on a limited basis are not included.

Table 11G: Existing Parks, Level of Service

Facility	Park Type	Acreage			Service Area (Miles)	City Households Served [1]	% of Houses
		Desirable	*Total*	*Developed*			
Croom Park 1	Neighborhood	1 - 15	10.0	10.0	1/4 - 1/2 miles	602	16%
Croom Park 2	Neighborhood	1 - 15	2.2	2.2	1/4 - 1/2 miles	215	6%
Dinosaur Park	Neighborhood	1 - 15	3.0	3.0	1/4 - 1/2 miles	260	27%
Guadalupe Park	Neighborhood	1 - 15	2.2	2.2	1/4 - 1/2 miles	119	3%
Harris Park	Neighborhood	1 - 15	6.4	6.4	1/4 - 1/2 miles	298	8%
Mayfair Park	Neighborhood	1 - 15	10.4	5.4	1/4 - 1/2 miles	612	16%
Pleasure Park	Neighborhood	1 - 15	12.4	8.2	1/4 - 1/2 miles	375	10%
Riverfront Park	Neighborhood	1 - 15	12.3	12.3	1/4 - 1/2 miles	445	12%
Santa Fe Trail	Linear Park	-	9.1	9.1	N/A	N/A	N/A
Train Depot	Neighborhood	1 - 15	1.2	1.2	1/4 - 1/2 miles	143	4%
Total Acreage	**-**	**135.9** [2]	**69.2**	**59.8**	**-**	**-**	**-**
Population – 9,063 (est. 2018); 11,120 (est. 2028)							
***Level of Service 2018* (acres per 1,000 residents)**			*7.6*	*6.6*			
Level of Service 2028			*6.2*	*5.4*			

Notes: **[1]** City Households Services includes multifamily units; **[2]** Based on ideal of 15 acres of developed parkland per 1,000 residents*urce: GrantWorks Fieldwork, 2017-2018*

The city of Wharton's current Level of Service (LOS) meets the minimum facility standards. Public parks provide a LOS of 6.6 acres of developed parkland per 1,000 residents. However, as funds allow, the City should continue to develop additional recreational space to bring Wharton's LOS up to the ideal standard *(see Table 11G, previous page).*

Acreage Needs by Park Location

The standards-based assessment also determines recreation needs based upon park service areas. The service area refers to the area formed by a predetermined radius extending out from the park that would typically serve the surrounding population. The service area of existing parks is described in *Table 11G (previous page)* and in *Figure 11M (below)*. Based on housing locations, most of Wharton's residents are served by at least one public recreational facility. As a linear park the Santa Fe Trail does not have a specified service area. Excluding the Santa Fe Trail, approximately 22% of houses in Wharton are not within a public park service area (see *Figure 11M*).

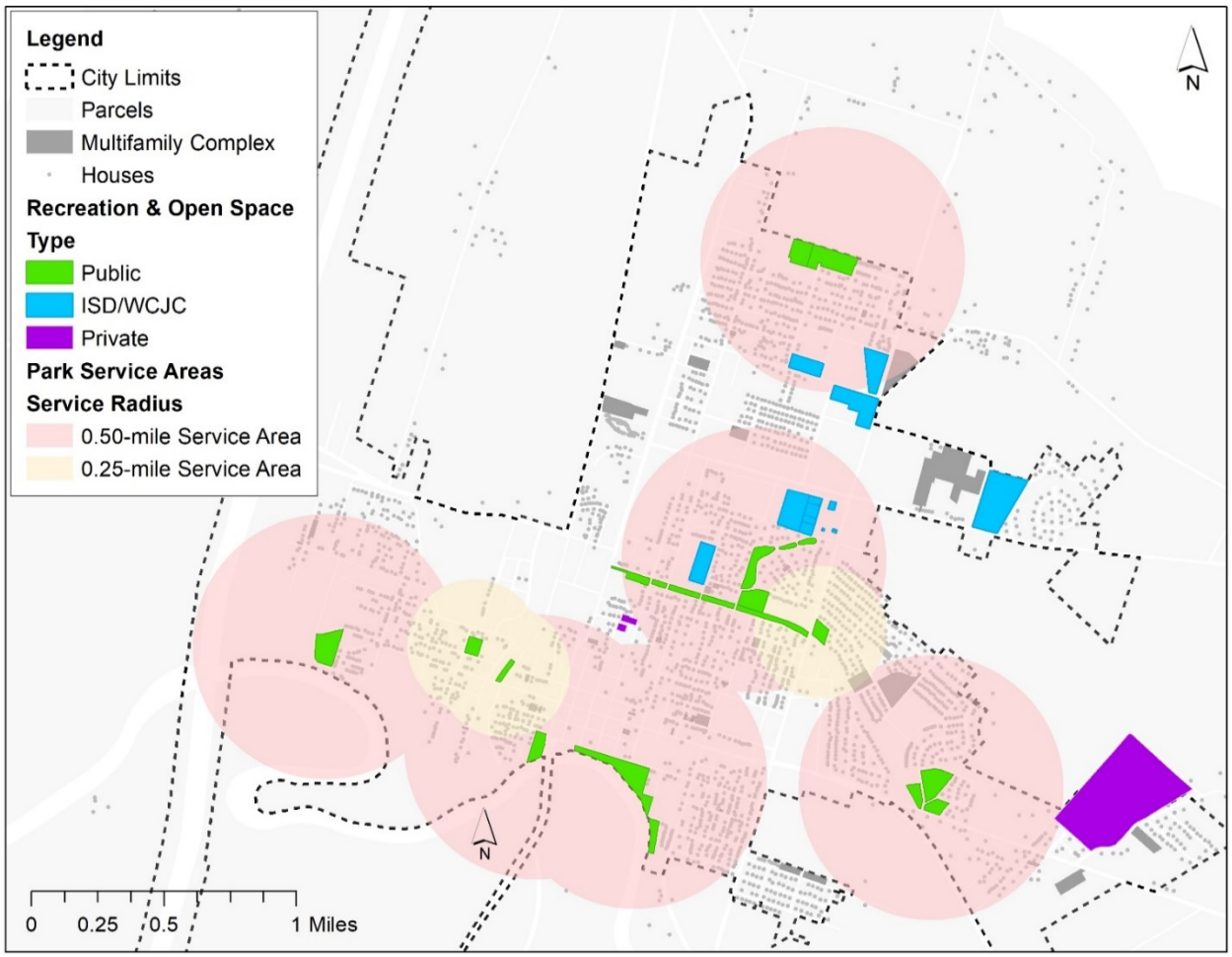


Figure 11M: Park Service Areas

Maintaining a Sufficient Level of Service

As the city grows, desire for access to quality parks and recreation facilities will too. In recognition of the importance of park land for resident health, safety, and welfare and of the additional demand placed on existing park facilities by population growth, many cities in Texas have adopted park land dedication requirements for new development. The requirements mandate that a developer of a new subdivision provide land for a park (usually public) and/or pay a fee-in-lieu to be used for public park acquisition/development. Dedication requirements are often included as part of a subdivision ordinance or developed in an individual ordinance.

To be constitutional, park land dedication requirements must be proportionate to the need created by the new development. Cities are required to prove the proportionality, usually through a specified formula. Importantly, dedication requirements are intended only to address new demand created by new development; park land dedication requirements must not be used to address existing demand/deficiency. For this reason, the requirements for new development/residents should not exceed the current standards for existing residents. In the case of fees, a time limit for using said fees should be established.

Professor John Crompton's study "Parkland Dedication Ordinances in Texas: A Missed Opportunity?" is an excellent resource for Texas communities considering draft/updating park land dedication requirements. Published by the Texas A&M AgriLife Extension Service, the study includes specific examples and identifies best practices related to fee type, calculation, and use; ordinance maintenance; and criteria for park land acceptance. The report is available online at http://rpts.tamu.edu/wp-content/uploads/sites/21/2015/05/Parkland-Dedication-Ordinances-in-Texas-A-Missed-Opportunity.pdf

Proposed amendments to Wharton's subdivision ordinance include Article IV – Park Land, Public Sites and Open Spaces (see *Chapter 15: Subdivision Ordinance*).

11.6.2 Demand-Based Assessment

The demand-based assessment of local recreation facilities is based on the results from a survey distributed to Wharton ISD students in March 2018 and made available to other Wharton residents throughout April and May 2018. In addition to newspaper notice, the City of Wharton encouraged resident participation by hanging flyers and posters at all public buildings, advertising on City Facebook pages, and sending text messages to residents using the City callout system. City partners like the Economic Development Corporation and the Chamber of Commerce also posted information on signs and sent notification emails to encourage participation. One hundred ninety-four (194) surveys were completed. Data gathered from the surveys identified common recreational activities of adults and children; favorite parks and needed improvements; and important/priority additional recreational facilities.

Table 11H summaries key assessment results:

Table 11H: Top Four: Activities, Residents' Facility Desires, Activity Locations

Top 4:	Children's Activities	Adults' Activities	Resident Priority Facilities	Locations for Activities
1.	Swimming	Walking	Soccer Field	Home
2.	Soccer	Fishing	Hike/Jog/Bike Trail	Santa Fe Trail
3.	Basketball	Swimming	Recreation Center	School
4.	Walking	Hunting/Shooting	Swimming Pool	Friend's Home

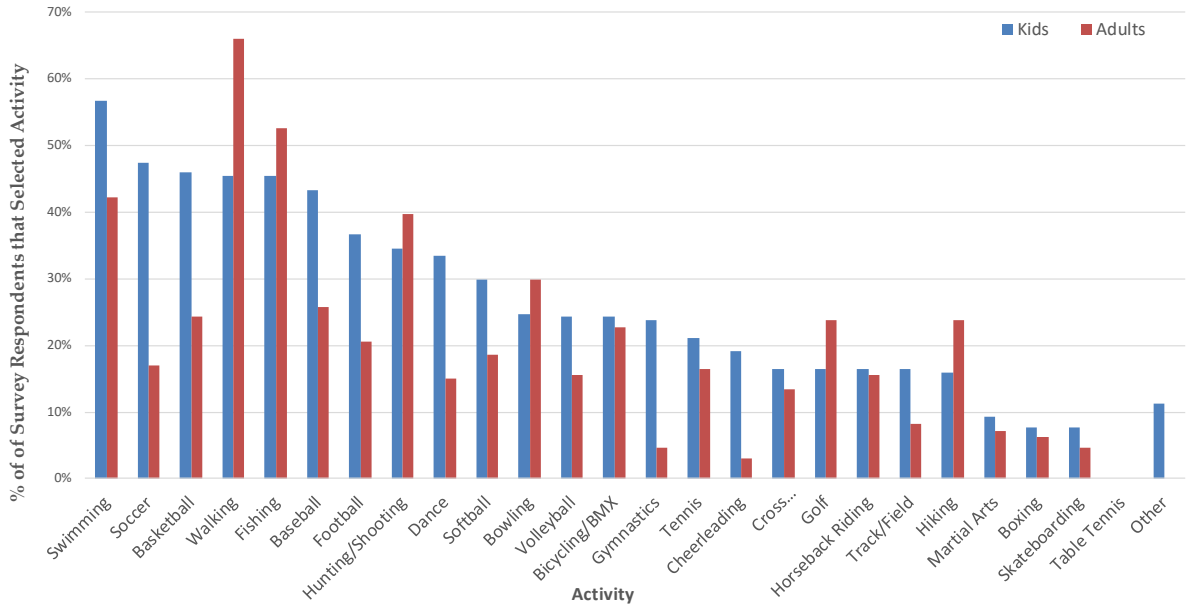
Source: GrantWorks Parks & Recreation Survey, 2018

Detailed Demand-Based Assessment Data

Resident Activites & Activity Locations

The survey asked respondents to share the recreational activities of children and adults in their household and where those activities take place. As *Chart 11E: Top Activities for Children & Adults* shows, swimming, fishing, walking, and soccer are the most popular recreational activities among Wharton youth. The most popular youth team sports are soccer, basketball, and baseball. Walking, fishing, swimming, and hunting/shooting are the most popular adult activities. The most popular adult team sports are baseball, basketball, and football.

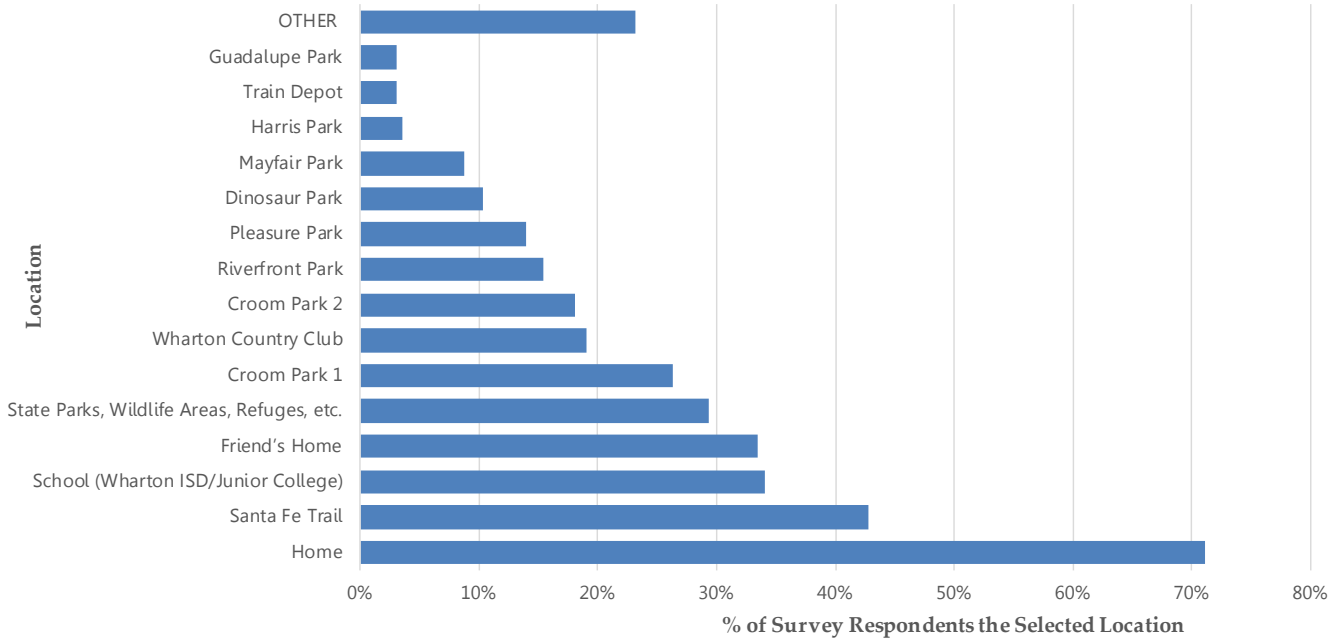
Chart 11E: Top Activities for Children & Adults



Source: GrantWorks Parks & Recreation Survey, 2018

As *Chart 11F: Recreational Activity Locations* shows, most of the activities that children and adults participate in are based at home, at Santa Fe Trail, or at school.

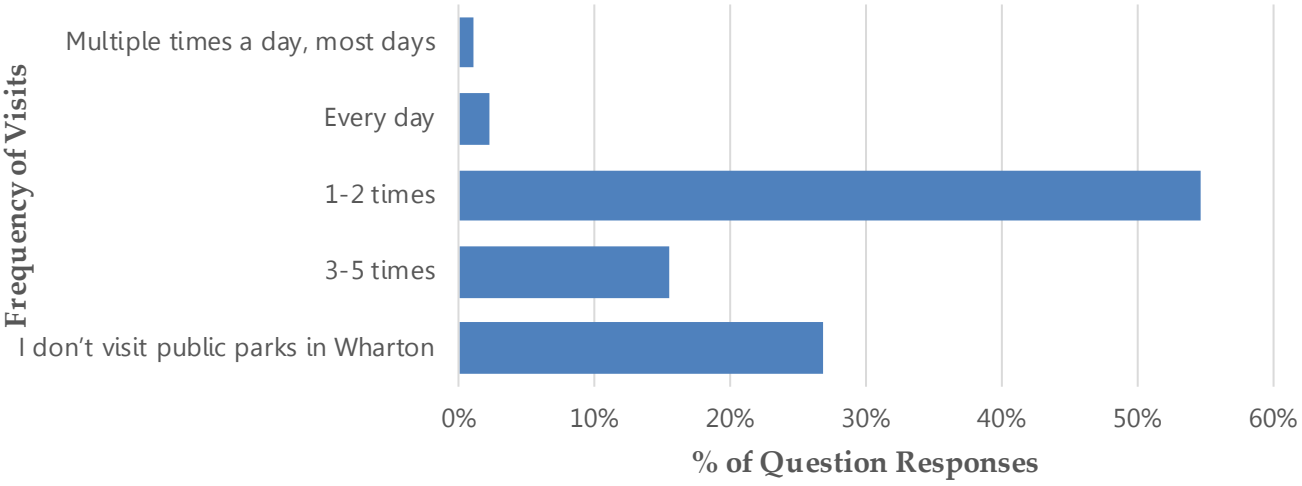
Chart 11F: Recreational Activity Locations



Source: GrantWorks Parks & Recreation Survey, 2018

Most respondents report visiting a public park in Wharton (73%). Of the respondents who visit public parks, most visit once or twice a week (see *Chart 11G*).

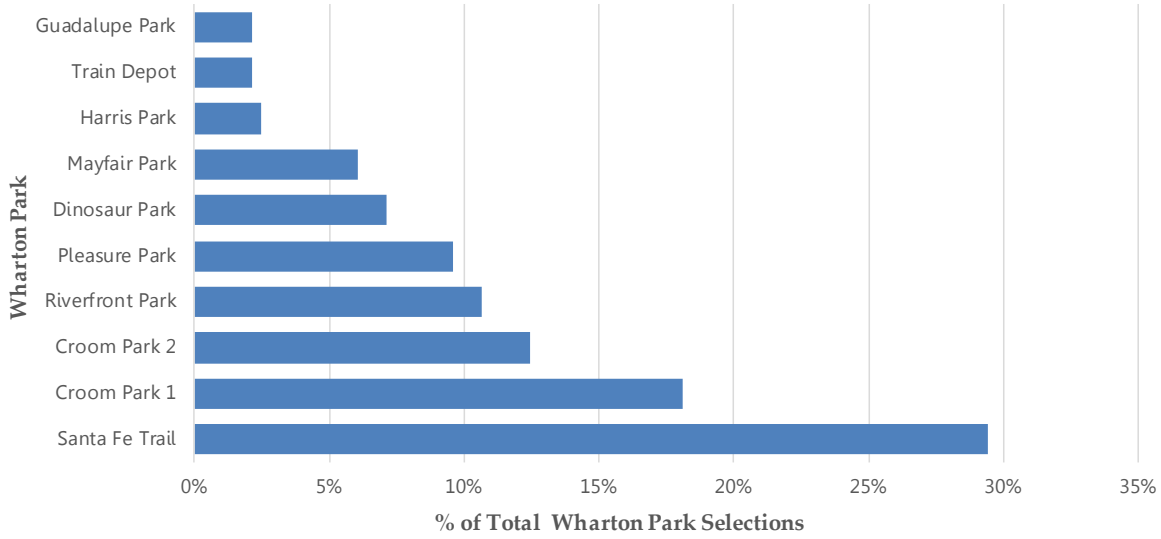
Chart 11G: How many times a week do you visit a park in Wharton?



Source: GrantWorks Parks & Recreation Survey, 2018

Santa Fe Trail is the most commonly visited Wharton park among survey respondents (see *Chart 11H*).

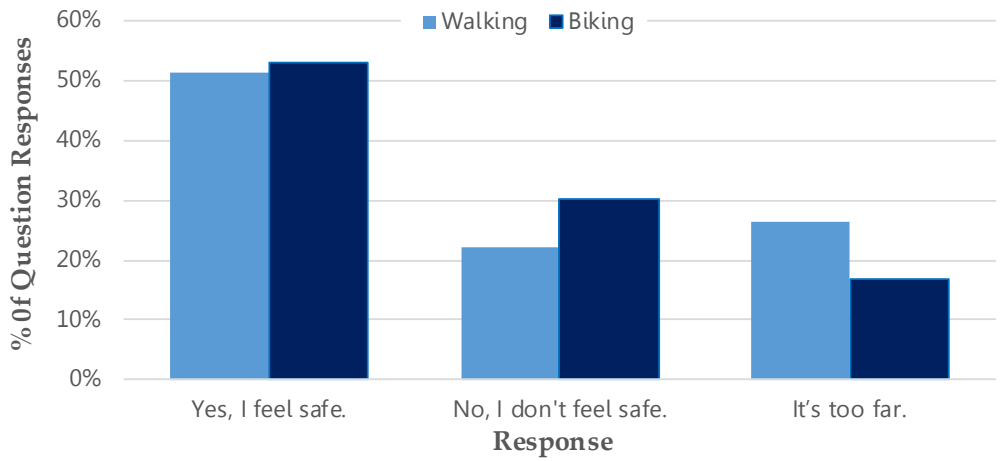
Chart 11H: Visitors to Wharton Parks



Source: GrantWorks Parks & Recreation Survey, 2018

Park proximity and perceived safety of non-motorized access to parks may play a role in the lesser frequency of visits to some of Wharton's other public parks. As *Chart 11I* shows, nearly 1/4 of respondents do not feel safe walking to the nearest public park and another 26% indicated that a walk to the nearest park is too far. Even fewer respondents feel safe riding a bike; 30% of respondents do not feel safe riding a bike to the nearest park.

Chart 11I: Do you feel that you can safely walk or bike to nearest park in Wharton?



Source: GrantWorks Parks & Recreation Survey, 2018

Park Improvements

The survey asked respondents to consider whether existing parks in Wharton should be updated. As *Table 11I* shows, most survey respondents (85%) agree that existing park facilities in Wharton need to be upgraded; 12% of survey respondents indicated that they were not sure.

Table 11I: In your opinion, should existing parks/recreation spaces in Wharton be updated?

Yes	No	Not Sure
85% (162)	3% (5)	12% (23)

Source: GrantWorks Parks & Recreation Survey, 2018

The survey asked respondents to consider what, if anything, would lead them to visit a public park in Wharton more often. *Table 11J* summarizes the comments according to common themes. Themes may be related, such as a more facilities and bigger parks.

Table 11J: What would lead you to visit a public park in Wharton more often?

Improvement	Sample of Comments
Maintenance / Appearance	"Better maintenance"; "more beautification"; "clean restroom"; "no fire ants"; "cleaner"; "cleanliness and maintenance"; "clearer facilities and cleaner appearance"; "better landscaping"; "better grounds"; "clean facilities… restrooms"
Safety / Lighting	"more lighting!!!! I refuse to walk where I'm not safe"; "safe, well-lit"; "police presence… I don't feel safe there"; "better lighting"
Better/Updated Facilities	"upgraded facilities"; "better equipment"; "more interesting equipment"; "newer equipment"; "better things added to the park"; "better, updated equipment"; "MAJOR UPGRADES"
Court/Field Updates	"add volleyball net or have city softball field"; "better goals for basketball"; "better baseball park for sure"
Shade / More Supporting Amenities & Passive Recreation Facilities	"more shaded areas"; "I love the restroom in park 1. Now I can actually go and stay for a bit. But restrooms would be great throughout the popular parks"; "multiple shaded resting areas"; "restroom facilities"; "water fountains"; "more shaded places for parents to sit"; "restrooms, plenty of tables and benches etc."; "bathrooms, more tables and BBQ pits"; "better areas to sit and relax while kids were able to play"; "pavilions"
Better Park Access / Bigger Parks	"more space to play"; "sidewalks to parks and updated environment with more room"; "more accessibility to the river"

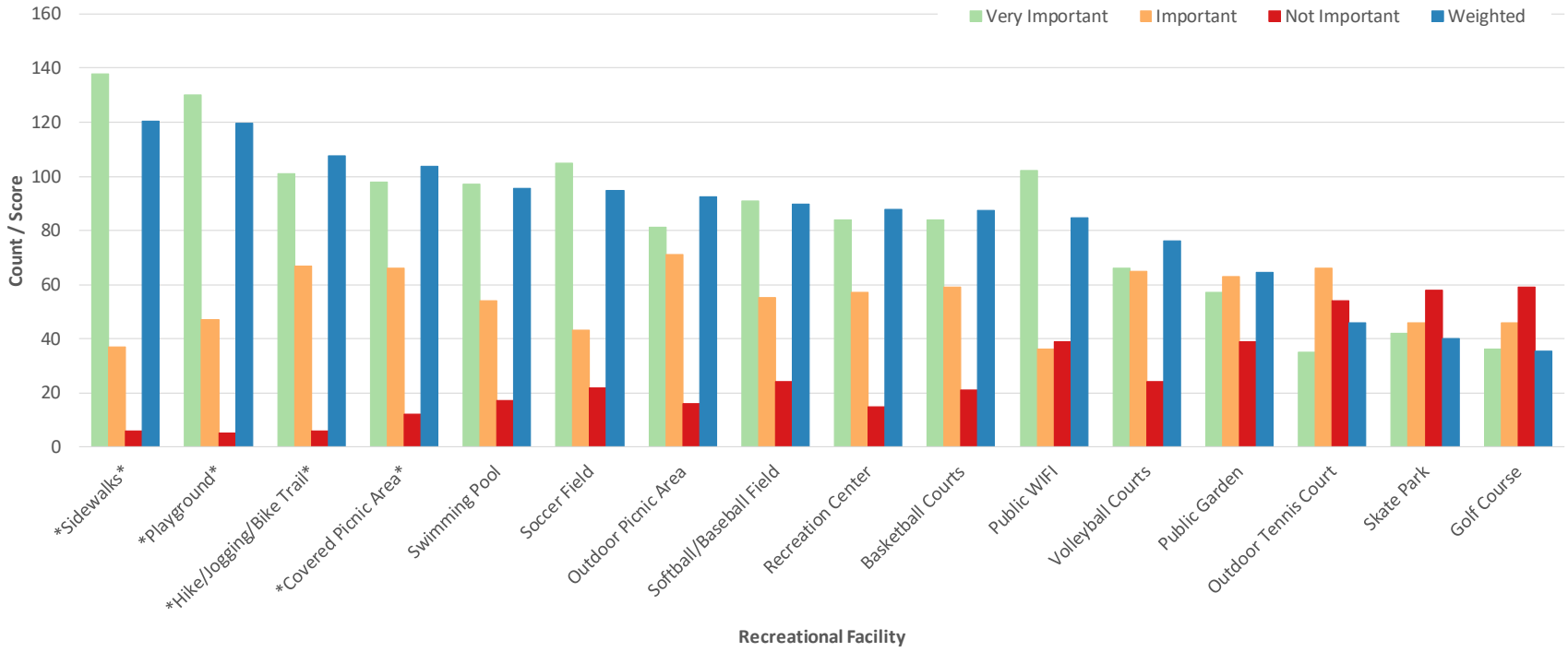
More Facilities / Activities (general)	"more activities"; "more attractions"; "activities to keep my children active"; "more options for activities"; "more equipment"; "different types of features"; "more activities for both kids and adults"
Facilities for Residents of all Ages	"more activities or play equipment for kids with disabilities or sensory needs"; "making parts of the park more adult friendly"; "Area for small children to play. A lot of the newer equipment is 5+"; "while being kid friendly is obviously important it's be nice for an older person to feel welcome"; "more activities for toddlers";" more to do for adults other than walking/running. It would be nice to have parks that were suitable for every member of the family… including pets"
Walk-Run-Bike Facilities	"more walking areas/trails"; "good, longer biking/skating trails maybe along the river"; "a good nature trail"; "trees and hiking-walking trail"; "fitness stations spread out along the Santa Fe Trail and also Mayfair Park"; "walking trail (around the park) for parents & safe bike riding for kids"; "walking track around the park"
Playground Improvements	"more playground equipment"; "playgrounds bigger; "more swings"; "safe, clean, updated equipment that everyone can access (ADA approved); "additional play equipment in the park"
New Court/Field	"basketball courts"; "a soccer field would be nice"; "volleyball courts"; "pickleball";" if we had a sports complex/park"; "a field to play in"
Events	''Planned events"; "special events"; "family nights for the city to attend"; "more special events like movie under the moon or bands"; "more outdoor festivals"
Dog (friendly) Park	"If there was a dog park, I would take my dog there practically every day"; "more trails and places to take my dog"; "clean pet friendly"; "dog park"
Pool / Water Feature	"water relief… such as a splash pad area for small children"; "covered pool"; "a public splash pad for families to enjoy"; "swimming pool, fishing lake"
Other Activities	"more calisthenics"; "birding"; "a skateboard park for kids"; "camping, fishing"; "if there was a 'venue' where meetings could be held";

Source: GrantWorks Parks & Recreation Survey, 2018

Additional Facilities Wanted

Final questions in the survey asked respondents to identify and rank additional recreational facilities in terms of importance and priority. Question 10 asked respondents to review a list of potential new facilities and specify each facility's perceived importance: "very important", "somewhat important", or "not important." The responses were weighted; "very important" facilities received three points, "somewhat important" facilities received two points, and "not important" facilities received minus one point. *Chart 11J* shows the resulting scores. Top important facilities are sidewalks, playground, hike/jogging/bike trail; and a covered picnic area.

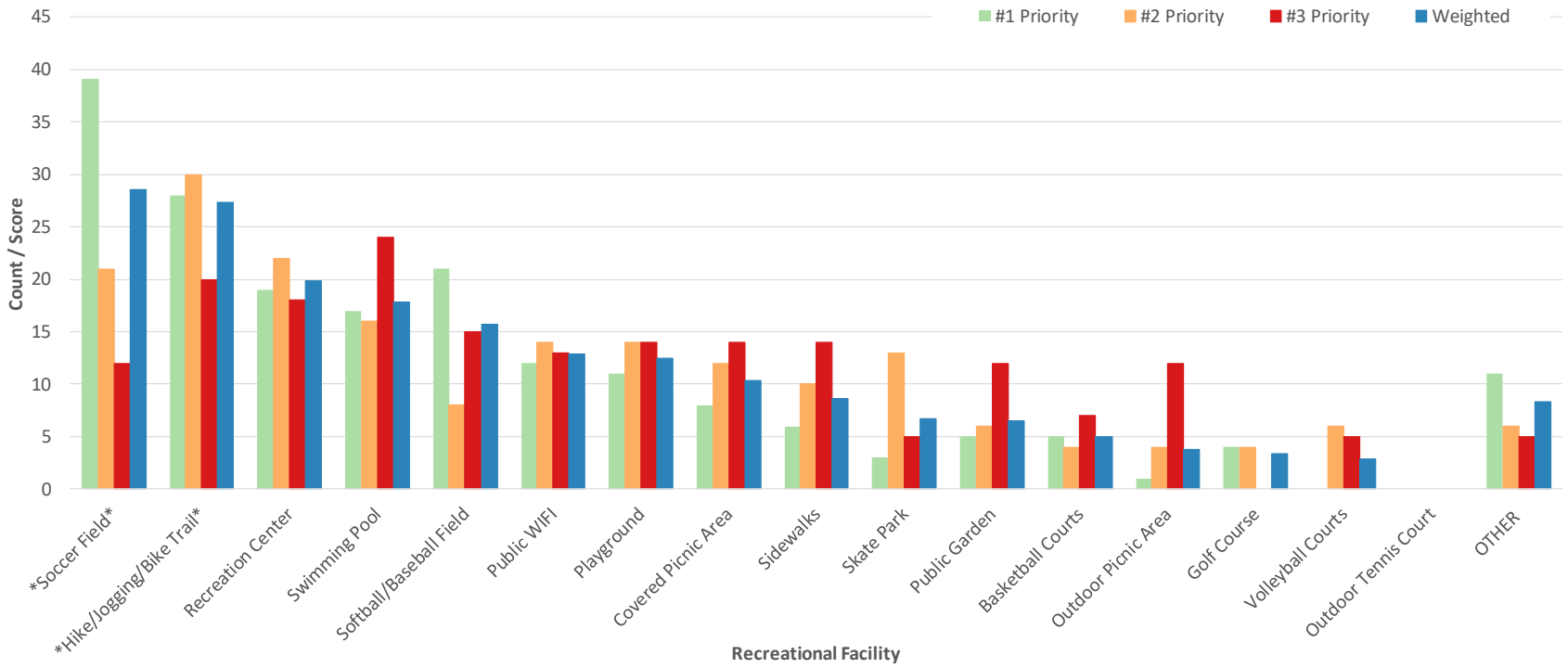
Chart 11J: Additional Facilities by Importance & Weight



Note: Starred recreational facilities (e.g. *Soccer Field*) are top facilities, i.e. facilities receiving a weighted score above or equal to 80% of the highest weighted score.
Source: GrantWorks Parks & Recreation Survey, 2018

Questions 11-13 asked respondents to specify their #1, #2, and #3 priority for an additional recreational facility in Wharton. Respondents could select from a list of the facilities in questions 10 or write-in a new facility. The responses were weighted; #1-rated facilities received three points, #2-rated facilities received two points, and #3-rated facilities received one point. *Chart 11K* shows the resulting scores. Top priority facilities are a soccer field and hike/jogging/bike trail.

Chart 11K: Additional Facilities by Priority & Weight



Note: Starred recreational facilities (e.g. *Soccer Field*) are top facilities, i.e. facilities receiving a weighted score above or equal to 80% of the highest weighted score.

Source: GrantWorks Parks & Recreation Survey, 2018

11.7 Prioritization of Needs

A review of public comments, survey results, and established standards indicates the need for the City of Wharton to enhance existing facilities, make targeted investments in new facilities, and seek partnership with Wharton ISD and other facility/land owners in the area to expand recreational opportunities in Wharton.

Table 11K: Combined Priority Facilities, Standards-based & Demand-based

	Standards-Based Assessment		Demand-Based Assessment
	Facility (# needed)		*Facility (weighted score)*
Currently Needed	General Use/Soccer field	(3)	*Soccer Field*
	Tennis Courts	(3)	*Hike/Jogging/Bike Trail*
	Volleyball Court	(1)	Recreation Center
	Park Bench	(12)	Swimming Pool
	Light Activity Area	(3)	Softball/Baseball Field
	Light activity	(5)	Public WIFI
	Multiuse Trail (miles)	(3-10)	Playground
	Outdoor Events Venue	(1)	Covered Picnic Area
Additional Needed by 2028	General Use/Soccer field	(1)	Sidewalks
	Picnic Table	(7)	Skate Park
	Park Bench	(20)	Public Garden
	Multiuse Trail (miles)	(1 – 2)	Basketball Courts

When establishing priorities to direct future investment it is important to strike a balance between community preferences, standards-based assessments, and the ability of the City to fund construction and maintenance of proposed facilities.

Many of the currently needed facilities identified in the standards-based assessment are already present in Wharton but not accessible to the general public. For example, Wharton ISD facilities include tennis courts, basketball courts, 0.25-mile running tracks, and playgrounds. Most facilities are secured (fenced/locked) and where not secured, access is not assured. The City of Wharton should pursue an interlocal agreement to specify which facilities are available for at least limited public access and when. As the City grows, it may make sense to once again close public access to private facilities. For the time being, however, an interlocal agreement is the best possible use of local resources.

Several other improvements will require additional planning and savings to accomplish and are not likely to occur during the current planning period. For example, based on weighted survey responses, residents selected sidewalks as the most important desired recreational facility and a hike/jogging/bike trail as the third most desired recreational facility (question 12). Survey respondents also ranked hike/jogging/bike trail second on the priority scale (questions 13-15).

Sidewalk and trails development may be the most important component of the effort to successfully expand the City's parks network. Sidewalks and trails offer unparalleled recreation opportunities in terms of serving the broadest range of Wharton residents and function in multiple capacities. Trail systems are attractive amenities for both residents and visitors but, if properly planned, trail systems can also become an integral part of a City's transportation, recreation, and open space systems. The Trail de Paris in Paris, TX,[72] is an excellent example of what is possible. Based on planned expansions, the Trail de Paris will link many of the area schools, parks, and sports complexes. In addition to connecting local facilities and amenities, the trail also functions as a critical link in the North East Texas Trail that runs between Farmersville and New Boston.

The loops referenced in Wharton's previous parks plan provide a very helpful start for sidewalks/trail network development (see *Section 11.3*). However, to ensure proper design, prioritization, and implementation, the City will likely need to develop a new, standalone sidewalk/trails plan. A new plan will ensure that the City considers and specifies key factors related to sidewalk/trail network development, such as:

- Capitalizing on links to existing sidewalks/trails (both local and regional)
- Traffic studies to ensure sidewalks are built along the safest routes possible
- Priority routes
- Management and maintenance
- Available local and grant funding to help bring the project to fruition

[72] http://www.traildeparis.org/

A new plan will also help the City consider and establish a vision and goals for both the system and for individual trails. The visions and goals should address questions such as:

- What is purpose of the system/trail?
- Is the trail itself a destination or is it primarily intended to quickly lead from one place to another?
- How will the trail be used? Should it be developed for single-use (e.g. for pedestrians) or multiuse (e.g. for pedestrians, bicyclists, wheelchairs)?
- What is the anticipated intensity of use? How many anticipated users?
- When/how often will it be used (e.g. year-round, seasonally, day and nighttime use)?

The City will also need to study potential trail lands to understand design limitations and opportunities. Factors like natural contours and soil drainage/durability will impact trail construction and maintenance. For example, pooling water on the trail caused by poorly draining soil or rapidly rushing water caused by steep trail slopes will lead to erosion and result in more frequent and expensive maintenance. Trail design should also consider potential adverse impacts on wildlife and plants. The natural characteristics of the land and the community's vision and goals of the system/trail should inform trail design standards in the plan. Trail design standards include aspects like trail configuration and length; tread surface and width; clearing width and height; grade; water crossing; and any special requirements.

Similarly, major improvements to Riverfront Park, another key recreational amenity in Wharton, are not likely to occur during the current planning period. The City of Wharton received federal funding to construct a series of levees along the Colorado River to prevent future flooding. One levee will be constructed near Riverfront Park. To ensure that improvements are designed to both support and benefit from the levee use, extensive Riverfront Park improvements should not take occur until the levee location and design is finalized. Detailed concept planning for the park will also be important for accomplishing this goal.

Park Priorities by Type

The City of Wharton has established the following development priorities.

Outdoor Construction-related Priorities (OC):

Priority 1:	Continue developing sidewalk/trails network to link existing and future parks. Focus on connecting parks to ISD schools and downtown.
Priority 2:	Construct at least three (3) general use/soccer fields at Harris Park.
Priority 3:	Construct at least three (3) tennis courts by 2028.
Priority 4:	Construct at least one (1) volleyball court by 2028.
Priority 5:	Construct at least one (1) outdoor event venue by 2028.
Priority 6:	Install at least seven (7) additional picnic tables at area parks.
Priority 7:	Install at least twenty-two (22) additional benches.
Priority 8:	Install three (3) light activity areas.
Priority 9:	Construct at least one (1) additional general use/soccer field at an area park by 2028.
Priority 10:	Develop activities pursued by elderly residents such as horseshoes, shuffleboard, or domino/cards game tables where none currently exist and as needed.
Priority 11:	Install inclusive play activities (such as a "scent or sensory garden") and inclusive playground equipment that can be enjoyed by children with physical disabilities.
Priority 12:	Conduct annual tree planting campaign; plant ten (10) trees per year.
Priority 13:	Develop exhibits at park facilities to foster nature appreciation and to educate visitors about local flora, fauna, and geology. This can include community gardens and xeriscaped gardens.
Priority 14:	Develop native grass and garden areas along floodplain to preserve habitat and support natural functioning of floodplain. Encourage residents to do the same on private property.
Priority 15:	Remove dilapidated equipment from all park areas.
Priority 16:	Encourage development of other outdoor activities typically operated by private businesses such as a skate park, equestrian facilities, miniature golf, bicycle motor-cross, or a mountain-bike trail.
Priority 17:	Dedicate open space and natural areas to limit floodplain development and to ensure that unique features are preserved.

Indoor Construction-related Priorities (IC):

Priority 1:	Encourage development of other indoor activities typically operated by private businesses such as a movie theater, bowling alley, roller-skating rink, gymnastics/twirling center, and indoor rodeo facilities.

Ongoing Non-Construction Priorities (NC):

Action Item 1:	Develop a shared-resources plan with Wharton ISD and other community partners to ensure all available area facilities are properly maintained and can be utilized year-round; review biennially.
Action Item 2:	Continue to budget sufficient funds for park maintenance.
Action Item 3:	Continue to budget sufficient funds for on-going facility development.
Action Item 4:	Develop master plan for Wharton sidewalk/trails network.
Action Item 5:	Establish Riverfront Park concept planning as a key subject for further review, study, and recommendation by the City Council Parks and Recreation Committee and the Wharton Economic Development Corporation.
Action Item 6:	Adopt updated subdivision ordinance with mandatory park land dedication policy.
Action Item 7:	Develop policy to educate public regarding benefits of private donation of land to be used for parks, greenbelts, and open space.
Action Item 8:	Establish a voluntary park donation fund for maintenance, repair, upgrade of City parks, neighborhood mini-parks and play lots. Solicitation could be added to the City utility bill.
Action Item 9:	Establish "community work day" at parks to cleanup vacant lots, improve property with frontage on thoroughfares, and/or accomplish a portion of park development using volunteer labor. Tasks can include site preparation, clean-up and preliminary construction tasks. Seek volunteers from local citizens, City staff, community service workers, chamber of commerce, school district, the Little League, and civic groups.
Action Item 10:	Continue programing and festivals at public parks. Festivals and events provide diverse activities not normally available in the park and enhance the usefulness of the facilities. These events can also highlight the community's cultural diversity or offer special events such as kite-flying contests or bike-a-thons. Earmark any proceeds from activities for use in park improvement projects.
Action Item 11:	Schedule biennial reviews of Parks Master Plan to update inventory and priority needs lists. Solicit new public input every five years.
Action Item 12:	Schedule creation of new Parks Master Plan

11.8 Recreation & Open Space Plan

This plan is designed to be implemented during a 10-year period starting with fiscal year 2018-2019 and ending with fiscal year 2027-2028. The plan addresses the full spectrum of the City's new construction, maintenance, and operation needs to ensure that the highest quality park, recreation, and open space opportunities are available.

The following implementation plan sets forth the most reasonable development timeline assuming funding resources are available. The items are identified as Construction (C) priorities or as non-construction (NC) action items. Outdoor activities are identified as OC. Indoor activities are identified as IC.

Potential methods of funding for these projects are identified. These potential sources include:

- Local general funds;
- General obligation bonds;
- Certificates of obligation (CO's);
- Sales tax revenue;
- Local in-kind labor;
- Donations of land, cash, materials and labor from private individuals; and
- Grants from Texas Parks & Wildlife Department (TPWD) through the outdoor, indoor, trails, and small community programs, and the TPWD Community Outdoor Outreach Program (COOP).

The following plan outlines projects the City should strive to achieve on a short-term basis within the first five years of the planning period and on a long-term basis. The plan derives from the above analyses: the inventory of existing conditions, including physical and social resources; the standards-based assessment; and the needs-based assessment.

Table 11L: Implementation Plan: 2018 -2028

FY 2018-2019 (10/1/18 to 9/30/19)

Implementation Item	Action Item	Estimated Cost	Funding Source(s)
Develop a shared-resources plan with Wharton ISD and other community partners to ensure all available area facilities are properly maintained and can be utilized year-round.	NC 1	< $1,000 (legal)	GEN; ISD; WCJC; WGS; WYS
Adopt updated subdivision ordinance with mandatory park land dedication policy.	NC 6	< $1,000 (legal)	GEN
Develop a policy to educate public regarding benefits of private donation of land to be used for parks, greenbelts, and open space.	NC 7	< $,1000	GEN
Establish Riverfront Park concept planning as a key subject for further review, study, and recommendation by the City Council Parks & Recreation Committee and the Wharton Economic Development Corporation.	NC 5	Staff	GEN
Annual: Continue to budget sufficient funds for park maintenance and for on-going facility development.	NC 1 NC 2	$350,000 ±	GEN; EDC
Annual: Continue programming and festivals at public parks. *Festivals and events provide diverse activities not normally available in the park and enhance the usefulness of facilities. These events can also highlight the community's cultural diversity or offer special events such as kite-flying contests or bike-a-thons.* Earmark any proceeds from activities for use in park improvement projects.	NC 10	$5,000-$10,000	GEN; Local

GEN = City of Wharton Municipal Funds; **CDBG** = Community Development Block Grant Program; **EDC** = City of Wharton Economic Development Corporation (4B); **ISD** = Wharton ISD; **Local** = Donations from private citizens, organization, and local businesses; **TDA DRP** = Texas Department of Agriculture Downtown Revitalization Program; **TPWD** = Texas Parks & Wildlife Department; **TxDOT** = Texas Department of Transportation Statewide Transportation Enhancement Grants, Transportation Alternative Program; **WCJC** = Wharton County Junior College; **WGS** = Wharton Girls Softball Club; **WYS** = Wharton Youth Soccer Club

FY 2019-2020 (10/1/19 to 9/30/20)			
Implementation Item	**Action Item**	**Estimated Cost**	**Funding Source**
Apply for funding fall 2020 to the TPWD Local Parks Small Community Recreation program to improve Harris Park.	OC 2 – 8 OC 14	Variable	GEN
Conduct cleanup of vacant lots and improvements to property with frontage on thoroughfares. Establish a "community work day" to accomplish a portion of related projects.	NC 9	< $1,000	GEN; Local; TDA-DRP
Establish a voluntary donation fund to maintenance, repair, and upgrade City parks. Solicitation could be added to City utility bill.	NC 8	< $1,000	GEN
Continue discussions regarding Riverfront Park concept planning.	NC 5	Staff	GEN
Annual: Continue to budget sufficient funds for park maintenance and for on-going facility development.	NC 1 NC 2	$350,000 ±	GEN; EDC
Annual: Continue programming and festivals at public parks. Earmark any proceeds from activities for use in park improvement projects.	NC 10	$5,000-$10,000	GEN; Local

GEN = City of Wharton Municipal Funds; **CDBG** = Community Development Block Grant Program; **EDC** = City of Wharton Economic Development Corporation (4B); **ISD** = Wharton ISD; **Local** = Donations from private citizens, organization, and local businesses; **TDA DRP** = Texas Department of Agriculture Downtown Revitalization Program; **TPWD** = Texas Parks & Wildlife Department; **TxDOT** = Texas Department of Transportation Statewide Transportation Enhancement Grants, Transportation Alternative Program; **WCJC** = Wharton County Junior College; **WGS** = Wharton Girls Softball Club; **WYS** = Wharton Youth Soccer Club

FY 2020-2021 (10/1/20 to 9/30/21)			
Implementation Item	**Action Item**	**Estimated Cost**	**Funding Source**
Start annual Tree Planting Campaign; plant 10 trees per year. Prioritize public spaces and thoroughfares	OC 12	< $1,000	GEN; Local
Establish "community work day" at parks to accomplish a portion of development using volunteer labor. Remove debris and dilapidated equipment from all park areas. Tasks can include site preparation, clean-up, and preliminary construction tasks. Seek volunteers from residents, City Staff, community service workers, EDC, school district, religious and civic groups, etc.	NC 9	< $1,000	GEN; Local
Review shared resources plans to ensure all available area facilities are property maintained and can be utilized year-round.	NC 1	< $,1000 (legal)	GEN; ISD; WCJC; WGS; WYS
Conduct a biennial review of Parks Master Plan and update priority list and inventory, if needed.	NC 11	Staff	GEN
Continue discussions regarding Riverfront Park concept planning.	NC 5	Staff	GEN
Annual: Continue to budget sufficient funds for park maintenance and for on-going facility development.	NC 1 NC 2	$350,000 ±	GEN; EDC
Annual: Continue programming and festivals at public parks. Earmark any proceeds from activities for use in park improvement projects.	NC 10	$5,000-$10,000	GEN; Local
Annual: Continue "community work day" to accomplish a portion of projects related to cleanup of vacant lots and improvements to properties with frontage on thorough-fare, as well as parks improvements.	NC 9	< $ 1,000	GEN; Local

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FY 2021-2022 (10/1/21 to 9/30/22)			
Implementation Item	**Action Item**	**Estimated Cost**	**Funding Source**
Construct improvements to Harris Park including at least three (3) general use/soccer fields, one (1) light activity area, picnic tables with BBQ grills, and park benches as appropriate.	OC 2 – 8 OC 14	Up to $75,000 (or 50% match of TPWD grant funds)	GEN; EDC; TPWD (total grant and match not to exceed $150,000)
Install inclusive play activities (such as "scent or sensory garden") and inclusive playground equipment that can be enjoyed by children with physical disabilities at Wharton parks as appropriate.	OC 11	$2,000/per	GEN; EDC
Install passive activity areas that can be enjoyed by elderly residents (such as horseshoes or domino/card tables) at Wharton Parks, as appropriate.	OC 1	$2,000/per	GEN; EDC
Continue discussions regarding Riverfront Park concept planning.	NC 5	Staff	GEN
Annual: Continue to budget sufficient funds for park maintenance and for on-going facility development.	NC 1 NC 2	$350,000 ±	GEN; EDC
Annual: Continue programming and festivals at public parks. Earmark any proceeds from activities for use in park improvement projects.	NC 10	$5,000-$10,000	GEN; Local
Annual: Continue "community work day" to accomplish a portion of projects related to cleanup of vacant lots and improvements to properties with frontage on thorough-fare, as well as parks improvements.	NC 9	< $ 1,000	GEN; Local
Annual: Continue Tree Planting Campaign; plant 10 trees per year. Prioritize public spaces and thoroughfares.	OC 12	< $1,000	GEN; Local

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FY 2022-2023 (10/1/22 to 9/30/23)			
Implementation Item	**Action Item**	**Estimated Cost**	**Funding Source**
Develop master plan for Wharton's sidewalk/trails network.	NC 4	Variable	GEN
Develop exhibits at park facilities and floodplain areas to foster nature appreciation and to educate visitors about local flora, fauna, and geology. This can include community gardens and xeriscape gardens.	OC 13	$2,000	GEN; Local
Review shared resources plans to ensure all available area facilities are property maintained and can be utilized year-round.	NC 1	< $,1000 (legal)	GEN; ISD; WCJC; WGS; WYS
Continue discussions regarding Riverfront Park concept planning.	NC 5	Staff	GEN
Annual: Continue to budget sufficient funds for park maintenance and for on-going facility development.	NC 1 NC 2	$350,000 ±	GEN; EDC
Annual: Continue programming and festivals at public parks. Earmark any proceeds from activities for use in park improvement projects.	NC 10	$5,000-$10,000	GEN; Local
Annual: Continue "community work day" to accomplish a portion of projects related to cleanup of vacant lots and improvements to properties with frontage on thorough-fare, as well as parks improvements.	NC 9	< $ 1,000	GEN; Local
Annual: Continue Tree Planting Campaign; plant 10 trees per year. Prioritize public spaces and thoroughfares.	OC 12	< $1,000	GEN; Local

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FY 2023-2024 (10/1/23 to 9/30/24)			
Implementation Item	**Action Item**	**Estimated Cost**	**Funding Source**
Review mandatory park land dedication policy to ensure formula is sufficient to provide needed park land in new subdivisions.	NC 6	< $1,000	GEN
Develop native grass and garden areas along floodplain to preserve habitat and support natural functioning of floodplain. Encourage residents to do the same on private property.	OC 4	$2,000	GEN; Local
Review the Parks Master Plan and solicit new public input; update as needed.	NC 11	< $1,000; Staff	GEN
Continue discussions regarding Riverfront Park concept planning.	NC 5	Staff	GEN
Annual: Continue to budget sufficient funds for park maintenance and for on-going facility development.	NC 1 NC 2	$350,000 ±	GEN; EDC
Annual: Continue programming and festivals at public parks. Earmark any proceeds from activities for use in park improvement projects.	NC 10	$5,000-$10,000	GEN; Local
Annual: Continue "community work day" to accomplish a portion of projects related to cleanup of vacant lots and improvements to properties with frontage on thorough-fare, as well as parks improvements.	NC 9	< $ 1,000	GEN; Local
Annual: Continue Tree Planting Campaign; plant 10 trees per year. Prioritize public spaces and thoroughfares.	OC 12	< $1,000	GEN; Local

GEN = City of Wharton Municipal Funds; **CDBG** = Community Development Block Grant Program; **EDC** = City of Wharton Economic Development Corporation (4B); **ISD** = Wharton ISD; **Local** = Donations from private citizens, organization, and local businesses; **TDA DRP** = Texas Department of Agriculture Downtown Revitalization Program; **TPWD** = Texas Parks & Wildlife Department; **TxDOT** = Texas Department of Transportation Statewide Transportation Enhancement Grants, Transportation Alternative Program; **WCJC** = Wharton County Junior College; **WGS** = Wharton Girls Softball Club; **WYS** = Wharton Youth Soccer Club

FY 2024-2025 (10/1/24 to 9/30/25)			
Implementation Item	**Action Item**	**Estimated Cost**	**Funding Source**
Apply to TPWD Recreational Trails Fund (January 2025) and/or to Tx-DOT-Transportation Alternative Program extend Santa Fe Trail through Mayfair Park, and/or elsewhere as specified in sidewalk/trails network master plan.	OC 1 OC 7	Variable	GEN
Apply for funding in fall 2025 to TPWD Small Community Recreation Program to improve Mayfair Park.	OC 1-11	Variable	GEN
Review shared resources plans to ensure all available area facilities are property maintained and can be utilized year-round.	NC 1	< $,1000 (legal)	GEN; ISD; WCJC; WGS; WYS
Continue discussions regarding Riverfront Park concept planning.	NC 5	Staff	GEN
Annual: Continue to budget sufficient funds for park maintenance and for on-going facility development.	NC 1 NC 2	$350,000 ±	GEN; EDC
Annual: Continue programming and festivals at public parks. Earmark any proceeds from activities for use in park improvement projects.	NC 10	$5,000-$10,000	GEN; Local
Annual: Continue "community work day" to accomplish a portion of projects related to cleanup of vacant lots and improvements to properties with frontage on thorough-fare, as well as parks improvements.	NC 9	< $ 1,000	GEN; Local
Annual: Continue Tree Planting Campaign; plant 10 trees per year. Prioritize public spaces and thoroughfares.	OC 12	< $1,000	GEN; Local

GEN = City of Wharton Municipal Funds; **CDBG** = Community Development Block Grant Program; **EDC** = City of Wharton Economic Development Corporation (4B); **ISD** = Wharton ISD; **Local** = Donations from private citizens, organization, and local businesses; **TDA DRP** = Texas Department of Agriculture Downtown Revitalization Program; **TPWD** = Texas Parks & Wildlife Department; **TxDOT** = Texas Department of Transportation Statewide Transportation Enhancement Grants, Transportation Alternative Program; **WCJC** = Wharton County Junior College; **WGS** = Wharton Girls Softball Club; **WYS** = Wharton Youth Soccer Club

FY 2025-2026 (10/1/25 to 9/30/26)			
Implementation Item	**Action Item**	**Estimated Cost**	**Funding Source**
Encourage development of other outdoor activities typically operated by private businesses such as a skate park, equestrian facilities, miniature golf, bicycle motocross, and a mountain bike trail.	OC 16	Staff	GEN; Chamber; Local
Encourage development of other indoor activities typically operated by private businesses such as a movie theater, bowling alley, roller-skating rink, gymnastics/twirling centers, and indoor rodeo facilities.	IC 1	Staff	GEN; Chamber; Local
Continue discussions regarding Riverfront Park concept planning.	NC 5	Staff	GEN
Annual: Continue to budget sufficient funds for park maintenance and for on-going facility development.	NC 1 NC 2	$350,000 ±	GEN; EDC
Annual: Continue programming and festivals at public parks. Earmark any proceeds from activities for use in park improvement projects.	NC 10	$5,000-$10,000	GEN; Local
Annual: Continue "community work day" to accomplish a portion of projects related to cleanup of vacant lots and improvements to properties with frontage on thorough-fare, as well as parks improvements.	NC 9	< $ 1,000	GEN; Local
Annual: Continue Tree Planting Campaign; plant 10 trees per year. Prioritize public spaces and thoroughfares.	OC 12	< $1,000	GEN; Local

GEN = City of Wharton Municipal Funds; **CDBG** = Community Development Block Grant Program; **Chamber** = Wharton Chamber of Commerce; **EDC** = City of Wharton Economic Development Corporation (4B); **ISD** = Wharton ISD; **Local** = Donations from private citizens, organization, and local businesses; **TDA DRP** = Texas Department of Agriculture Downtown Revitalization Program; **TPWD** = Texas Parks & Wildlife Department; **TxDOT** = Texas Department of Transportation Statewide Transportation Enhancement Grants, Transportation Alternative Program; **WCJC** = Wharton County Junior College; **WGS** = Wharton Girls Softball Club; **WYS** = Wharton Youth Soccer Club

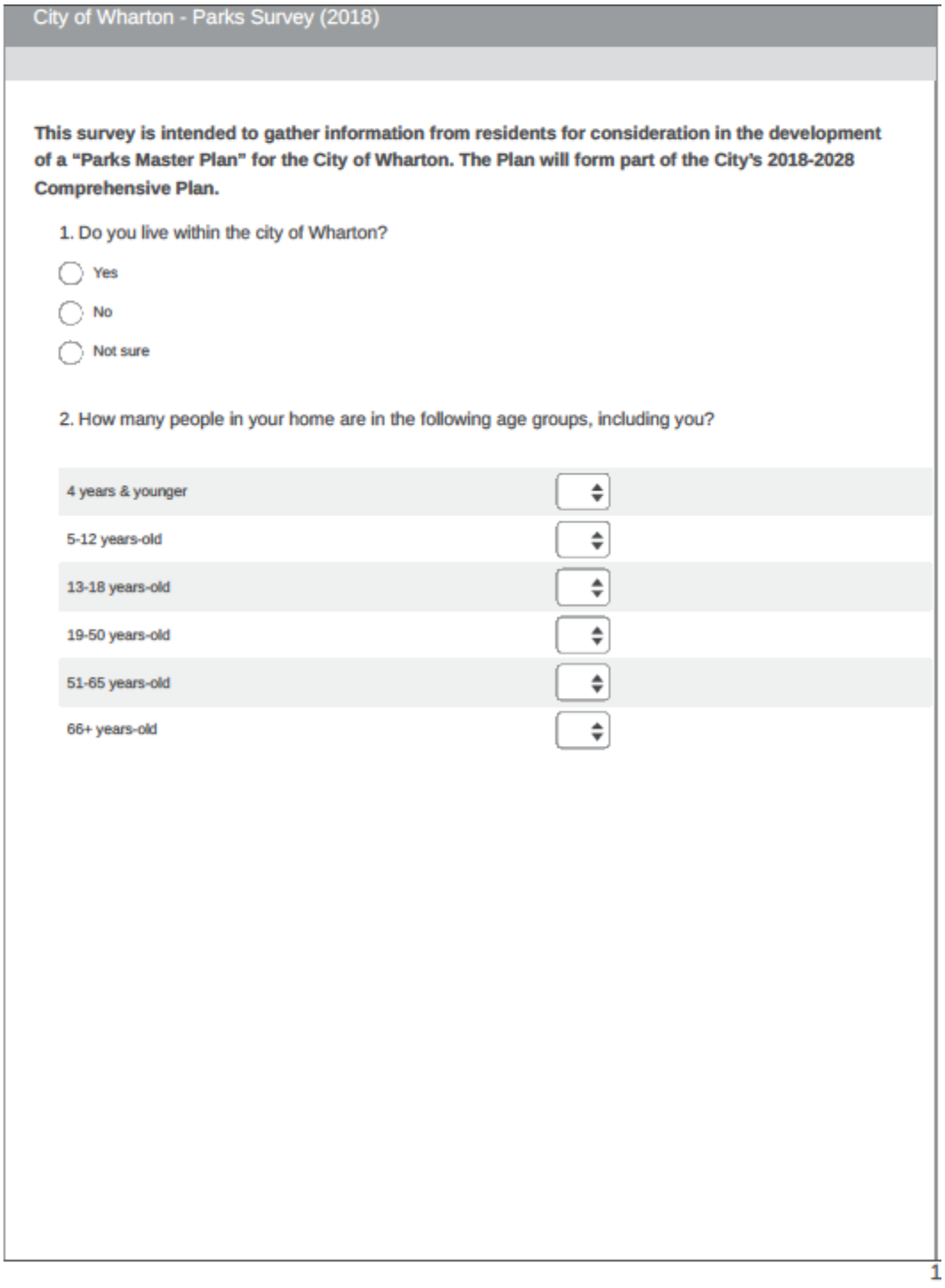
FY 2026-2027 (10/1/26 to 9/30/27)			
Implementation Item	**Action Item**	**Estimated Cost**	**Funding Source**
Extend Santa Fe Trail through Mayfair Park and/or elsewhere as specified in the sidewalk/trails network master plan.	OC 1 OC 7	Up to $240,000 + TxDOT Funds (variable)	GEN; EDC: TPWD (City contribution would be up to $40,000 as 20% of match); TxDOT-TA (20% match required)
Construct improvements to Mayfair Park according to facility needs in updated Parks Master Plan.	OC 1-11	Up to $75,000 (or 50% match of TPWD grant funds)	GEN; EDC; TPWD (total grant and match not to exceed $150,000)
Dedicate open space and natural areas to limit future floodplain development and to ensure that unique features are preserved.	OC 17	Varies by program	GEN; Local
Review shared resources plans to ensure all available area facilities are property maintained and can be utilized year-round.	NC 1	< $,1000 (legal)	GEN; ISD; WCJC; WGS; WYS
Conduct a biennial review of Parks Master Plan and update priority list and inventory, if needed.	NC 11	Staff	GEN
Continue discussions regarding Riverfront Park concept planning.	NC 5	Staff	GEN
Annual: Continue to budget sufficient funds for park maintenance and for on-going facility development.	NC 1 NC 2	$350,000 ±	GEN; EDC
Annual: Continue programming and festivals at public parks. Earmark any proceeds from activities for use in park improvement projects.	NC 10	$5,000-$10,000	GEN; Local
Annual: Continue "community work day" to accomplish a portion of projects related to cleanup of vacant lots and improvements to properties with frontage on thorough-fare, as well as parks improvements.	NC 9	< $ 1,000	GEN; Local
Annual: Continue Tree Planting Campaign; plant 10 trees per year. Prioritize public spaces and thoroughfares.	OC 12	< $1,000	GEN; Local

GEN = City of Wharton Municipal Funds; **CDBG** = Community Development Block Grant Program; **EDC** = City of Wharton Economic Development Corporation (4B); **ISD** = Wharton ISD; **Local** = Donations from private citizens, organization, and local businesses; **TDA DRP** = Texas Department of Agriculture Downtown Revitalization Program; **TPWD** = Texas Parks & Wildlife Department; **TxDOT** = Texas Department of Transportation Statewide Transportation Enhancement Grants, Transportation Alternative Program

FY 2027-2028 (10/1/27 to 9/30/28)			
Implementation Item	**Action Item**	**Estimated Cost**	**Funding Source**
Schedule creation of a new Master Park Plan.	NC 12	$10,000	GEN; CDBG
Annual: Continue to budget sufficient funds for park maintenance and for on-going facility development.	NC 1 NC 2	$350,000 ±	GEN; EDC
Annual: Continue programming and festivals at public parks. Earmark any proceeds from activities for use in park improvement projects.	NC 10	$5,000-$10,000	GEN; Local
Annual: Continue "community work day" to accomplish a portion of projects related to cleanup of vacant lots and improvements to properties with frontage on thorough-fare, as well as parks improvements.	NC 9	< $ 1,000	GEN; Local
Annual: Continue Tree Planting Campaign; plant 10 trees per year. Prioritize public spaces and thoroughfares	OC 12	< $1,000	GEN; Local

GEN = City of Wharton Municipal Funds; **CDBG** = Community Development Block Grant Program; **EDC** = City of Wharton Economic Development Corporation (4B); **ISD** = Wharton ISD; **Local** = Donations from private citizens, organization, and local businesses; **TDA DRP** = Texas Department of Agriculture Downtown Revitalization Program; **TPWD** = Texas Parks & Wildlife Department; **TxDOT** = Texas Department of Transportation Statewide Transportation Enhancement Grants, Transportation Alternative Program; **WCJC** = Wharton County Junior College; **WGS** = Wharton Girls Softball Club; **WYS** = Wharton Youth Soccer Club

11.9 Appendix 11A: Survey



City of Wharton - Parks Survey (2018)

This survey is intended to gather information from residents for consideration in the development of a "Parks Master Plan" for the City of Wharton. The Plan will form part of the City's 2018-2028 Comprehensive Plan.

1. Do you live within the city of Wharton?

- ◯ Yes
- ◯ No
- ◯ Not sure

2. How many people in your home are in the following age groups, including you?

4 years & younger	
5-12 years-old	
13-18 years-old	
19-50 years-old	
51-65 years-old	
66+ years-old	

1

3. What types of activities do the children in your family like to do? Select all that apply)

- [ ] Basketball
- [ ] Cross Country/Running
- [ ] Hunting/Shooting
- [ ] Football
- [ ] Swimming
- [ ] Martial Arts
- [ ] Baseball
- [ ] Tennis
- [ ] Boxing
- [ ] Soccer
- [ ] Golf
- [ ] Horseback Riding
- [ ] Softball
- [ ] Skateboarding
- [ ] Hiking
- [ ] Volleyball
- [ ] Gymnastics
- [ ] Walking
- [ ] Cheerleading
- [ ] Dance
- [ ] Bowling
- [ ] Track/Field
- [ ] Bicycling/BMX
- [ ] Fishing
- [ ] Other (Please describe):

2

4. What types of activities do the adults in your family like to do? Check the boxes for all that apply.

- ☐ Basketball
- ☐ Cross Country/Running
- ☐ Hunting/Shooting
- ☐ Football
- ☐ Swimming
- ☐ Martial Arts
- ☐ Baseball
- ☐ Tennis
- ☐ Boxing
- ☐ Soccer
- ☐ Golf
- ☐ Horseback Riding
- ☐ Softball
- ☐ Skateboarding
- ☐ Hiking
- ☐ Volleyball
- ☐ Gymnastics
- ☐ Walking
- ☐ Cheerleading
- ☐ Dance
- ☐ Bowling
- ☐ Track/Field
- ☐ Bicycling/BMX
- ☐ Fishing
- ☐ Other (Please describe):

3

5. Where do you and your family participate in sports and other recreational activities? (Select all that apply)

- [ ] Home
- [ ] Friend's Home
- [ ] School (Wharton ISD/Junior College)
- [ ] Croom Park 1
- [ ] Croom Park 2
- [ ] Train Depot
- [ ] Dinosaur Park
- [ ] Guadalupe Park
- [ ] Harris Park
- [ ] Mayfair Park
- [ ] Pleasure Park
- [ ] Riverfront Park
- [ ] Santa Fe Trail
- [ ] Wharton Country Club
- [ ] State Parks, Wildlife Areas, Refuges, etc.
- [ ] Other (Please describe any other parks in the region that you visit):

6. How many times a week do you visit a park in Wharton?

7. What, if anything, would lead you to visit a public park in Wharton more often?

8. Do you feel that you can safely walk or ride a bike to the nearest park?

Walking	
Biking	

4

9. In your opinion, should existing parks/recreation spaces in Wharton be updated?

- ◯ Yes
- ◯ No
- ◯ Not sure

If you answered 'Yes', what kind of improvements are needed?

10. What additional recreational facilities would you like to have in Wharton? Please rate each facility according to how important you think it is (very, somewhat, or not important).

	Very important	Important	Not important	No opinion
Recreation Center	◯	◯	◯	◯
Hike/Jogging/Bike Trail	◯	◯	◯	◯
Swimming Pool	◯	◯	◯	◯
Outdoor Tennis Court	◯	◯	◯	◯
Softball/Baseball Field	◯	◯	◯	◯
Soccer Field	◯	◯	◯	◯
Covered Picnic Area	◯	◯	◯	◯
Outdoor Picnic Area	◯	◯	◯	◯
Golf Course	◯	◯	◯	◯
Playground	◯	◯	◯	◯
Basketball Courts	◯	◯	◯	◯
Volleyball Courts	◯	◯	◯	◯
Sidewalks	◯	◯	◯	◯
Skate Park	◯	◯	◯	◯
Public Garden	◯	◯	◯	◯
Public WIFI	◯	◯	◯	◯

Please describe any other recreational facilities that you feel are very important:

11. What is your #1 priority for an additional recreation facility in Wharton? If your priority is not listed, please select "Other" and list it in the comment box.

12. What is your #2 priority for an additional recreation facility in Wharton? If your priority is not listed, please select "Other" and list it in the comment box.

13. What is your #3 priority for an additional recreation facility in Wharton? If your priority is not listed, please select "Other" and list it in the comment box.

6

11.10 Appendix 11B: Individual Park Inventories

CROOM 1 PARK (9.96 acres)

	#	Notes
TEAM SPORT COURTS & FIELDS **[1]**		
Softball/Little League Field	4	
COURT/FIELD SUPPORTING **[1]**		
Announcer's Box	1	
Batting Cage	2	
Bleachers	11	
Dugouts	8	
Flagpole	1	
Scoreboard	3	
Trashcans	4	
Pressbox	1	
PLAYGROUND		
Merry-go Rounds	1	
Monkey Bars/Jungle Gyms	1	
Playscapes	1	
See-saws	2	Fair condition (some deterioration)
Swings	4	
PASSIVE		
Barbeque Grills	2	
Pavilions	1	
Picnic Tables - Covered	4	Under pavilion
Picnic Tables - Uncovered	1	
GENERAL		
Restrooms	2	
Trashcans	4	

[1] The Wharton Girls Softball Association leases the park land where these facilities are constructed from the City of Wharton and has sole authority to permit field/facility use. The Association maintains all internal areas (i.e. all maintenance that is not mowing).

CROOM 2 PARK (2.19 acres)

	#	Notes
TEAM SPORT COURTS & FIELDS		
Basketball Court	2	
COURT/FIELD SUPPORTING		
Flagpole	1	
PLAYGROUND		
Merry-go Rounds	1	
Playscapes	1	
See-saws	1	
Swings	2	
PASSIVE		
Barbeque Grills	1	
Pavilions	1	
Picnic Tables - Covered	4	Under pavilion
Picnic Tables - Uncovered	2	
GENERAL		
Trashcans	3	
Water fountain	1	Poor condition
Restrooms	2	

DINOSAUR PARK (2.96 acres)

	#	Notes
TEAM SPORT COURTS & FIELDS		
Basketball Court	1	Fair condition
PLAYGROUND		
Monkey Bars/Jungle Gyms	1	
Playscapes	2	
Swings	4	
WALK – BIKE - RUN		
Paved Multiuse Trail (miles)	0.16	5', concrete
PASSIVE		
Pavilions	1	
Picnic Tables - Covered	5	
Picnic Tables - Uncovered	0	
GENERAL		
Trashcans	3	

GUADALUPE PARK (2.17 acres)

	#	Notes
TEAM SPORT COURTS & FIELDS		
Basketball Court	1	Fair condition
PLAYGROUND		
Merry-go Rounds	1	
Playscapes	1	
Spring Riders	2	
Swings	10	Six (6) swings in poor condition
PASSIVE		
Barbeque Grills	1	
Park Bench	1	
Pavilions	1	
Picnic Tables - Covered	2	
GENERAL		
Trashcans	1	
Restrooms	2	

HARRIS PARK (6.36 acres)

	#	Notes
TEAM SPORT COURTS & FIELDS		
Softball/ Little League Field	1	
Basketball Court	2	
COURT/FIELD SUPPORTING		
Bleachers	1	
Lights	6	
PLAYGROUND		
Monkey Bars/Jungle Gyms	2	
Playscapes	2	
Slides	1	
Swings	4	
PASSIVE		
Barbeque Grills	3	
Pavilions	1	
Picnic Tables - Covered	9	Under pavilion
Picnic Tables - Uncovered	5	Two (2) concrete tables w/o seats
GENERAL		
Restrooms	2	
Trashcans	6	

MAYFAIR PARK (10.38 acres)

	#	Notes
TEAM SPORT COURTS & FIELDS		
Softball/ Little League Field	1	Backstop & fence only
PASSIVE		
Park Bench	1	
Picnic Tables - Uncovered	1	
GENERAL		
Chin-up bar	1	

PLEASURE PARK (12.43 acres)

	#	Notes
TEAM SPORT COURTS & FIELDS		
Softball/ Little League Field	1	
COURT/FIELD SUPPORTING		
Bleachers	4	
Flagpole	1	
Lights	6	
Scoreboard	1	
Trashcans	2	
PLAYGROUND		
Monkey Bars/Jungle Gyms	1	
Slides	1	
Swings	4	
PASSIVE		
Barbeque Grills	3	
Picnic Tables - Uncovered	9	
GENERAL		
Restrooms	2	
Trashcans	6	

RIVERFRONT PARK (12.32 acres)

	#	Notes
TEAM SPORT COURTS & FIELDS		
Basketball Court	1	
PLAYGROUND		
Playscapes	1	
Swings	4	
WALK - BIKE - RUN		
Paved Multiuse Trail (miles)	0.4	4', concrete (small dirt section); Fair condition, major crack/breakage & uneven in some sections.
WATER		
Fishing Dock	2	
PASSIVE		
Barbeque Grills/Smokers	8	
Park Bench	5	
Pavilions	2	
Picnic Tables - Covered	15	Under pavilions; Six (6) in poor condition
Picnic Tables - Uncovered	10	Two (2) w/o benches
GENERAL		
Lighting	2	Receives some illumination from street lights
Parking	2	
Restrooms	2	
Trashcans	14	
Water Fountain	1	
Workout Equipment	1	Fair condition (wood)

SANTA FE TRAIL (9.09 acres)

	#	Notes
WALK - BIKE - RUN		
Paved Multiuse Trail (miles)	0.8	9', asphalt
PASSIVE		
Park Bench	13	
Pavilions	4	
GENERAL		
Lighting	32	
Trashcans	5	
Fountain	1	
Pergola	3	
Drinking fountain	1	

TRAIN DEPOT (1.16 acres)

	#	
WALK - BIKE - RUN		
Paved Multiuse Trail (miles)	0.1	4', concrete
PASSIVE		
Park Bench	6	
GENERAL		
Bike Rack	1	
Bus Stop	1	
Lighting	12	
Trashcans	2	
Flagpole	1	

]

12 Central Business District

The Central Business District (CBD) can define a city's character. In many cities, the historic downtown embodies the city's heritage and provides opportunities for tourism. New bedroom communities and cities that have lost the vibrancy of their commercial centers look to CBD re-development as a way to define their identity and provide a unique place for community activities and local businesses. This study analyzes the CBD's existing composition, envisions the City's relationship to its CBD for the future; and provides a local plan of action to increase CBD economic development and its contribution to residents' quality of life.

12.1 Highlights

The Wharton CBD encompasses the historic commercial development centered around the Wharton County Courthouse. It includes a range of historic buildings covering a construction period of over 100 years, and includes the County Courthouse (constructed in 1889) and several other buildings on the National Historic Register and State Antiquities Landmark. There are several buildings in the CBD that are vacant. Despite vacancies, the CBD has developed with a mix of uses over time, and includes restaurants, offices, public buildings, various small businesses, single-family homes, the riverfront park, churches, and City Hall. As depicted in *Figure 12A (next page)*, the CBD and its surrounding area contain many points of interest.

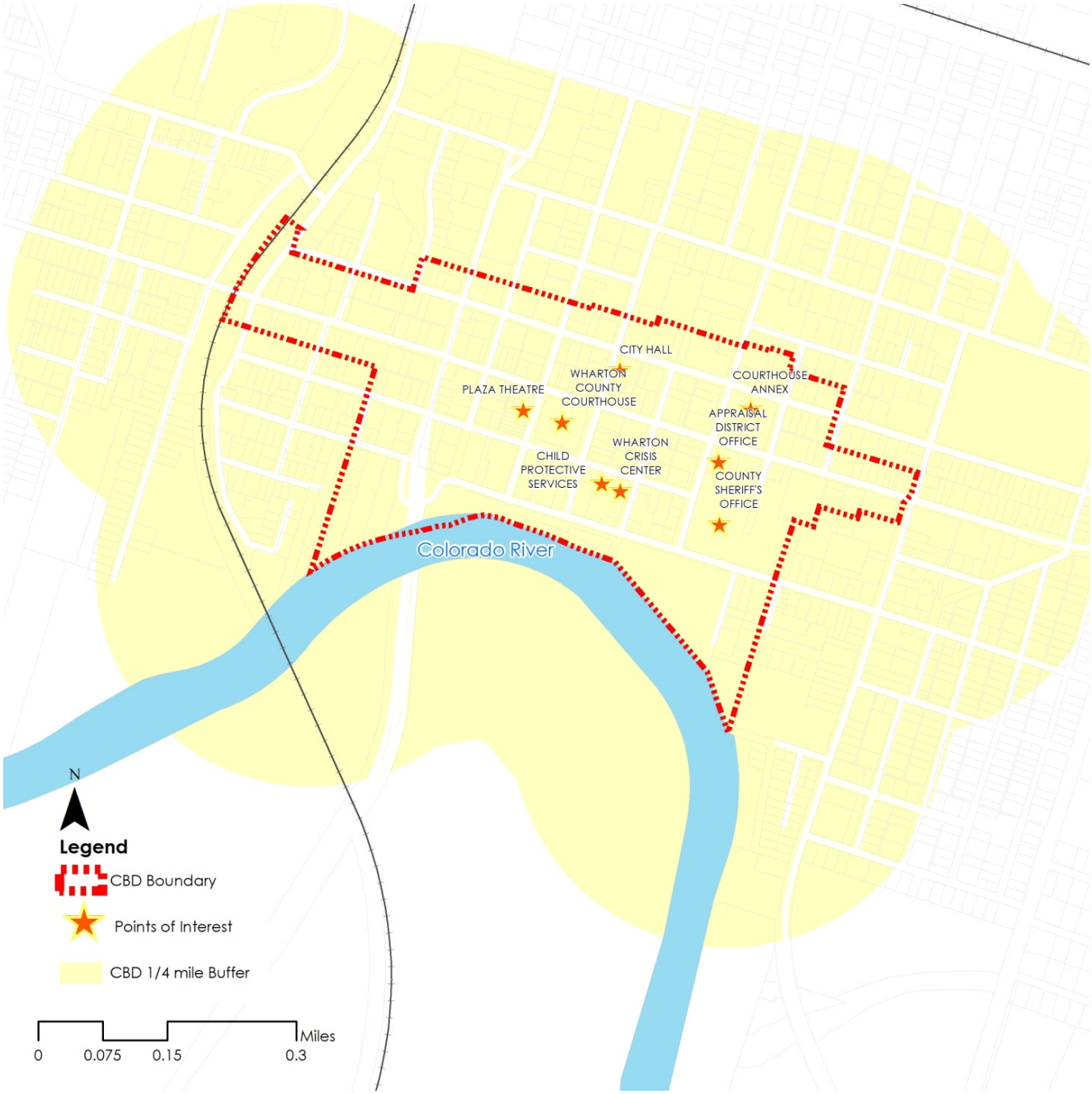


Figure 12A: Points of Interest within the CBD & ¼-mile Radius

In order to maximize the amenities and entertainment of the CBD, the following barriers to CBD development and use should be addressed:

1. A lack of regulations has allowed for the construction and renovation of buildings in a manner that is inconsistent with the historic character of Monterrey Square.
2. A lack of high-density housing and foot traffic in the CBD inhibits the growth of small- scale businesses
3. Missing sidewalks and sidewalks in poor condition inhibit people from walking to near-by amenities.
4. Lack of pedestrian-oriented traffic signage makes crossing streets unsafe for pedestrians.
5. Increased signage and wayfinding are needed to make people aware of the amenities and businesses in the CBD.
6. Local ordinances and lack of infrastructure make temporary uses like food trucks difficult to navigate.

The study proposes the following projects and policies to resolve issues through 2028:

1. A campaign to "market" the Wharton CBD.
2. Adoption of a zoning code to make infill development more feasible. This can be achieved by expanding the existing Downtown Business District to encompass the entire CBD.
3. Create design guidelines for the CBD.
4. Adoption of a Future Land Use Plan that focuses higher density residential and commercial uses in the central CBD corridor to promote a vibrant, walkable downtown.
5. Encourage temporary uses on vacant or underutilized land, such as food trucks.
6. The completion of local efforts to update amenities in the CBD that follow the design guidelines, including landscaping, benches and decorative poles with banners and/or planters.
7. The addition of gateway and wayfinding signs and lighting to important sites like the parks, parking areas and historic buildings.
8. The completion of high priority pedestrian and bicycle facilities in the CBD.
9. Redevelopment of privately-owned lot in between the County Courthouse and Elm Street to include creation of pedestrian mall connecting the river and Monterrey Square.

12.2 Context & Community Input

Context

While the Wharton County Courthouse was constructed in 1889, most of the current Central Business District developed after 1902, when a fire destroyed most the wood structures that made up the area at the time. Much of the area was developed by the 1930s when Wharton saw a population boom. However, the CBD continues to see new building to this day, with the recent opening of the Wharton County District Court at the northeast corner of Monterrey Square.

CBD Boundary: As illustrated in *Figure 12A (page 12-2)*, the City's Central Business District (CBD) is a 60-acre grid boundary in the historic section of Wharton. It includes some of the City's oldest buildings, like the Wharton Grocery, and the recently restored county courthouse.

Supporting Business Areas: Two other areas with significant commercial development exist along N. Richmond/US Bus 59 and Boling Hwy/FM 1301. Current businesses in this area include major chains like CVS, Little Caesar's, Dairy Queen, McDonald's and Sonic Drive-In, as well as more local businesses like 9'ers Grill. Business types include:

- Gas stations
- Auto shops
- Major chain restaurants
- Local restaurants
- Hotels
- Banks

While both the US Bus 59 and FM 1301 corridors and the CBD offer commercial services, they are different in many ways. The nature of highway commercial services is auto-oriented and single-stop oriented, and this type of access and land use tends to attract more large-scale businesses like Walmart, recognizable chains like McDonald's, and automobile services like gas stations and auto-mechanic shops.

A traditional town center or CBD is designed at the pedestrian-scale and can be accessed safely and comfortably by foot, bicycle or car. Stores tend to be smaller, specialty shops are more likely to be located here, and customers tend to visit multiple stores in one trip. While there may be concentrations of commercial use, other land uses like residential and office may be located within or nearby the district.

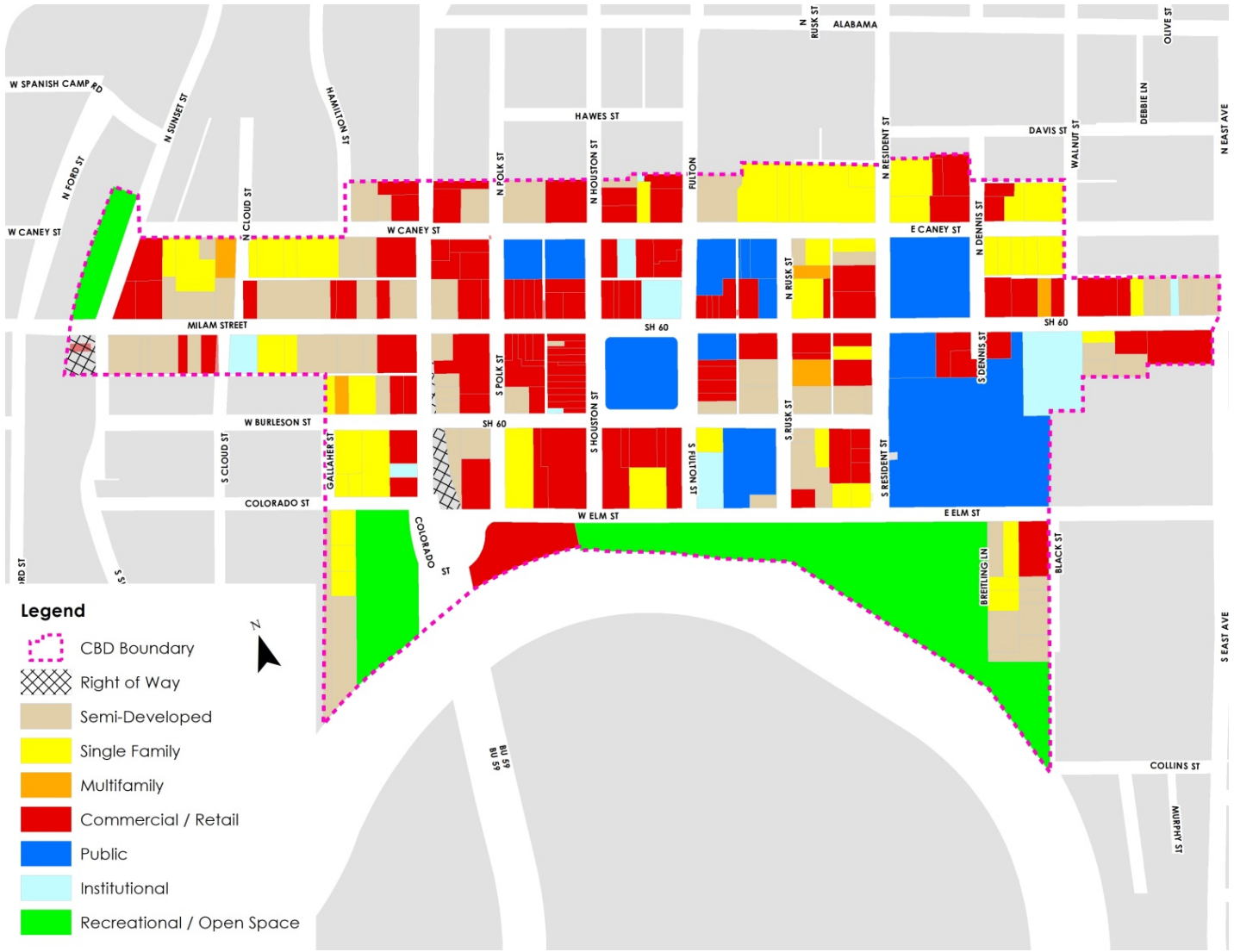


Figure 12B: Extent of the Central Business District

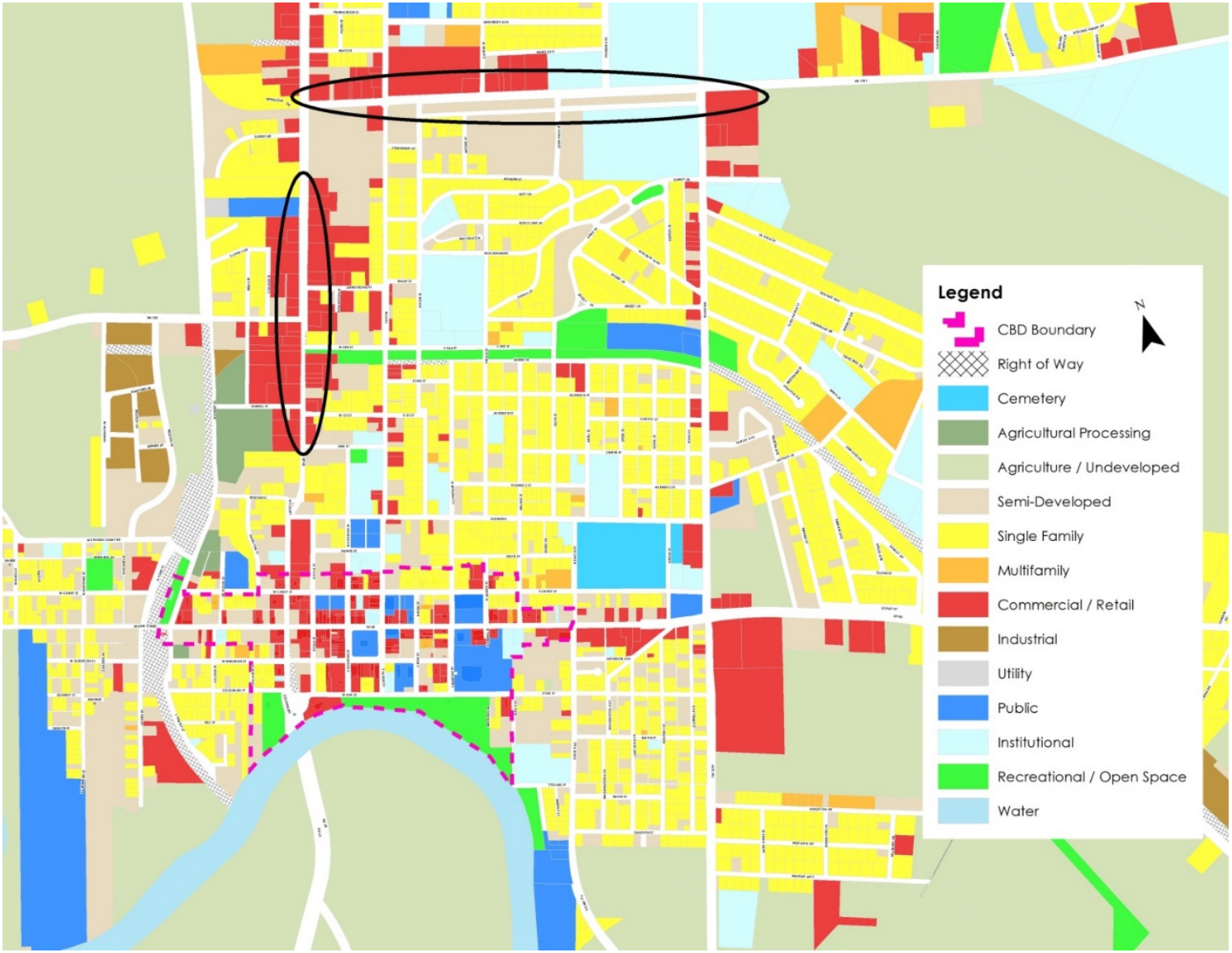


Figure 12C: Supporting Commercial Area

Community Input

Wharton residents would like to see more commercial growth in general. The majority[73] of survey respondents visit the CBD at least once a week, with many visiting multiple times a week. Many respondents said they would be "very likely" to visit the CBD if there were more restaurants and stores. The most desired type of development respondents want to see are restaurants and retail options (more suggestions can be found in *Appendix 12A*)

Wharton residents want the downtown to be an iconic center, a gateway to the city. Although much of the city's commercial development has clustered along North Richmond Rd and Boling Hwy, many residents consider Wharton's downtown as the heart of the community.

The following desires for the CBD were expressed during the public involvement process:[74]

Achieve

- More restaurants and shops
- Downtown should be an iconic center of the city
- Reuse historic/vacant buildings
- Create a beautiful, fun environment
- Sidewalk improvements
- Public art
  - paint storefronts of abandoned buildings
  - team up with ISD for art programs

Preserve

- Historic buildings and homes
- Small-town character

Eliminate

- Dilapidated structures
- Empty storefronts
- Incompatible uses

12.3 Inventory & Existing Conditions

This section consists of an inventory and descriptions of the existing conditions of the CBD. It describes building conditions and uses and the public infrastructure that affects the functionality and success of the CBD as an economic asset for the community.

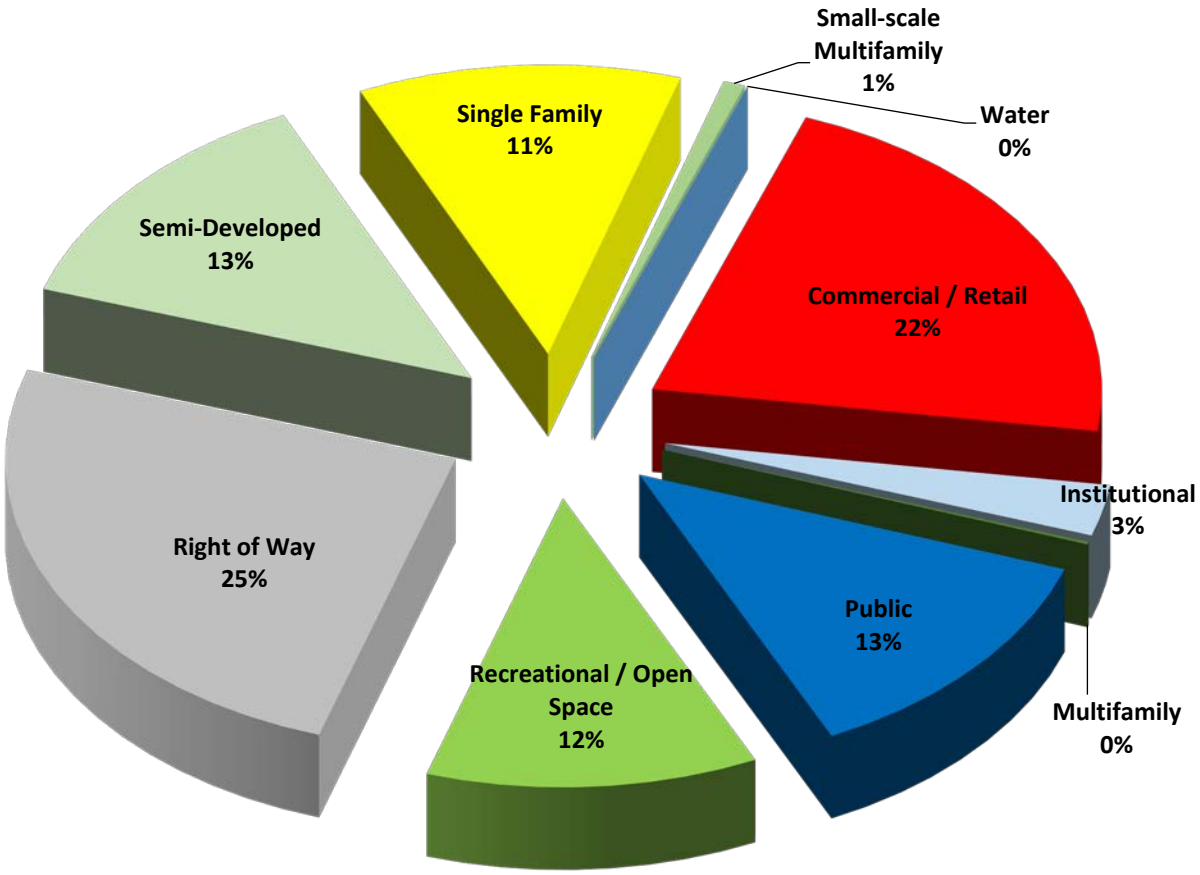
[73] 38% "Rarely" and 19% "Never"
[74] The public involvement includes the public meetings held on June 14 and September 13 as well as the online survey

12.3.1 Land Uses

The most character-defining land use in the CBD is commercial, specifically the historic row of shops that line Monterrey Square and run along Milam Street in both directions from the County Courthouse. However, the largest category of land use is roads/ROW.

Map 12A: Central Business District Circulation & Land Uses illustrates the land uses that comprise the CBD, and *Chart 12A* tabulates existing land uses. Aside from commercial, which constitutes close to 22% of the land use in the CBD, single-family, semi-developed, recreational/open space, and public uses all account for 11-13% of the land uses. There are 55 single-family housing units and 16 multifamily units (found in three quadplexes and two duplexes) in the CBD.

Chart 12A: CBD Land Use (2018)



Source GrantWorks Fieldwork 2017

12.3.2 Buildings

The inventory of structures in the CBD is illustrated and tabulated on *Map 12B: Central Business District Buildings & Occupants, 2018*. Many of the original CBD buildings in Monterrey Square and Milam Street west of the square were built between 1900 and 1940.

Building Condition

The condition of structures in the CBD was determined during the windshield survey conducted in March 2018. The criteria used to determine condition are outlined in *Table 12A.*

Table 12A: Building Classification Criteria

Classification	Criteria
Very Good / Good	Both exterior and interior in good condition with few visible cosmetic defects or minor structural defects such as small cracks in masonry. Handicapped accessible.
Fair	Exterior or interior in fair condition with cosmetic and structural defects including missing window glass, missing bricks or large cracks in exterior walls, minor sagging, deteriorated roof. Handicapped accessibility may be limited.
Poor	Exterior and interior in poor condition, with large sections of walls or roof missing, windows missing, major sagging or slumping of the structure.

- Of the 109 commercial buildings, 65 are in good condition, 30 are in fair condition, and 14 are in poor condition and vacant.
- Of the 56 single-family homes, 20 are in standard condition, 29 are in deteriorated condition and 7 are dilapidated.
- There are 4 places of worship within the CBD boundary
- There are 3 Colorado Valley Transit stops in the CBD
- There are 65 semi-developed lots
- All but two buildings are less than 3 stories.
- Dilapidated structures are concentrated in the area west of Monterrey Square, though structures in poor condition are found throughout the CBD. The majority of semi-developed lots can be found along the north side of the railroad easement.

Chart 12B: CBD Tenants by Type, Size, & Condition

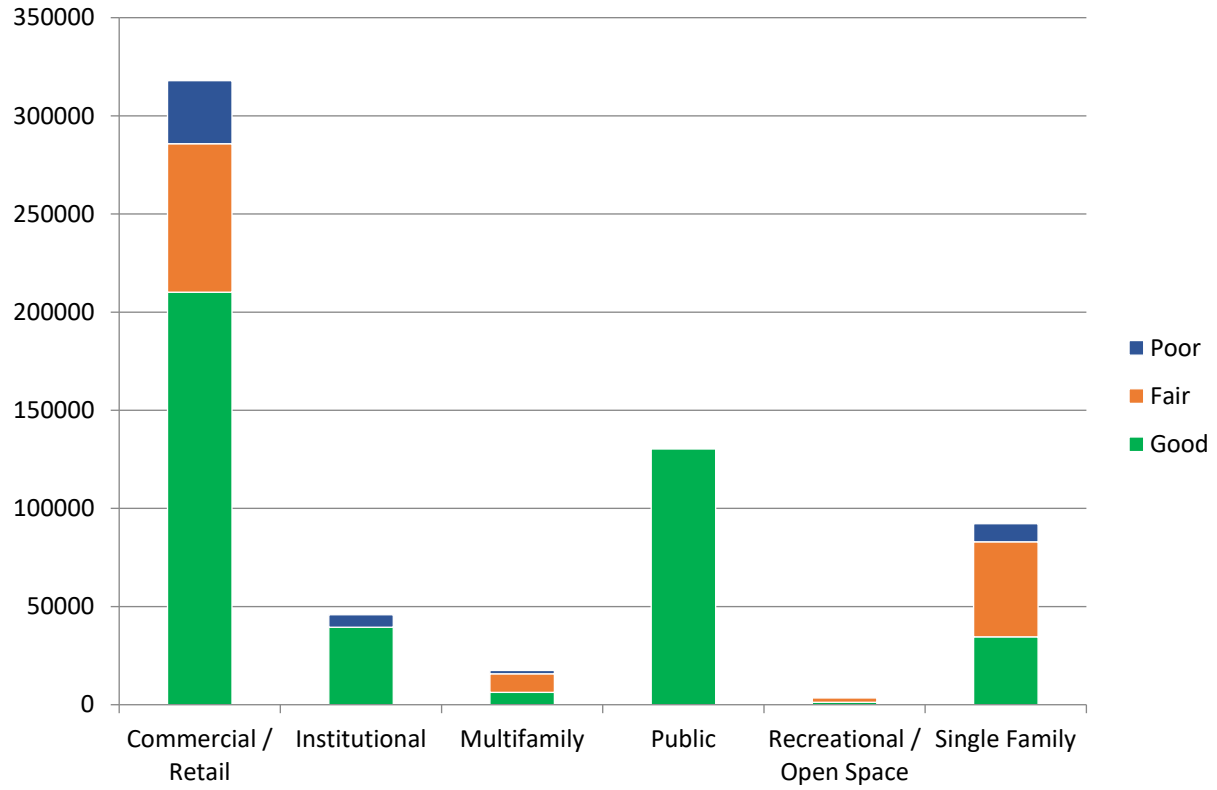


Figure 12D: Character of Historic Storefronts on Milam St

Building Occupancy/Vacancy

- The majority of buildings (85%) are occupied
- Total vacancy in the CBD is approximately 69,350 square feet, or 11.4% of the total building space within the CBD, which has an occupied to vacant ratio of approximately 9 to 1.
- There are twenty-nine vacant buildings in the CBD, including several on Milam Street just west of Monterrey Square.
- There are two vacant houses in the CBD, while the rest of the vacant structures are commercial.

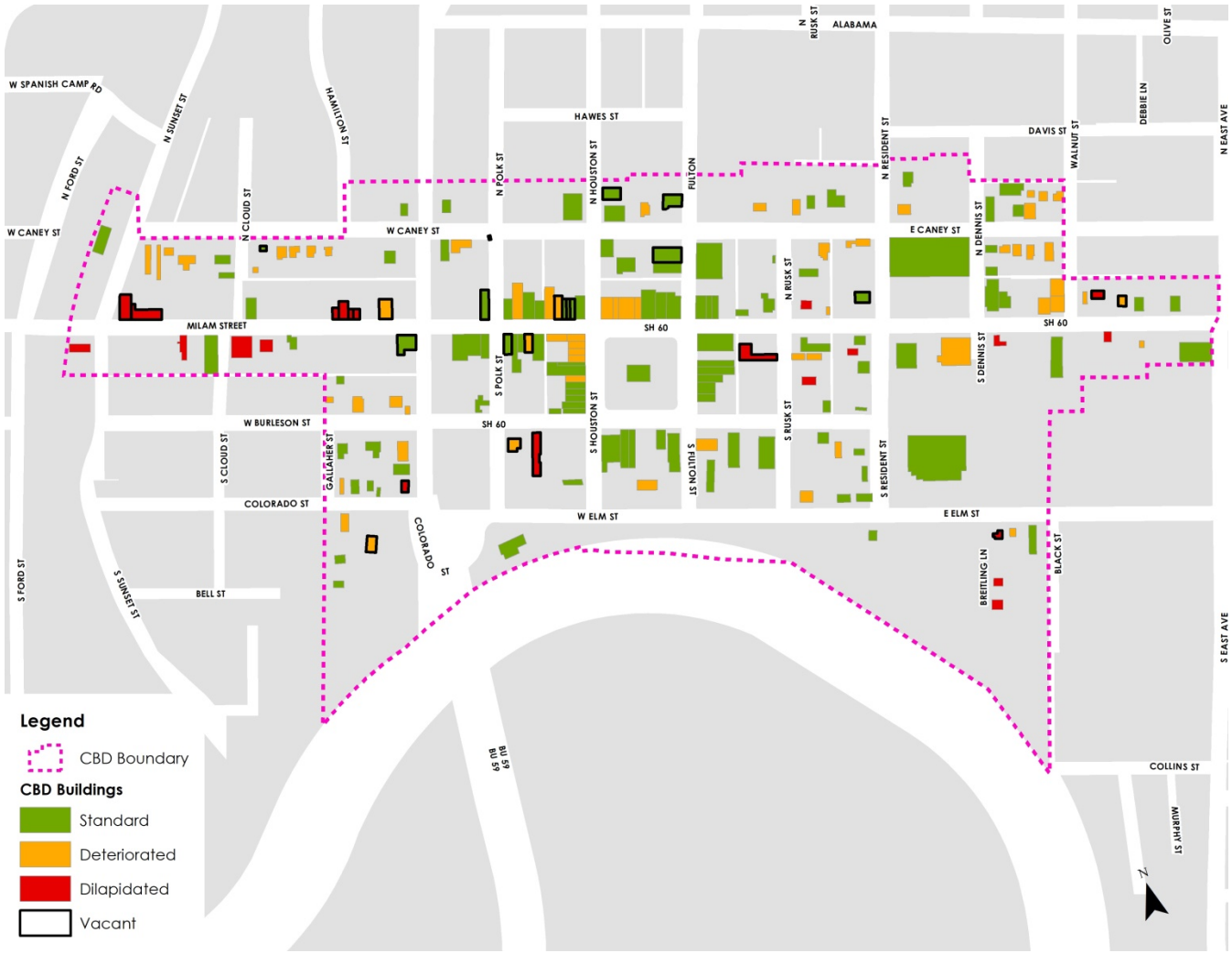


Figure 12E: Building Conditions & Occupancy

12.3.3 Amenities

Amenities help to define the district's identity, represent the attitude of residents and business owners towards the public, and provide a sense of comfort and convenience to customers. Amenities in Wharton's CBD are shown on *Map 12B: Central Business District Buildings and Amenities.*

Inventory of Amenities

- Crosswalk (5) four connecting the County Courthouse to adjacent streets and one across Milam Street at Rusk Street;
- ADA access ramps (6);
- Sidewalks (3.99 miles). Sidewalks are located along Milam, Burleson, Polk, Houston, Fulton, Rusk, and parts of Elm and Caney Streets. However, sidewalk connectivity is an issue in all locations.
- Street Lights (118) throughout the CBD including forty-seven (47) decorative street lamps around Monterrey Square;
- Signage (55) in total including one (1) no dumping sign, one (1) Railroad Crossing sign, nine (9) Speed Limit signs, one (1) Yield sign, and 43 Stop signs;
- Parking (1,888; 1,321 off-street; 50 Handicapped);
- Traffic Lights (24) including eight (8) blinking yellow lights and 16 standard traffic lights;
- Benches (33);
- Trash can (12);
- Planter/flower pot (12);
- Colorado Valley Transit Stops (3)

Clockwise from Top Left: Colorado Valley Transit Stop;Benches, Decorative Lighting, and Trash Can at Monterrey Square; ADA Ramp.

Figure 12F: Wharton CBD amenities

12.3.4 Aesthetics

Aesthetics include the elements that form the visual character of the downtown. They include building lines, materials, heights, awnings, as well as murals, trees, public art, and signage. Like amenities, aesthetics help define the district's identity, represent the attitude of residents and business owners towards the public, and provide a sense of comfort and convenience to customers.

Wharton has experienced relatively recent commercial growth along US Bus 59 and FM 1301. Aesthetically speaking, the new development is distinct from the traditional development in many ways, including the scale, setbacks, and building access.

Figure 12G: US HWY 290 Development v. CBD development

Awnings Canopies

Awnings hang from the exterior wall, while canopies are supported by poles. Some buildings in the CBD have awnings, which is a great amenity in sunny Texas and can provide character.

Figure 12H: Wharton CBD buildings with and without awnings

Landscaping

Existing landscaping within the CBD is confined to planters around Monterrey Square, as well as trees lining the property boundary of the Wharton County Courthouse. More planters, flower boxes and landscaping could enhance the appearance and comfort of downtown.

Figure 12I: Wharton CBD landscaping

Construction Materials

Materials used for construction in the CBD include brick, painted brick, stucco, stone, fiber cement, and metal on buildings; metal awnings; concrete and brick sidewalks; standard highway lighting poles and signage; and decorative lamp posts. Brick sidewalks are more expensive to install than concrete sidewalks; however, their maintenance costs are lower because they require less material and little equipment.[75] Building materials in the central portion of the CBD are mainly brick and several buildings have stucco sections.

Top: Stucco façade at the Plaza Theatre; Metal awnings; Brick façade at Floor Coverings. Bottom: Brick and stucco facades along eastern edge of Monterrey Square.

Figure 12J: CBD Buildingss

[75] Kleier, Gary, Concrete vs. Brick Sidewalks; http://www.oldlouisville.com/circa1900/brick-sidewalk.htm, as accessed in May of 2012.

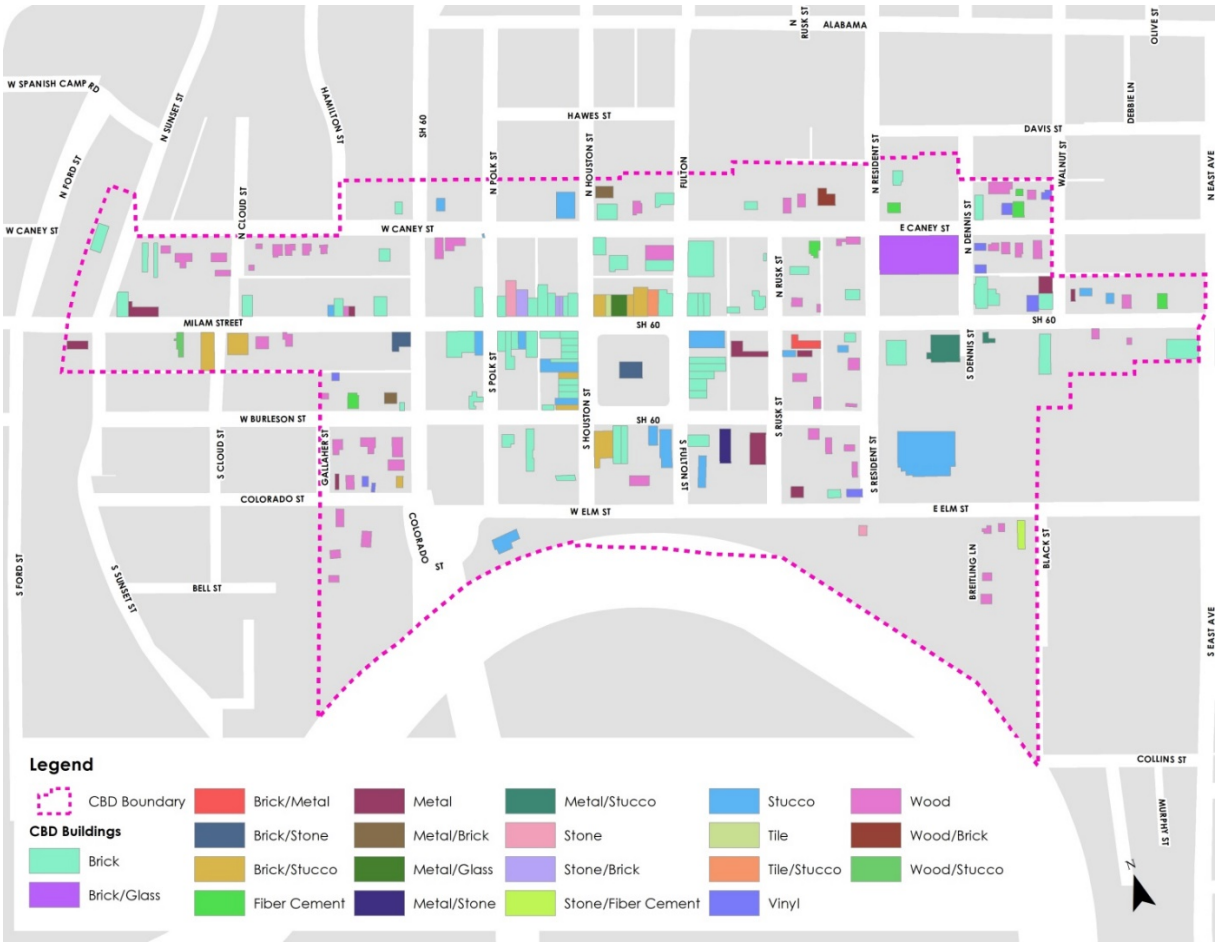


Figure 12K: CBD Building Materials

Architectural Style

The CBD was built and re-built over a 100-year period with little regulation; therefore, architectural styles vary by the buildings' age and use. The central, historic area of Wharton is characterized by the Early Twentieth Century era in Texas[76] Early twentieth century styles reflected a variety of approaches in Texas as architects borrowed and adapted styles from many countries and periods. Designs from that era were not ornate, but they did follow popular tenets of eclecticism in which styles were borrowed and combined. The most iconic building in the Wharton CBD is the landmarked County Courthouse, which was built in 1889 in the Second Empire style by noted Texas architect Eugene Thomas Heiner. In the 1940s the building was renovated with an art deco exterior and additions to the main structure. These additions were removed in the mid-2000s and the Courthouse was rededicated on August 4, 2007.[77] New development, commercial, residential, or otherwise, has not adhered to any of the historical styles found in Wharton.

[76] Texas Handbook Online, *Architecture, accessed at http://www.tshaonline.org/handbook/online/articles/cmask in 2012.*
[77] http://www.thc.texas.gov/preserve/projects-and-programs/texas-historic-courthouse-preservation/restored-courthouses/wharton

Wharton County Courthouse (1889).
Style: Second Empire

New First National Bank (1902).
Style: Colonial Revival

East and North sides of Monterrey Square
Style: 1900s various, high-style.

Harrison-Dennis House (left), House of West Burleson (right)
Style: Queen Anne; Modern Tudor Revival

Figure 12L: Architectural Styles

12.3.5 Transportation Infrastructure & Circulation Patterns

Street condition and circulation patterns affect the functioning of the CBD and residents' willingness to go downtown for shopping, events, and restaurants. The inventory of CBD traffic circulation and capacity is illustrated on *Map 12A: Central Business Circulation 2018.* Included on the map are street widths, sidewalks, curb and gutter, traffic volumes, and traffic controls.

Streets

The CBD contains 30 acres of road and right of way (25% of total acreage) and over 4.5 miles of paved streets. The streets vary in condition from good to poor. Responsibility for street maintenance is split between the City and the State, which is responsible for US 59 Business running north-south through Wharton.

Traffic Controls

Traffic circulation is maintained by stop signs at most intersections; however, there are eight four-way traffic lights within the CBD – three along US 59 Business, four at the corners of Monterrey Square, and one at the intersection of Milam Street and Rusk Street.

Traffic Volumes & Circulation

According to TXDOT 2016 traffic counts, traffic volumes are highest in the central CBD (8,553 average daily traffic count) at the intersection of Milam and US 59 Business. Traffic counts are higher throughout the rest of the City, especially along FM 1301/Boling Hwy, and near the intersection of FM 102 and US 59 Business.

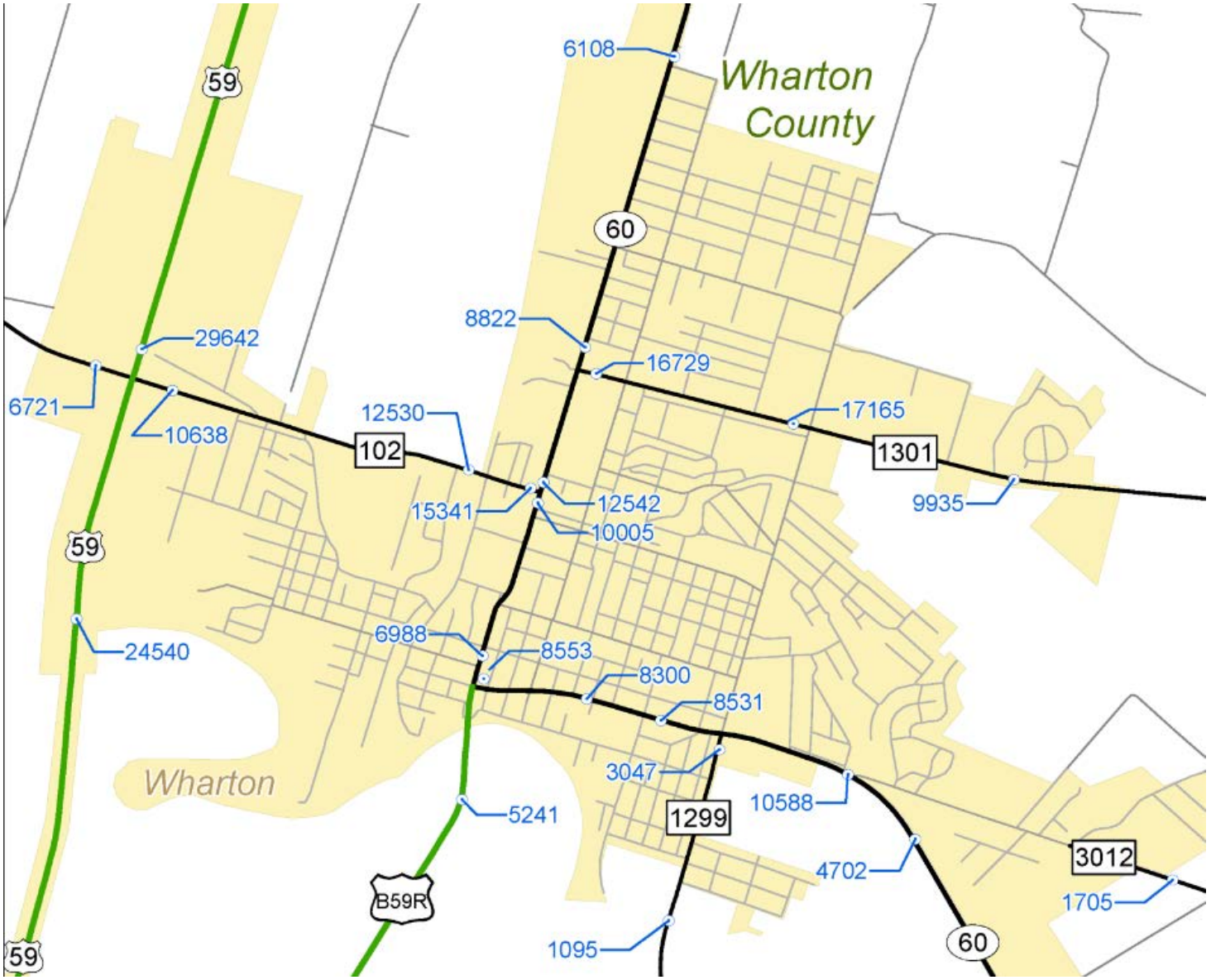


Figure 12M: TxDOT 2016 AADT (Annual Average Daily Traffic)

Parking

Parking in the CBD includes on-street and off-street parking lots.

On-street parking is available throughout the CBD, including outside of the County Courthouse, around Monterrey Square, and along Milam Street. As estimated from number of marked spaces and linear feet available on non-marked streets, on-street parking accommodates about 567 spaces, eight (8) of which are spaces reserved for handicapped individuals. Off-street parking in the CBD holds the remaining 1,321 spaces, 42 of which are handicapped parking.

Including on- and off-street parking, the CBD has 196 buildings served by 1,888 parking spaces. That equates 9.63 parking spaces per building; or 3.1 parking spaces per 1,000 square feet of building space (all buildings, all parking). That amount exceeds the amount of parking recommended for small-town or town center zoning regulations which call for 2 spaces per 1,000 square feet of business space.[78]

Pedestrian & Bicycle Facilities

While vehicles can move easily about the CBD, pedestrian movement is more difficult. While sidewalks are generally in good condition and are present throughout the CBD, there are gaps in certain areas and in some cases there are obstacles in the sidewalks – such as fire hydrants or signage – that make navigation difficult for physically impaired visitors. Wheelchair ramps are available at most, but not every intersection. Crosswalks are only present around Monterrey Square and at the intersection of Rusk and Milam Streets.

Sidewalk conditions vary throughout the CBD. Sidewalk material is brick around Monterrey Square and concrete in the rest of the CBD, and most sidewalks are 5-feet wide. The main barrier to ADA compliance in the CBD, as shown in *Figure 12L,* is the incomplete sidewalk network.

There are currently no bicycle facilities nor bicycle parking in the CBD. Given Wharton's relatively flat topography, adding comfortable bike lanes and convenient bike parking can encourage both novice and more experienced bicyclists to ride for both transportation and recreation. Linking bicycle lanes with the existing Santa Fe Trail can also bring more cyclists to the trail and help connect the trail to the downtown, helping existing and future businesses.

[78] Reforming Parking Policies to Support Smart Growth, Metropolitan Transportation Commission, Bay Area, California, "Representative Parking Requirements" for Rural/Small Town, Flyer for Handbook, accessed at http://www.mtc.ca.gov/planning/smart_growth/parking_policies_flyer-web.pdf in July 2010.

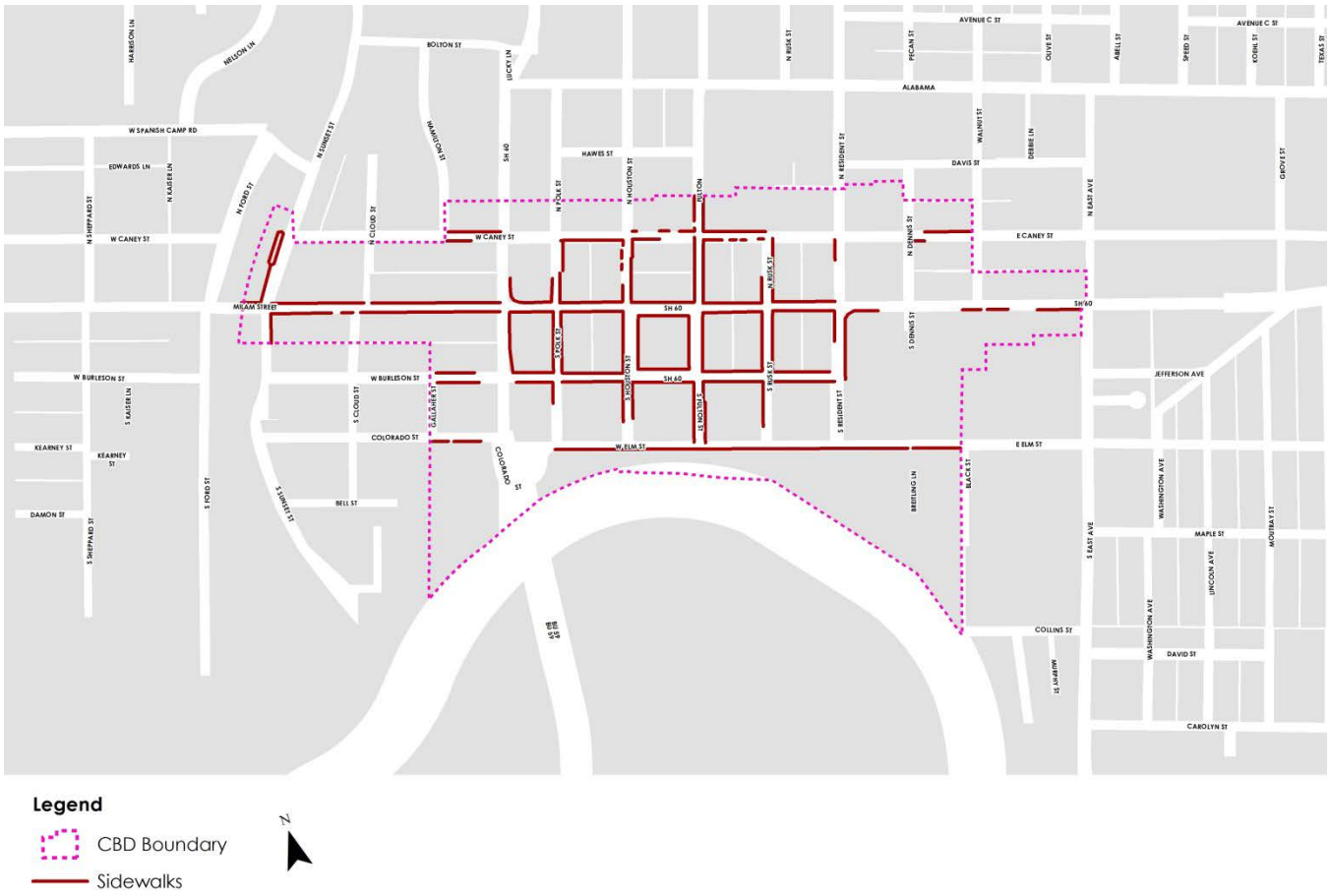


Figure 12N: Existing and Missing Sidewalks in the CBD

Figure 12O: Brick Sidewalks along Monterrey Square

Curb Cuts & Driveways

The CBD sidewalk system becomes intermittent outside of Monterrey Square as curb cuts and wide driveways accommodate businesses. There are several breaks in the sidewalk along US 59 Business with many curb cuts. Since roughly 2005 TXDOT Access Management Policy prevents more than one curb cut per business and limits driveway widths to 40 feet on state roads. Newly-constructed businesses would have to follow those guidelines, which would provide a more contiguous sidewalk system in the CBD. The City could adopt more stringent regulations in its subdivision and zoning ordinances and/or could reduce driveway widths in the CBD by building sidewalk in TXDOT ROW with the assistance and approval of TXDOT.

12.4 Key Central Business District Considerations

This section reviews elements in the CBD, details impediments to CBD success and suggests solutions that could be implemented by the City, new organizations, volunteers or a combination of stakeholders to increase the vitality of the CBD.

12.4.1 Leverage Historical Buildings & Character to Project a Unique Image

Wharton's residents take great pride in the City's CBD and see its potential for improving residents' quality of life and increasing tourism and economic development. In order to capitalize on the CBD's features, the City and volunteer residents should consider a) what image they would like the CBD to convey; and b) what resources are available to support that image.

Branding

Wharton's central business district is branded as "Monterrey Square". Some of the decorative street lighting in the CBD features signage that identifies the space as Monterrey Square. However, these signs compete with other signage in the area, such as the larger, blue and white banners that identify certain businesses. The Monterrey Square branding needs to be more prominent or it will not function as desired.

In addition to signage improvements (further discussed below), the City should also develop a a coherent and distinctive "brand" that could be the basis for decoration and style in the CBD. In this context, branding involves physical improvements that support the goals of a city-wide brand while attracting attention to local businesses and activities in the CBD. CBD branding can be conveyed in various forms, including color-coded or matching street furniture; historic plaques on buildings, City downtown banners or street signs, and digital displays on websites that attract visitors to the region and the downtown.

Wharton's CBD has a number of historical buildings and two historic districts that should play a role in the City's brand. Many of the buildings have outdoor plaques explaining the significance of people who built the buildings or detailing the materials or architectural styles of a certain period.

Following the example of Taylor, TX,[79] Wharton's Chamber of Commerce could create an Architectural Walking Tour that takes visitors on a tour of Wharton's history. The existing plaques should be supplemented with information detailing the architect, architectural style, year built, original use of the building, and any other historical facts of interest. The walking tour should be featured on the Chamber's website, include pictures and descriptions of the buildings, and be downloadable. The tour could also be narrated and available for download so those taking the tour could listen to the descriptions as they walk. Another step would be to paint a pathway on sidewalk or provide signage directing visitors to the buildings.

Murals can also play a role in branding. Murals usually require volunteer organization and design efforts, funds to commission artists to paint them, funds to maintain them over time, and preservation easements or similar restrictions to ensure they are not removed without community approval. Wharton's CBD has six large-scale murals that speak to the history of the City and provide a distinctive character. These murals could be included in the Architectural Walking Tour or featured on a standalone tour. The murals should also be provided with plaques or some other means of providing a description of the mural, the artist, year painted, and the history behind the artwork. Additionally, the City should work with local youth and artists to commission new murals within the CBD.

Branding is further discussed in *Chapter 10: Economic Development.*

Design Standards

Outside of Monterrey Square, buildings within the CBD do not share many of the general design features of the square's more historic buildings, creating a lack of continuity among the CBD buildings in architectural style and urban design. Many of the buildings in the downtown are *historic*, but are not *historically significant*, so full restoration to their exact original appearance may not be necessary due to cost and current use limitations. However, encouraging and ensuring the proper treatment of a building's character-defining features such as storefronts, window openings, historic awnings and building materials is essential to maintaining the authenticity and integrity of the structure and the district as a whole.

Moreover, new development and redevelopment of existing structures should be undertaken in a manner that matches the urban design template of the historic CBD so as to extend the urban feel of the CBD and its draw as a historic place.

[79] http://taylormadetexas.com/about/architectural-walking-tour/

The following is a list of characteristics of CBDs in America built during Wharton's historic period prior to the mid-20th century that could be a starting place for developing policy for the CBD.

1. Buildings meet the street or sidewalk, creating a sense of street enclosure and walkability. Buildings are parallel to the street and parking lots are not located in front of buildings. A maximum street setback of 10 feet is advisable so that buildings meet the street and buildings are designed so that parking lots are behind or at least to the sides of buildings.
2. Building heights between two and four stories.
3. Building materials of brick or stone (wood for residential).
4. Entrances face the main street.
5. Windows provide a high percentage (40 to 60%) of transparency on bottom floors on all sides of a building so that customers outside can see into business spaces.
6. Building widths extend the entire width of the lot providing an unbroken façade. 100 percent width coverage is desirable in order to maintain a historic pedestrian-oriented atmosphere.
7. On most buildings, awnings hang from the building facades.

Figure 12P: Wharton Historic Building Examples

Ordinances

As discussed above, Wharton has no zoning ordinance that sets standards in the CBD. It is recommended that the City, at a minimum, adopt a Downtown Zoning District based on the above design guidelines to support residents' desire to protect the historical tone of the district. Although not specifically included in recommended zoning code amendments, the City may want to establish a Downtown Advisory Commission to assist city staff in adopting and enforcing downtown design regulations. Enforcement could include pre-application meetings in which staff or the committee could review renovation and construction plans.

Adoption of a historic preservation ordinance would also help maintain and promote the character of the CBD. The City could also collaborate with the County to apply for Certified Local Government status for State Certified Local Government Grants. Regulations for CLG acceptance are less stringent for counties than cities. Grants are available for: architectural planning and preparation of façade studies; development of historic context information to use in educational and reference materials; and writing or amending preservation ordinances. Matagorda County provides a good example in the state of how a Certified Local Government county has worked with cities to bring in more funds and organize activities to assist cities in maintaining historic properties within its borders.

Voluntary Agreements & Incentives

To be the most effective, architectural guidelines within Wharton should be agreed upon by the property/business owners affected by the guidelines. Incentives such as matching grants for signage or façade improvements can motivate those less inclined to participate. Aside from the marketing aspect of district-wide design coordination, property and business owners should be aware that approximately half of their customer base will care about aesthetics, while half will care about functionality. Whichever they themselves care about, they will lose customers if they do not pay attention to both aspects of design. Recommended organization for voluntary participation and grants that volunteers should pursue is discussed below.

Business Improvement District

A business improvement district (BID) is a defined area (typically with a concentration of businesses) in which business owners voluntarily levy an additional tax in order to fund improvements within the district. BIDs range in size from a few blocks to an area of several miles and can be found in large and small cities throughout the country. BIDs are typically governed by a nonprofit board, a public commission, or a hybrid public-private partnership.[80] This could be a good tool for businesses owners in the Wharton CBD to fund improvements such as:

- CBD marketing;
- Signage;
- Sidewalk improvements;
- Bicycle facilities;
- Street furniture;
- Landscaping; and,
- Maintenance such as garbage pickup or graffiti removal.

12.4.2 Increase Residential Density within & in Areas Surrounding CBD

The CBD in its current boundary has a reasonably healthy mix of land uses that draw residents to the CBD on at least a weekly basis; however, increasing the residential density within the CBD would encourage more foot traffic and activity from residents who are likely to visit the area more frequently.

Currently there are 48 single-family residences and 5 multifamily properties (accounting for 16 units of housing) within the CBD. There are 65 parcels, accounting for almost 16 acres of land within the CBD that are semi-developed and could be used for higher density residential development, or mixed-use development with a residential component. *Map 4B: Future Land Use Map* envisions that close to 30 acres will convert to mixed-use development, with commercial, office, or institutional uses on the ground floor and residential uses on the upper floors. This kind of higher density development will both add to the tax base and allow for a more vibrant and prosperous CBD.

The City and EDC should work with the owners of these properties to encourage them to develop, redevelop or sell their properties. The EDC itself could purchase some of the properties and choose developers through an RFP process to then purchase and develop the land or work as a conduit to connect interested developers with landowners. Given the large size of these properties, they present a huge opportunity to create a sizeable downtown that is unique and can serve as the economic and cultural hub of the city as it plots its future.

[80] Sustainable Cities Institute http://www.sustainablecitiesinstitute.org/topics/land-use-and-planning/business-improvement-districts-(bids)

12.4.3 Ensure Existing Historic Structures in Monterrey Square & Along Milam Street are Occupied

Wharton's historic buildings create a unique identity that the City should both preserve and promote. The best way to accomplish this is to keep the buildings in use, which ensures they are maintained to serviceable standards, and that the public may utilize them. The restaurant Provisions located at the corner of Milam and Polk Streets is a great example of a historic building being renovated with an eye towards maintaining the historic feel of the building, while creating a modern dining experience. Currently, the Wharton Economic Development Corporation runs a Business Restoration Program that provides grant funds to preserve, protect, enhance, and encourage activity in the existing buildings in downtown. The annual budget for this program is $75,000. This program should be expanded to allow for greater assistance to a greater number of potential businesses. As discussed in *Chapter 10: Economic Development Study* the EDC could also work to establish a revolving loan program that could also provide funds for building restoration and renovation.

In addition to funding, another barrier to reuse of existing structures is code compliance. Wharton utilizes the International Building Code, which is tailored more towards new construction. One option would be to adopt a specific historic structure building code that is designed more towards renovation and reuse. The 2018 International Existing Building Code[81] may better serve the City as it pertains to historic building renovation. In addition, California[82], New Jersey,[83] Seattle,[84] and Los Angeles[85] all have some variation of building codes aimed towards adaptive reuse of existing buildings. These codes can provide for more cost-effective alternatives that increase the feasibility of reusing historic structures.

For more ideas on adaptive reuse of historic buildings, the National Trust for Historic Preservation provides great examples and resources (https://savingplaces.org/reurbanism#.Wywh2KdKiUk).

12.4.4 Connect Monterrey Square with Riverfront Park through Pedestrian Mall & Increased Commercial Uses Along North Side of Elm Street

Two of Wharton's greatest amenities are its historic buildings – particularly the Wharton County Courthouse – and its location along the Colorado River. However, the City has not taken advantage of its waterfront property. While Riverfront Park lines the banks of the Colorado River, the north side of Elm Street – which runs adjacent to Riverfront Park – is populated by parking lots, semi-developed lots, and single-family housing; this is a missed opportunity.

[81] https://codes.iccsafe.org/public/document/IEBC2018/EFFECTIVE-USE-OF-THE-INTERNATIONAL-EXISTING-BUILDING-CODE
[82] http://www.dgs.ca.gov/dsa/AboutUs/shbsb.aspx
[83] http://www.state.nj.us/dca/divisions/codes/offices/rehab.html
[84] http://www.seattle.gov/dpd/codesrules/codes/existingbuildingcode/default.htm
[85] https://preservation.lacity.org/incentives/adaptive-reuse-ordinance

Creating a riverfront district on Elm Street between US 59 Business and Resident Street – complete with restaurants featuring outdoor patios looking on toward the river and retail options – would make this area a desirable destination for residents and tourists alike.

To help make this vision into a reality, the City and EDC should take the following steps:

Improvements to Riverfront Park

Riverfront Park has several amenities catering to local residents including playscapes, bathrooms, a walking trail, and picnic tables. However, repeated flooding and lack of investment have left the park in generally poor condition. With the installation of a levee upstream, flooding issues should be abated, and future investment in amenities will not be washed downstream. In addition to adding items recommended in *Chapter 11: Recreation & Open Space,* the City should focus on the removal of invasive species and the planting of native grasses and trees – particularly Bald Cypress and River Birch, which prefer riverbanks – to aid in bank stabilization and to increase the visual appeal of the riverfront. Along with these interventions, the City should create a pathway – the design of which should be done with bank stabilization in mind – allowing visitors access to the river itself. Residents have also suggested returing the park it its originally deeded name - Kincheoloe Common – to showcase the park as unique space.

Create Pedestrian Mall Between Courthouse and Riverfront Park

Currently, the County Courthouse faces south towards Burleson Street and a row of one- and two- story commercial buildings. However, directly south of the Courthouse there is a break in the buildings which is now occupied by a parking lot. Just south of that is a single-family home flanked on both sides by additional parking lots. These lots represent an opportunity to create a visual and physical connection between Monterrey Square – the heart of Wharton – and Riverfront Park and the Colorado River. The City and EDC should purchase and remove the single-family home and turn that lot along with the parking lot directly to the north into a pedestrian mall lined the Square with the waterfront. The two parking lots directly west and east of the proposed pedestrian mall should be developed into commercial properties, such as restaurants, cafes, pubs, or retail, with entrances and patio seating facing onto the pedestrian mall as well as onto Elm Street. By opening up the space between the Square and the River and focusing on the creation of pedestrian-centered development, the City's investment can act as a force-multiplier encouraging more pedestrians to the greater downtown area, providing more foot-traffic for more businesses which will attract more visitors.

An alley in San Marcos, TX brings life and entertainment to the community.[86]

Figure 12Q: Pedestrian Mall with Outdoor Patios

12.4.5 Improve the CBD Experience by Investing in Pedestrian & Bicycle Facilities

Pedestrian Facilities, Bike Facilities and Lighting

These amenities are the basic infrastructure needed to create a place where residents and visitors can get out of their cars, wander from shop to shop or from restaurant to shops, and have a pleasant experience exploring the downtown.

Sidewalks

An impediment to pedestrian use in the CBD is the lack of a continuous sidewalk network. The map below depicts existing sidewalks and proposed sidewalk. The proposed sidewalks have been divided into two tiers to help manage feasibility and need, but in no way should prevent the construction of Proposed Sidewalks should developer agreements or funding become available. High Priority Proposed Sidewalks were determined by their level of service and level of need. An example of a high level of service sidewalk would be in front of or connecting to commercial services; a lower level of service sidewalk could include a sidewalk in a low-density residential area.

[86] www.strongtowns.org

A high level of need would include areas where no sidewalks exist on either side of the street. In some cases, only one side of the street is High Priority Proposed Sidewalk while the other is Proposed Sidewalk. Ideally, sidewalks are constructed on both sides of the street, but in circumstances where there is a limited amount of funding available the distinction in priority of proposed sidewalks may serve as a guideline to achieve maximum level of service and need.

There is about 6,000 linear feet of High Priority Proposed Sidewalks and 6,500 linear feet of Proposed Sidewalks in the CBD. The cost estimate to build out the entire sidewalk network is approximately $333,000. Sidewalk costs are difficult to estimate due to fluctuations in labor and material costs, site specifications, differing methods of bid packaging and construction contracting. Maintaining high-quality sidewalks in the CBD has implications for transportation, housing, and economic development. Advantages include:

1. Greater willingness of customers to walk from parking, which reduces perceptions of parking congestion and reduces the number of cars that circle in search of parking
2. Greater interest among travelers to stop and window shop
3. Improved aesthetics, which make the downtown more attractive to new investors
4. Greater accessibility for those who feel uncomfortable walking on uneven surfaces
5. Increase in property values for businesses and for residences neighboring the CBD[87]

[87] A study of 15 U.S. cities showed a residential property premium in more walkable neighborhoods of approximately $4,000 to $34,000. See: Cortright, J. (2009). Walking the Walk. Retrieved from www.ceosforcities.org/work/walkingthewalk; Also: Pivo, G. & Fisher, J.D. (2010). The Walkability Premium in Commercial Real Estate Investments. Retrieved from http://merage.uci.edu

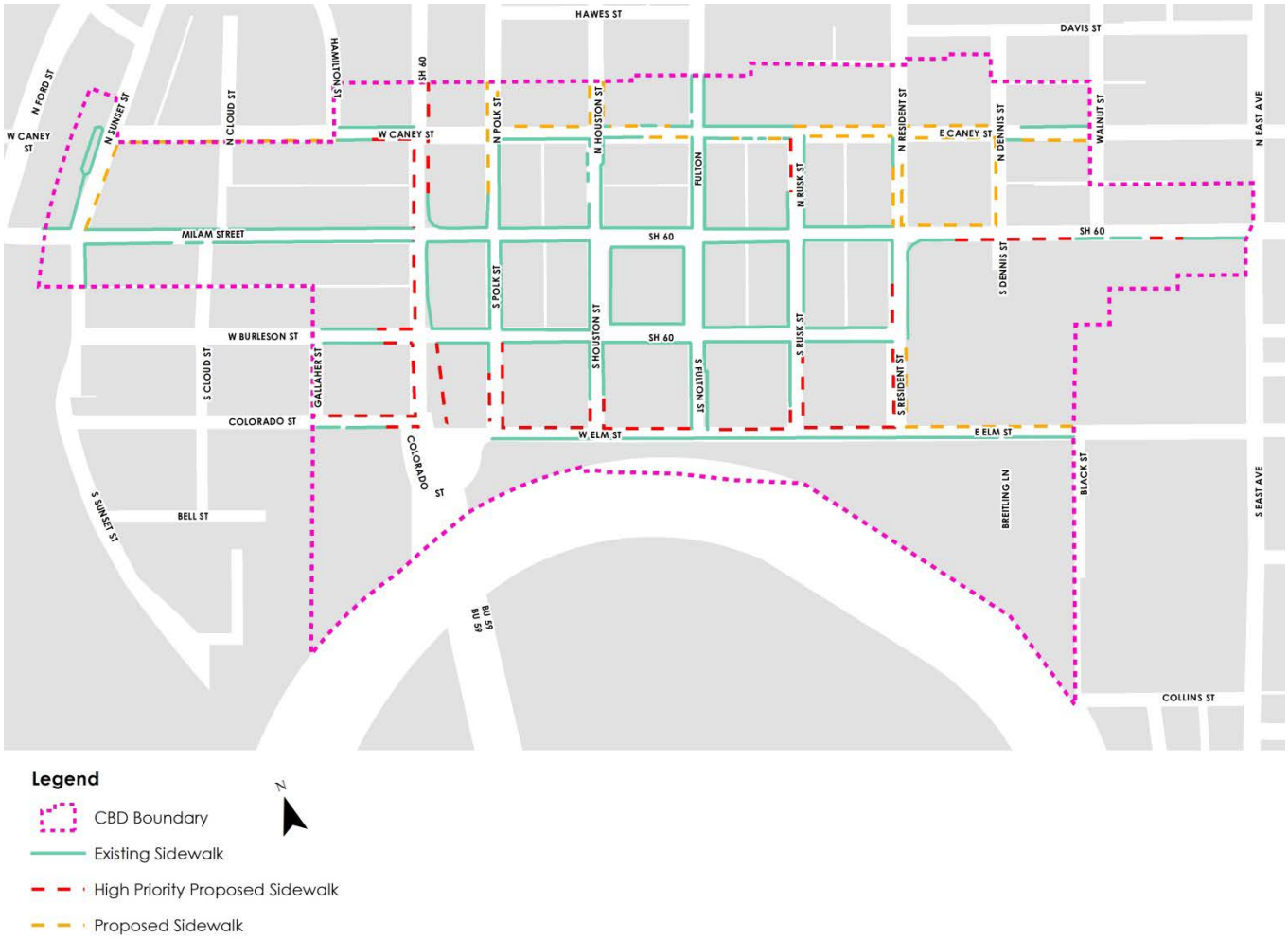


Figure 12R: Existing and Proposed Sidewalks in the CBD

Table 12B: Sidewalk Cost Estimates

Sidewalk Cost Estimates				
Priority	LF	Width	Low Estimate	High Estimate
High Priority Proposed	6,000	5	$ 150,000	$ 180,000
Proposed	6,500	5	$ 162,500	$ 195,000
Total	*12,500*		*$ 312,000*	*$ 375,000*

Other Pedestrian Facilities

The City can also make Monterrey Square a more pedestrian-friendly space by reducing the speed limit (suggested 20 miles per hour), continuing its current efforts to install additional ramps and traffic crossing signals (*see Chapter 9: Thoroughfares Study),* and installing way showing/finding signage (*see Chapter 10: Economic Development Study*).

Bike Lanes

Currently, there are no bike lanes in the CBD or the City. Adding bike lanes would make residents and visitors feel more comfortable, and when complete routes are established the city would likely see an increase in bicycling. Five to six-foot striped bike lanes are not the only option in the bicycle facilities toolkit. Protected bike lanes, buffered bike lanes, and sharrows (Shared Right-of-Way) can all help comprise a connected bicycle network.

Protected on-street bike facilities have proved useful for pedestrians and wheelchair users. Where sidewalks do not exist, installing a protected bike lane or cycle track may be a great option because it is significantly less expensive to build. Another perk is the increased level of service, as this facility may be used comfortably by pedestrians and bicyclists. Pedestrian and bicycle signage or on-street markings can help clarify that the facility is for pedestrians and bicyclists.

A protected bike lane provides a connection to an existing sidewalk in Austin, TX[88]

Figure 12S: Protected Bike Lane

[88] Photo Credit: Nathan Wilkes, City of Austin

Connect Santa Fe Trail to Riverfront Park

Wharton has begun to build out its hike and bike infrastructure with the opening of the Santa Fe trail. While the City should continue to invest in this amenity by extending the trail to the east, the City should also connect this trail via bike lane to the downtown and Riverfront Park. Figure 11O below illustrates the proposed alignment for this bike lane. It should extend south from the trail along Fulton Street, then heading west along Caney Street, and south along Polk Street to reach Elm Street and Riverfront Park.

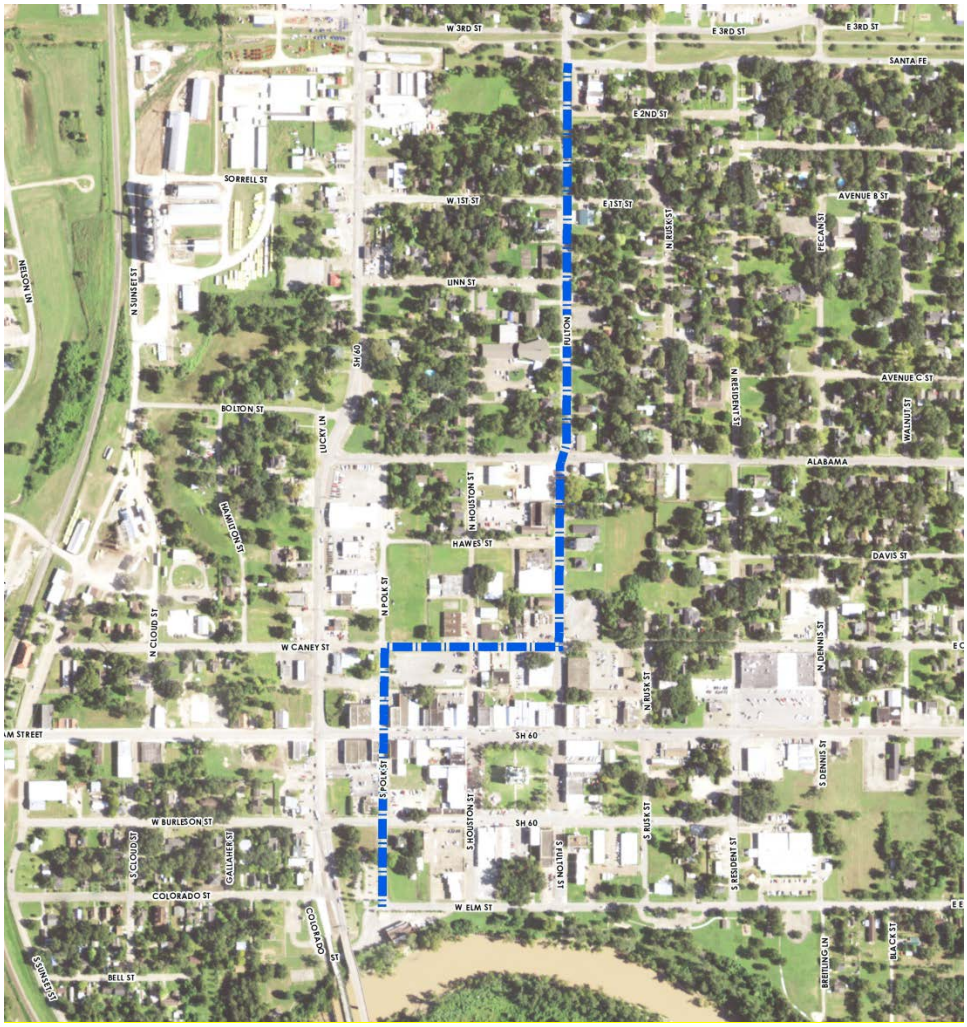


Figure 12T: Proposed Bike Path

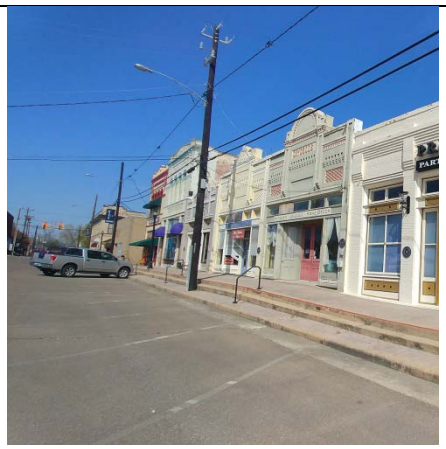
Supporting Facilities

Installing adequate supporting facilities will also be important for encouraging residents and visitors to access Monterry Square by bike. In the short term, the City of Wharton should invest in bike racks. In the longer term, the City should also consider installing a public, fixed-location bicycle maintenance stand/station.

Lighting

Street lighting is located at every intersection and mid-block on some streets in the CBD.

While the decorative lighting along Monterrey Square features underground wiring, there are still overhead cables running around the Square and the rest of the CBD. Burying lines may be easier on side streets south of the CBD where the City already has ROW. Another possibility is the use of solar lighting instead of wiring under the sidewalks. Increased lighting could direct visitors to the park from downtown for evening events. Texas Department of Agriculture Downtown Revitalization projects throughout the state have included the burying of overhead wiring to add decorative lighting. Some examples of decorative and modern lamps are shown below.

	*Street lighting in Monterrey Square*
	*Additional, lower lighting might assist with downtown revitalization. This type of historic lighting could be placed along Fulton Street to Houston Street to light up the route to the park and businesses, where installing underground wiring may be more feasible (on local streets).*

	*Visually appealing, dark-skies street light.*[89] *Dark-skies initiative popular in many rural communities do not conflict with historic design initiatives and can improve safety.*
	*Dark-skies glare reduction- brighter on the ground, less in the clouds*[90]

Figure 12U: Lighting Considerations in the CBD

The City of Wharton should also continue improvements to the courthouse and install the next phase of courthouse lighting and electrical connectivity for festivals.

Signs

The city regulates signs through its code of ordinances, including location and illumination. However, within the CBD in particular, the City should consider providing more specific design guidelines to help define the character of downtown Wharton.

The City also may want to consider broad regulations for awnings to better identify the downtown style. A design standards manual is recommended in the implementation plan, and a great example (Downtown Austin Wayfinding Master Plan) is included in the *Digital Appendix* of this plan.

[89] Example from www.visonairelighting.com; many companies now provide this kind of lighting
[90] Illustration from http://palomarskies.blogspot.com/2009/08/borrego-springs-ca-worldss-2nd-dark-sky-html

Some design standards for signage to consider include:

1. Encourage low-key, pedestrian-oriented (eye-level from sidewalks) signage.
2. Attached signs should be flush with the building facade, should not extend beyond the roofline, and should not hide interesting architectural detail.
3. Canopy signs can be painted directly onto canopies.
4. Small signs hung perpendicular to the street may be hung under canopies and arcades or from poles extending from the facade of the building.

12.4.6 Coordinate Funding & Community Efforts to Ensure Continuous Upkeep of Downtown Area & So that Opportunities can be Taken to Support Great Projects as they Arise

The Texas Department of Agriculture (TDA) has programs that the City can use as a guide for continued organization of its downtown revitalization and maintenance efforts. The TDA's downtown development programs suggest that the City appoint a central committee composed of 15 members of the community, including representatives from city government, the media, banks, the Chamber of Commerce, historians, real estate agents, and downtown owners. Additional subcommittees can be established to help implement programs. TDA suggests the following three subcommittees to begin: Design, Promotion, and Economic Restructuring and Organization.

The Promotion committee would develop strategies to increase foot traffic downtown. These may include increased advertising of annual events; surveys of residents and tourists about what businesses they would like to see downtown, increased signage to places of significance in the CBD or signs that delineate the CBD boundary; the development of monthly downtown promotion events, or more targeted worldwide Web presence.

The Design committee would work on establishing building and signage design guidelines for the CBD, assisting the City in adopting a Downtown Building Review Committee, or in establishing a similar relationship with the Young County Historical Commission.

The Economic Restructuring and Organization subcommittee would focus on creating methods to finance downtown revitalization. Financing mechanisms could include a low-interest loan program with local banks to fund the repair and upgrading of buildings in the CBD; a community foundation established to provide small grants to repair building facades and signage and to assist the City with downtown building rehabilitation incentives, including tax abatements; and creation of a CBD or tourism corridor investment zone that would generate City funds to be used only in the designated area.

The following sources of funding are currently available for CBD improvements.

Table 12C: Funding Sources for CBD Improvements

Source	Program
Wharton Economic Development Corporation	Used to fund downtown revitalization, offer business incentive packages, invest in project infrastructure, increase park amenities, and offer job training.
Wharton Chamber of Commerce	Funds from membership directed toward marketing, website formation and tapping members for funding
City of Wharton	Sales/property tax rebate program for limited time periods
Wharton County Historical Commission	The Commission helps to identify, research and recognize historic sites and buildings in Wharton County. The City could work with the County Historical Commission to fund more historic preservation projects and programs with increased funding from the County or joint funding from the cities and the County.
USDA Rural Business Programs	Guaranteed Business and Industry Loans to a corporation or an individual for business repair, enlargement or office/plant modernization; Rural Economic Development Loans (zero-interest) Under the REDLEG program, utilities can receive the funding to loan to businesses for projects to create or retain employment, the utility is responsible for re-paying the loan to the USDA RD; Rural Business Enterprise Grants, up to $500,000 available to small cities for land acquisition, building and plant renovations/modernizations; construction of access roads to businesses; parking areas, utilities; and start up business loans
Texas Department of Agriculture	Downtown Revitalization program: The minimum award is $50,000 and the maximum is $150,000, with at least a 20 percent cash or in-kind match from the applicant for downtown enhancement projects. Main Street Program: Membership requires the City hiring a full-time Main Street director. Members can make less competitive bids for project grants and receive technical assistance from the Texas Historical Commission on downtown improvements.
Texas Downtown Association	A $95 annual fee provides access to annual conferences and regional meetings; reduced fees for downtown assistance, strategic planning and guidance; access to cooperative advertising for Texas downtowns; legislative monitoring, and an invitation to apply for an annual foundation small grant (under $5,000) to assist downtown revitalization efforts.
Texas Historic Commission Independence Trail Region	$1,000 grants for producing marketing materials for tourism, marketing advice/training; purchase of a paragraph and picture in annual Independence Trail Region Travel Brochure for $500, Trooper Partner Program membership of $100 to $1,000 provides more marketing and tourism training opportunities

Federal tax benefits are available for building rehabilitation. Variations include 1) a 10% and 20% Federal Investment Tax Credit for Rehabilitation of buildings constructed before 1936. Buildings in a registered historic district receive a 20% reduction and those in a non-historic district receive a 10% tax reduction. 2) A 50% tax credit (within specific limits) for all modifications to buildings that bring it into compliance with the ADA. This would include the addition of, or modification to, a restroom for handicap compliance. State and local options include voluntary donations of a preservation easement or preservation restriction to the city or a not-for-profit organization protecting the property against changes that are inconsistent with the preservation of the property, such as demolition of historic buildings, inappropriate alterations, or subdivision of land. Such an easement may also protect against deterioration by imposing affirmative maintenance obligations.

The Texas Conservation Easement Act of 1983 gives a property owner the ability to preserve historic structures (as designated by the taxing entity or the Texas Historical or Historic Landmark Commission) and property, while providing tax relief to owners of historic properties. A preservation easement protects a property from alterations even after the original owner no longer holds the property. Three types of preservation easements can be attached to property deeds on land with historic buildings. They include 1) the exterior or façade easement that protects the outside appearance of significant structures and buildings by restricting alterations and requiring routine maintenance; 2) the scenic and open space easement that protects open spaces, historic and scenic views, the landscape surrounding significant buildings, archeological sites, and ecologically significant land; and 3) the rarely-used interior easement that protects all or part of a building's interior. An interior easement is difficult to monitor. A preservation easement can be terminated through condemnation (eminent domain), foreclosure, or abandonment of the property.

The restrictions of the easement are generally incorporated into a recordable preservation easement deed that is part of the property's title (in legal terms, it "runs with the land") – and this title interest is binding both on the present owner and future owners. Property owners who make such donations may be eligible for federal tax deductions. The National Trust for Historic Preservation explains the details of this mechanism:

There are many kinds of historic properties – and easements are as varied as the properties they protect. Most preservation easements protect, at the very least, the exterior character-defining features of a historic property, but many go beyond this to include interior features, the historic setting of a property, and/or specific landscape features. Most easements restrict the owner's use of development rights such as subdivision or air rights. Some allow the owner to exercise those rights, but only as approved by the easement-holding organization. Some prohibit additions or construction of secondary structures; others permit them if approved as compatible with the historic character of a building. The obligations of an easement run in two directions: the owner of the property has the obligation to comply with the terms of the easement, and the easement-holding organization has the obligation to monitor and enforce the easement.[91]

[91] What is a preservation easement? National Trust for Historic Preservation, *http://www.preservationnation.org/resources/legal-resources/easements* as accessed on the worldwide web in August of 2011.

Community efforts would be needed to begin a well-planned and coordinated marketing program that educates the public on the advantages of donating such an easement.[92]

12.5 Implementation Plan

The challenge during the planning period for Wharton will be managing the task of attracting desired businesses while making adequate and feasible public investments. The main strategy to accomplish this is to tap into the potential tourism draw and local population growth through downtown renovation like amenity upgrades, marketing and emphasis on Wharton history. In addition, new regulations or incentives to maintain buildings in a particular vernacular will encourage or force building owners to make rehabilitation decisions that benefit the whole CBD and maintain its historic roots. The plan establishes the following Goals and Activities the community can undertake to improve the CBD.

Table 12D: Implementation Plan: 2018-2028

Goals & Objectives	Activity Year(s)			Lead Organization	Cost Estimate	Funding Sources
	2018-2021	2022-2024	2025-2028			
Goal 12.1 *Leverage the CBD's historical buildings and character to project a unique image*						
Update Wharton's "brand' and use it in City publications, signage, downtown amenities, and websites. Select a narrow focus for the brand.	X			City, Chamber	Volunteers, appointed committee, students	GEN, Local
Develop a pattern book or design guideline book that owners can use when renovating buildings. Place on County and City websites for reference	X			EDC, City	Volunteers	GEN, EDC, THC
Establish a Business Improvement District to fund projects within the CBD	X	X		City	$500 (legal fees for review)	GEN
Create historic building and mural tour	X	X		City, Chamber, WHC	Staff, volunteer	GEN, Local, WHC
Adopt Downtown District Ordinance to add building heights, maximum building setbacks, transparency requirements to increase the aesthetic appeal of the areas outside of the central CBD		X		City	$500 (legal fees for review)	GEN

[92] Texas Community Heritage Development Division, Certified Local Government Program, "Local Government Assistance Series, Number 2, Historic Preservation Easements in Texas," See Appendix CDB A for complete report.

Consider adopting a Historic Preservation Ordinance		X	X	City	$500 (legal fees for review)	GEN
Goal 12.2 *Increase residential density within CBD*						
Adopt a Future Land Use Map/Plan that encourages infill development	X			City	Staff	GEN
Adopt a Downtown Zoning District/Overlay to regulate uses in the CBD		X	x	City	$500 (legal fees for review)	GEN
Encourage private infill development at selected sites through coordination with property owners and marketing to potential developers	X	X	X	City, EDC	Staff	GEN, EDC
Consider having EDC purchase lots from owners and reselling them through RFP process	X	X	X	City, EDC	~$45,000/acre	EDC, GEN
Goal 12.3 *Occupy historic buildings in CBD*						
Establish revolving loan program to fund building restoration	X	X		City, EDC	Variable	EDC, GEN
Adopt historic renovation building code for historic CBD properties		X		City	$500 (legal fees for review)	GEN
Increase funding for Business Restoration Program	X	X	X	City, EDC	~$100,000	EDC, GEN
Goal 12.4 *Connect Monterrey Square and Riverfront Park; develop Elm Street commercial district*						
Adopt a Riverfront Commercial Zoning District/Overlay to regulate uses near the Colorado River		X	X	City	$500 (legal fees for review)	GEN
Purchase and remove single-family home and build pedestrian mall connecting Monterrey Square and Riverfront Park		X	X	City, EDC	Variable	GEN, EDC, Local
Improve Riverfront Park, including removal of invasive plants and tree planting	X	X	X	City, EDC	$200,000+	GEN, EDC, TPWD
Goal 12.5 *Improve CBD experience by investing in bicycle and pedestrian amenities*						
Construct bike lane from Santa Fe Trail to Riverfront Park			X	City	~$50,000	GEN, EDC, SRTS, TxDOT
Complete sidewalk network throughout CBD	X	X	X	City, EDC	$333,000	GEN, EDC,

					THC, TxDOT
Goal 12.6 *Coordinate and organize funding and community efforts*					
Appoint a central committee and subcommittees to help coordinate efforts and implement programs	X		City	Staff	Staff

Sources: COUNTY-Wharton County; GEN = Municipal funds; Staff = Staff time; Local = donations of time/money/goods from private citizens, charitable organizations, and local businesses; Chamber = Wharton Chamber of Commerce; EDC= Wharton Economic Development Corporation; TCF = Texas Capital Fund – Downtown Revitalization Program OR Grant for Main Street Communities; TDA= Texas Department of Agriculture funds including TxCDBG (Community Development Block Grant) and TCF (Texas Capital Funds); TXDOT-Texas Department of Transportation Statewide Transportation Enhancements Grants; TPWD = Texas Parks and Wildlife Department; USDA= US Department of Agriculture Rural Development Rural Development funds.

FOR A FULL LIST OF FUNDING SOURCES, SEE CHAPTER 14

12.6 Appendix 12A: Texas Department of Agriculture Downtown Programs

Texas Main Street Program/ Texas Historical Commission

The Main Street Program assists cities with revitalizing their historic downtowns and neighborhood commercial districts by utilizing preservation and economic development strategies. Membership in the program would designate Wharton as an official historical main street community thereby qualifying the City for several financial assistance programs aimed at upgrading the Central Business District. However, the Main Street Program requires a Coordinator that designates at least 51% of his or work week toward program activities and is paid at least $30,000 per year with incremental annual raises. The City would be required to dedicate budgets for three (3) years of participation. Also, young cities in the Main Street program earn less application points than established cities on grant funding available only to Main Street communities, creating a lead time of at least two to four years before the City would begin to be competitive for that type of grant.

The Community Development Division of the THC takes applications each July for Main Street Program status. 86 cities in Texas have Main Street designations in cities ranging in population from 1,000 to 200,000. Benefits of program members include:

- Ongoing comprehensive training for Main Street managers and board members;
- Training for communities in successful economic development approaches;
- A three-day, on-site evaluation and full report with recommendations Design assistance;
- Consultation with downtown merchants about visual merchandising and window display; Advice on heritage tourism programs and marketing; and
- Participation in the Texas First Lady's Tour of Main Street cities

The THC also offers to organized communities a Certified Local Government designation. However, the city must be committed to historic preservation processes, establish a qualified historic district commission, adopt a local historic preservation ordinance that requires mandatory review of exterior alteration and demolition of designated historic properties, adopted local preservation plan, and annual reports of preservation progress. CLG Application requirements for cities include:

Enacting and enforcing a local historic preservation ordinance to accomplish the following:

- Establish a local review board, committee or commission

- Appoint a local historic preservation officer
- Adopt criteria and process for designating historic properties and districts
- Establish standards and process for the review of alterations, demolitions and new construction in designated districts, or to individual properties
- Follow the Secretary of the Interior's Standards for Rehabilitation
- Provide a minimum 60-day demolition delay for historic properties

Some cities rely on a County Certified Local Government to apply for funding. Wharton County already has an established Historic Commission. Wharton County has already completed a number of actions needed for County Application to become a Certified Local Government. County applications have less stringent requirements and include the following:

- Adopting and/or amend county historical commission by-laws to accomplish the following:
  - Establish a county commission
  - Appoint a county historic preservation officer
  - Define and provide a process for survey, inventory and protecting historic properties
  - Follow the Secretary of the Interior's Standards and Guidelines for Archaeology and Historic Preservation for all commission activities

Downtown Revitalization Program

The Downtown Revitalization program is provided to non-Main Street communities through the Texas Capital Fund administered by the Texas Department of Agriculture. The minimum award is $50,000 and the maximum is $150,000, with at least a 20 percent cash or in-kind match from the applicant. Main Street cities can also apply for similar funding.

The DR program requires that a city designate the boundaries of its original commercial center or its historic district; and pass a resolution declaring that the public infrastructure needing to be improved in that district has characteristics of "slum/blight" that should be eliminated. Awards for both the Main Street and the DR program may be used for the following public infrastructure in the designated downtown area:

- Acquisition of land needed for public infrastructure improvements
- Water & sewer facilities/lines

- Road/street construction/improvements
- Natural gas line construction/improvements
- Electric, telephone, & fiber optic line construction/improvements
- Traffic signals and signs
- Drainage
- Sidewalk construction/improvements
- Public parking lot construction/improvements
- Other construction activities required to eliminate architectural barriers for the handicapped

Applications are due in June annually. The City may score competitively for Downtown Revitalization funding under current Texas Department of Agriculture scoring criteria. Cities receiving funding in prior rounds of applications scored from between 75 to 95. In the sample below, Wharton scored at least a 70 if it were applying for Downtown Revitalization funding. If it boosted minority employment and created a project that mostly focused on ADA enhancements it could score as high as 85 points. Occasionally, funding criteria/scoring categories shown below change.

Scoring Categories (Max 90 Points)	
Community Need (Max 45 Points)	**Score**
Poverty Rate (Max 10 pts): Awarded if the applicant's most recently available, decennial poverty rate for individuals (**27.8%**) is higher than the annual state rate for individuals, indicating that the community is economically below the state average. Score **5** points if this figure meets or exceeds the state average of 16.7%. Score **10** points if this figure exceeds 19.2%. (Maximum 10 points)	**10**
Median Income (Max 10 pts): Awarded if the applicant's median household income **($32,243**) is lower than or equal to the annual state's household (**$54,727**): Score **5** points if the rate is lower than or equal to the state's median household income; or Score **10** points if this rate is 85% of the state's median household income.	**10**
Unemployment Rate (**Max 5 points**). Awarded if the applicant's unemployment rate (**9.4**%) meets or exceeds the annual state's unemployment rate **(6.4%).**	**5**
Economic Development Consideration (Max 5 pts): Awarded if the city has passed the economic development sales tax (4A, 4B or both). **Wharton ½-cent for 4B**	**5**
Previous Contracts (Max 10 pts): Score 5 points if the city has been awarded one contract in the current calendar year or preceding 2 calendar years. Score 10 points if the city has been awarded zero contracts in the current calendar year or the preceding 2 calendar years. **None in 2015, 2017, or 2017.**	**10**

Leverage, Economic Emphasis (Max 45 points)	
Leverage (Max 10 pts): A 10% cash match is required. Additional points will be given for additional matching funds. Score 5 points for contributing a 10% additional match; score 10 points for contributing an additional 20%. **Assumes city will provide a 10% match of up to $15,000.**	**10**
Broad-based Public Support (Max 10 points): Award 5 points for providing a letter from at least one of the following organizations: The County Historic Preservation Commission, the local design review board, the Economic Development Corporation or the Chamber of Commerce supporting the project and describing how the project enhances the community's historic assets and historic preservation goals. Score an additional 5 points for providing letters from 50% or more of the businesses and/or property owners impacted by the proposed project. This specifically includes businesses and /or property owners within one (1) block of the proposed improvements.	**10**
Sidewalks and ADA Compliance (Max 10 pts): Score 10 points if 70% of the requested funds will be used for sidewalk and/or ADA compliance activities.	**10**
TOTAL SCORE	**70+**

Base score is 60 points. Lowest score funded in 2010 was 70 points. Changes to the state scoring criteria may increase or decrease the competitiveness of the City's application.

More information about the Main Street Program can be accessed at http://www.thc.state.tx.us, and more information about the Downtown Revitalization Program can be accessed at http://www.agr.state.tx.us/agr/.

13 Capital Improvements Program

The condition of infrastructure is a major concern of all communities. Infrastructure deteriorates with time and use, and as cities expand, stress is placed upon the capacity of local governments to accommodate additional people. When properly developed and used, a capital improvements program (CIP) is a tool for local government to identify ongoing and long-term capital needs and assess financial capabilities to meet those needs.

13.1 Highlights

Although Wharton is a relatively small community, future growth is likely given the city's proximity to Houston; as such many investments in infrastructure and facilities will be made. The City has the financial capacity to carry out necessary capital improvements over the next 10 years. Local sales tax revenues have been rising since 2014 and property tax revenues remained fairly consistent between 2011 and 2016 despite a decrease in the property tax rate during the period. From 2015 to 2016, revenues from the Water and Sewer Fund increased 11%. The City's financial ratios (per capita debt, debt service coverage ratio, etc.) are within generally within standard benchmarks and indicate that Wharton could issue additional revenue bond debt on top of existing debt while maintaining a conservative fiscal policy.

Projects recommended in the 5-Year Capital Improvements Program Schedule at the end of this chapter (and on *Map 13: Capital Improvements Program*) total an estimated $14.8 million. The order of those projects and the exact locations of some improvements would depend on funding availability, engineering studies, and the changing needs of the community. Local financing options are discussed below, while *Chapter 14: Funding Sources* contains extensive information on grants and loans available from external sources.

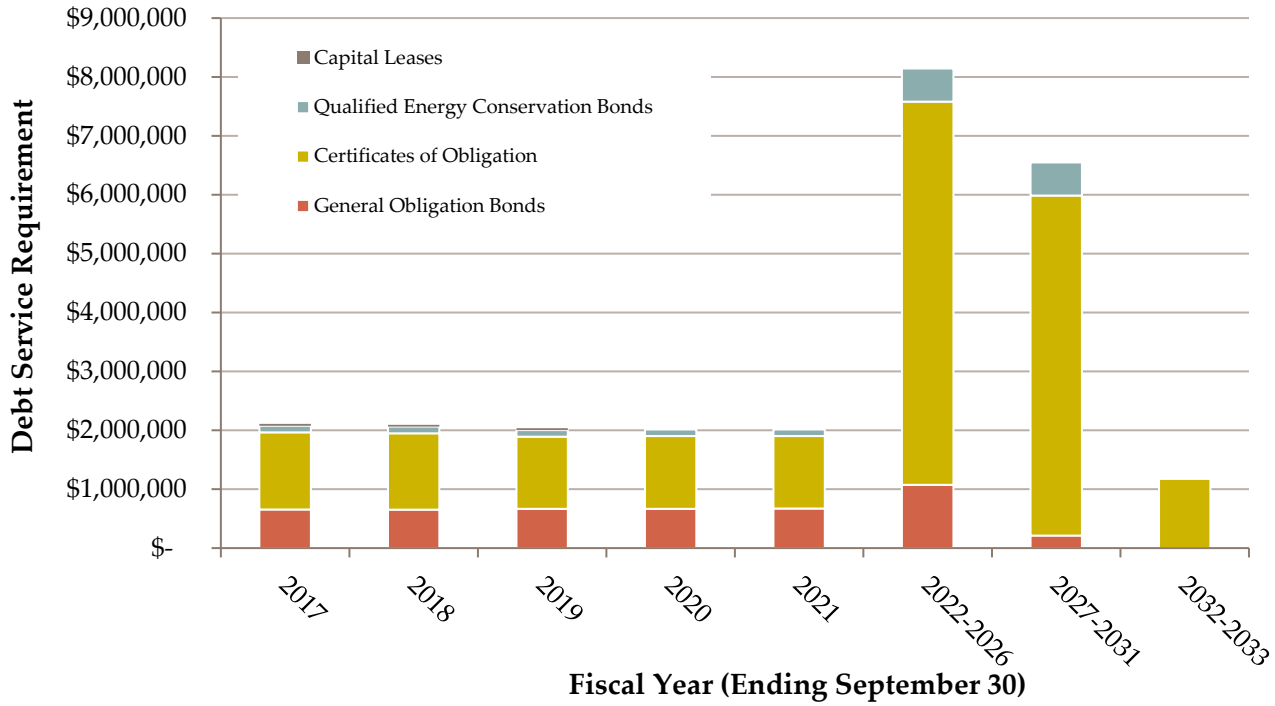
13.2 City Financial Condition

This section describes the City's financial condition with regards to public debt, income and expenditures, tax revenue trends, and residents' income levels.

13.2.1 Public Debt

The City's 2016 Audit identifies eight sources of debt: two General Obligation Refunding Bonds, four Combination Tax and Revenue Certificates of Obligation, one Qualified Energy Conservation Bond, and one Capital Lease. In 2027, the City will have paid off the majority of its current debts, with only three annual payments of $216,214 left (for the Series 2015 General Obligation Refunding Bond). *Chart 13A* describes the City's outstanding debt obligations.

Chart 13A: City Debt Service Payments



Source: Financial Report of City of Wharton, year ending 9/30/2016, number shown include interest

13.2.2 Income & Expenditures

The City's organization of revenues and expenses follows standard governmental accounting practice. The divides its revenue and expenditure streams into five funds: General Fund, Debt Service Fund, Water and Sewer Fund, Solid Waste Fund, Emergency Medical Services Fund, Civic Center Fund, and Airport Fund. The General Fund is the general operating fund of the City. Income for the General Fund is generated primarily through taxes, and expenditures include public safety, general government expenses, and other expenditures. The General Fund is used to account for resources traditionally associated with government that are not required legally or by sound financial management to be accounted for in another fund.

Between 2015 and 2016 General Fund revenues increased by 2%. During this time revenue from sales tax, franchise tax, charges for services, fines and forfeitures, and intergovernmental transfers increased, while revenues from property taxes interest, licenses and permits, industrial district fee, investment income, and other revenues decreased. The largest increase in revenues came from the sales tax which saw an increase of $96,307. Expenditures also increased modestly between 2015 and 2016. The 2% rise is the result of an increase in public safety and public works which increased by $115,500 and $120,000 respectively over the fiscal year.

Table 13A: General Fund Revenues & Expenditures

	2015	2016
Revenues		
Property taxes	$913,250	$900,908
Sales Tax	$1,295,561	$1,391,868
Franchise and local taxes	$1,077,112	$1,101,070
License and permits	$78,284	$72,173
Charges for services	$13,965	$14,671
Fines and forfeitures	$238,545	$276,532
Intergovernmental	$368,740	$409,727
Industrial district fee	$877,318	$830,603
Investment income	$2,127	$1,570
Other revenues	$23,732	$11,276
Total Revenues	**$4,888,634**	**$5,010,398**
Expenditures		
General government	$908,415	$973,007
Public safety	$3,260,797	$3,376,348
Public works	$1,092,871	$1,212,877
Cultural and recreation	$83,363	$98,532
Capital outlay	$338,242	$135,966
Debt Service - Principal	$19,317	$18,745
Debt Service - Interest and fiscal charges	$4,435	$2,600
Total Expenses	**$5,707,440**	**$5,818,075**
Other Financing Sources		
Sale of capital assets	$0	$22,400
Capital lease proceeds	$98,262	-
Transfers IN	$920,081	$819,616
Transfers Out	**($190,000)**	**-**
Total Other Financing Sources	**$828,343**	**$842,016**
Net Change in Fund	***$9,537***	***$34,339***
Beginning Fund Balance	*$1,718,096*	*$1,761,633*
Ending Fund Balance	*$1,727,633*	*$1,795,972*

Source: Annual Financial Report, year ending 9/30/2016 & Annual Financial Report, year ending 9/30/2015

The Water and Sewer Fund accounts for the activities of the City related to its wastewater collection and treatment plant as well as the water treatment and distribution system. Expenditures come primarily from water and sewer service and revenues come primarily from water and wastewater fees.

Between 2015 and 2016 revenues from the Water and Sewer Fund increased 11%, from $3.22 million to $3.59 million, while expenses increased by 9% from $2.34 million to $2.55 million. Revenues from water and sewer sales increased, as well as connection and installation fees. For expenditures the largest increase came from repairs and maintenance which saw a 170% rise ($147,000) and personal services (10% accounting for $84,340).

Table 13B: Proprietary Fund Revenues & Expenditures

	2015	2016
Operating Revenues		
Water Sales	$1,585,823	$1,759,634
Sewer Sales	$1,532,874	$1,704,599
Penalties	$42,284	$44,715
Connection and installation fees	$44,183	$70,410
Other	$14,406	$6,107
Total Operating Revenues	**$3,219,570**	**$3,585,465**
Operating Expenditures		
Personal Services	$883,749	$968,087
Materials and supplies	$112,389	$99,959
Repairs and maintenance	$86,068	$232,616
Other services and charges	$730,750	$721,637
Depreciation and amortization	$524,358	$528,348
Total Operating Expenses	**$2,337,314**	**$2,550,647**
Nonoperating Revenues		
Noncapital grants and contributions	-	$3,197
Investment income	$738	$566
Interest and fiscal charges	($224,470)	($335,535)
Total Nonoperating Revenues	**($223,732)**	**($331,772)**
Income (Loss) before Transfers	**$658,524**	**$703,046**
Capital grants and contributions	$378,329	$99,446
Operating Transfers In	$111	-
Operating Transfers Out	($846,669)	($746,204)
Net Change in Fund	*$190,295*	*$56,288*
Beginning Fund Balance	*$7,893,059*	*$8,083,354*
Ending Fund Balance	*$8,083,354*	*$8,139,642*

Source: Annual Financial Report, year ending 9/30/2016 & Annual Financial Report, year ending 9/30/2015

The Debt Service Fund is used to account for and report financial resources that are restricted, committed or assigned to expenditure for general government debt principal and interest. Revenues for the Debt Fund decreased by 3% while expenditures increased by 4% between the 2015 and 2016 fiscal years.

Table 13C: Debt Fund Revenues & Expenditures

	2015	2016
Revenues		
Property Taxes	$1,053,155	$1,022,617
Investment income	$803	$869
Total revenues	$1,053,958	$1,023,486
Expenditures		
Principal	$610,275	$653,578
Interest	$410,938	$410,434
Bond issuance costs	$0	$2,125
Total expenditures	$1,021,213	$1,066,137
Other Financing Sources		
Net change in fund balance	$32,745	($42,651)
Fund balance at beginning of year	$436,098	$468,843
Fund balance at end of year	**$468,843**	**$426,192**

Source: Annual Financial Report, year ending 9/30/2016 & Annual Financial Report, year ending 9/30/2015

The Solid Waste Fund accounts for the operations of the solid waste removal services provided to the residents of the City through a private company. Revenues for the Solid Waste Fund increased by 2% while expenditures decreased by 1% between the 2015 and 2016 fiscal years.

Table 13D: Solid Waste Fund Revenues & Expenditures

	2015	2016
Revenues		
Solid waste fees	$1,270,259	$1,292,658
Investment income	$107,814	$108,267
Other	$1,387	$553
Total revenues	$1,379,460	$1,401,478
Expenditures		
Personnel	$41,278	$44,229
Materials and supplies	$1,451	$208
Other services and charges	$1,301,097	$1,288,548
Total expenditures	$1,343,826	$1,332,985
Other Financing Sources		
Investment income	$111	$117
Total non-operating revenues	$111	$117
Net change in fund balance	$35,634	$68,493
Transfers out	$0	($25,000)
Change in net position	$35,745	$43,610
Fund balance at beginning of year	$26,356	$62,101
Fund balance at end of year	**$62,101**	**$105,711**

Source: Annual Financial Report, year ending 9/30/2016 & Annual Financial Report, year ending 9/30/2015

The Emergency Medical Services Fund accounts for the emergency medical services provided to the residents of the City. Revenues for the Emergency Medical Services Fund decreased by 14% while expenditures increased by 17% between the 2015 and 2016 fiscal years.

Table 13E: Emergency Services Fund Revenues & Expenditures

	2015	2016
Revenues		
Ambulance services	$963,589	$825,885
Other	$23	$0
Total revenues	$963,612	$825,885
Expenditures		
Personnel	$1,323,555	$1,600,208
Materials and supplies	$113,749	$114,104
Repairs and maintenance	$64,808	$71,265
Other services and charges	$150,029	$145,920
Depreciation	$119,362	$135,580
Total expenditures	$1,771,503	$2,067,077
Other Financing Sources		
Noncapital grant and contributions	$802,510	$955,281
Investment income	$1,287	$995
Total nonoperating revenues	$803,797	$956,276
Income loss before contributions and transfers	($4,094)	($284,916)
Capital grants and contributions	$189,647	$0
Transfers out	($98,412)	($98,412)
Change in net position	$87,141	($383,328)
Fund balance at beginning of year	$1,215,581	$1,302,722
Fund balance at end of year	**$1,302,722**	**$919,394**

Source: Annual Financial Report, year ending 9/30/2016 & Annual Financial Report, year ending 9/30/2015

The Civic Center Fund accounts for the operation of the City's civic center. Revenues for the Civic Center Fund increased by 3% while expenditures increased by 20% between the 2015 and 2016 fiscal years.

Table 13F: Civic Center Fund Revenues & Expenditures

	2015	2016
Revenues		
Civic Center fees	$59,251	$61,431
Other	$14,851	$14,851
Total revenues	$74,102	$76,282
Expenditures		
Personnel	$107,380	$157,305
Materials and supplies	$3,112	$7,109
Repairs and maintenance	$35,987	$21,942
Other services and charges	$43,870	$46,557
Depreciation	$38,696	$42,754
Total expenditures	$229,045	$275,667
Other Financing Sources		
Noncapital grant and contributions	$0	$1,911
Investment income	$109	$7
Interest and fiscal charges	($5,591)	($9,479)
Total non-operating revenues	**($5,482)**	**($7,561)**
Income loss before transfers	($160,425)	($206,946)
Transfers	$156,724	$168,724
Change in net position	($3,701)	($38,222)
Fund balance at beginning of year	$1,108,836	$1,105,135
Fund balance at end of year	**$1,105,135**	**$1,066,913**

Source: Annual Financial Report, year ending 9/30/2016 & Annual Financial Report, year ending 9/30/2015

The Airport Fund accounts for the operation of the City's airport. Revenues for the Airport Fund increased by 23% while expenditures increased by 1% between the 2015 and 2016 fiscal years.

Table 13G: Airport Fund Revenues & Expenditures

	2015	2016
Revenues		
Civic Center fees	$171,931	$211,211
Other	$0	$0
Total revenues	$171,931	$211,211
Expenditures		
Personnel	$74,503	$80,307
Materials and supplies	$3,322	$3,436
Repairs and maintenance	$26,329	$21,615
Other services and charges	$40,864	$39,958
Depreciation	$112,137	$114,092
Total expenditures	$257,155	$259,408
Other Financing Sources		
Noncapital grant and contributions	$45,171	$75,780
Investment income	$206	$94
Interest and fiscal charges	($10,387)	($37,067)
Total non-operating revenues	$34,990	$38,807
Income before contributions	($50,234)	($9,390)
Capital grants and contributions	$60,096	$0
Change in net position	$9,862	($9,390)
Fund balance at beginning of year	$3,987,037	$3,996,899
Fund balance at end of year	**$3,996,899**	**$3,987,509**

Source: Annual Financial Report, year ending 9/30/2016 & Annual Financial Report, year ending 9/30/2015

13.2.3 Local Taxes

Local taxes are Wharton's primary source of general fund revenues. Wharton's sales tax allocations have, overall, increased since 2011, though there was a decrease between 2013 and 2014. Property tax allocations have decreased slightly over that period, though that is mainly due to a drop in the property tax rate. The City's property tax rate decreased from 2009 to 2016, declining from $0.5128 to its present level of $0.442 per $100 taxable value. The total valuation of property increased significantly from $397,706,496 in 2009 to $444,930,482 in 2016; the total valuation did drop between 2015 and 2016 by roughly $4 million, which was accompanied by a slight uptick in the property tax rate from $0.432. At $0.442 per $100 taxable value, Wharton's property tax rate is lower than the Texas average for all cities ($0.519) and for cities with populations between 5,000 and 10,000 residents ($0.55).

Chart 13B: Property Tax Rate History (per $100 taxable value)

Chart 13C: Tax Allocation History[93]

[93] Comptroller at www.texasahead.org/texasedge/run_report.php and Texas Bond Review Board at www.brb.state.tx.us/

13.2.4 Community Income Levels

The income levels of residents can affect which grant programs are available for capital improvements. The following statistics are those most often used by State agencies for grant qualification. Numerous grant and loan programs are described in *Chapter 14: Funding Sources*. As program requirements change frequently, individual agencies and organizations should be contacted for details prior to applying. One thing to keep in mind when reviewing Census data for small areas like Wharton is the large Margin of Error. In some cases, like when income levels are decisive for grant requirements, the City may find that conducting an income survey will produce more accurate results than the data provided by the U.S. Census' American Community Survey.

- According to the 2012-2016 American Community Survey, Wharton's annual per capita income is $ 16,063.[94] Some programs require per capita income to be 80% of the national income or lower or below the State-wide average; Texas has a per capita income of $27,828, 80% of which is $22,262.

- Wharton's poverty rate is 27.8%, which is higher than the Wharton County rate of 17.7% and the state-wide rate of 16.7%.[95] Higher poverty rates can score additional points in some grant programs.

- The unemployment rate for Wharton County in the 4th quarter of 2016 was 5.0%, above the Texas rate of 4.6% and the national rate of 4.7%.[96] Some grant programs are more available to localities where unemployment rates exceed the national rate by at least one percentage point.

- The US Department of Housing and Urban Development (HUD) sets income limits to determine who can qualify for programs such as Housing Choice Vouchers (Section 8) and HOME. HUD reports Median Family Income in 2017 for Wharton County at $53,700 and has set the income limits for 2017 at those listed by family size in *Table 13H (next page)*.[97]

- TxCDBG programs require that at least 51% of residents for communitywide projects be moderate to low income. In *Table 13* below that would correspond to HUD definitions of "low" to "extremely low."

[94] U.S. Census Bureau at http://factfinder2.census.gov
[95] The numbers used for Community Development Block Grant and Texas Capital Fund grants come from the American Community Survey 5-year estimates, Table DP03, Poverty level of "All people", accessible from http://factfinder2.census.gov/main.html
[96] From the Bureau of Labor Statistics: http://www.bls.gov/lau/
[97] HUD data available from www.huduser.org/portal/datasets/il.html

Table 13H: HUD Income Limits

Wharton County, Texas								
FY 2017 Income Limit Category	$19,000	$21,700	$24,400	$27,100	$29,300	$31,450	$33,650	$35,800
Very Low (50%) Income Limits*	$12,060	$16,240	$20,420	$24,600	$28,780	$31,450	$33,650	$35,800
Extremely Low Income	$30,350	$34,700	$39,050	$43,350	$46,850	$50,300	$53,800	$57,250
Low (80%) Income Limits	$19,000	$21,700	$24,400	$27,100	$29,300	$31,450	$33,650	$35,800

**The FY 2014 Consolidated Appropriations Act changed the definition of extremely low-income to be the greater of 30/50ths (60 percent) of the Section 8 very low-income limit or the poverty guideline as established by the Department of Health and Human Services (HHS), provided that this amount is not greater than the Section 8 50 percent very low-income limit. Consequently, the extremely low-income limits may equal the very low (50 percent) income limits.*

13.3 Key Capital Improvements Considerations

Based on the capital needs identified in other chapters of this comprehensive plan and the financial data described above, the City of Wharton should focus on the following key issues related to capital improvements.

13.3.1 Public Improvements Debt Financing Options

The type of financing used to pay for infrastructure expenditures depends on several factors, most critically the annual tax revenues generated, the unmet demand for different infrastructure projects, and the jurisdiction's indebtedness. Because costs often run into the millions of dollars, multiple sources are often used to finance infrastructure expansion or replacement: general obligation bonds and certificates of general obligation, revenue bonds, operating revenues/general fund, impact fees, and State or federal funds. The following list does not include external funding options, which have been described in other chapters of this plan and include: grants and below-market loans (*Chapter 14: Funding Sources)*, volunteer activities, inter-community partnerships, and public-private partnerships.

- General obligation (G.O.) bonds are paid out of annual general revenues. These bonds usually raise large sums of money with the debt retired over several decades. G.O. bonds are backed by the "full faith, credit and taxing powers" of the issuing jurisdiction. When G.O. bonds are sold, the jurisdiction guarantees that it will raise sufficient revenues to retire the debt on schedule, usually using property taxes. Because G.O. bonds are repaid by all taxpayers in a community, they are usually used to finance projects that benefit the community as a whole, such as public buildings, parks, recreation centers, and major street improvements. G.O. bonds require voter approval.

- Certificates of Obligation are similar to G.O. bonds. However, they are usually used to pay a contractual obligation incurred in: (1) a construction contract; (2) the purchase of materials, supplies, equipment, machinery, buildings, land, and rights-of-way for authorized needs and purposes; or (3) the payment of professional services, including services provided by appraisers, engineers, architects, attorneys, auditors, financial advisors, and fiscal agents. Debt service is paid from tax revenue and/or system revenues. C.O. bonds, unlike G.O. bonds do not require voter approval.

- Revenue bonds are sold to develop projects that produce revenues, such as municipal sewer and water systems. The guarantee of repayment comes from the revenues generated by the financed project, which usually includes taxes or fees collected from the project's beneficiaries. Most projects financed using revenue bonds benefit a wide class of users, such as water customers, airport users, or toll road users. Unlike G.O. bonds, revenue bonds do not require the backing of the jurisdiction's "full faith, credit and taxing powers." Consequently, the local government is not obligated to raise taxes to avoid default, but revenue bonds usually carry higher interest rates than general obligation bonds. Voter approval is not usually necessary to float revenue bonds.

- Private Activity Bonds are a special type of bond administered by the Texas Bond Review Board. From the Bond Review Board website:

  Private activity bonds are those bonds that meet any of the following tests: 1) Private Business Use Test - more than 10 percent of the proceeds are to be used for any private business use; 2) Private Security or Payment Test - payment on principal or interest of more than 10 percent of the proceeds is to be directly or indirectly secured by, or payments are to be derived from, a private business use; and 3) Private Loan Financing Test - proceeds are to be used to make or finance loans to persons other than governmental units.[98]

  The Tax Act of 1986 limited municipality Private Activity Bond use. The Texas Bond Review Board allocates these bonds on a "first-come, first-served" basis every year. They should be contacted at 1-512-463-1741 (or at www.brb.state.tx.us) if a municipality or jurisdiction wishes to be considered for an allocation.

[98] TX Bond Review Board: www.brb.state.tx.us/pab/pab.aspx

- Sales Tax Bonds (Texas Leverage Fund program) are available to cities that have passed the local Sales and Use Tax for Economic Development. Loans leverage future local sales and use taxes that will be due the 4A or 4B Economic Development Corporation in future years. The program is designed to give cities quick capital for business development activities approved in the legislation voters approved in forming the 4A (manufacturing or industrial activities) or 4B (business development and infrastructure activities including those that improve quality of life for the City). Loans cannot exceed $5 million.

- General Fund Operating Revenues are funds that are derived from the income-generating functions of a local government. Financing infrastructure with operating revenues or the general fund saves the interest and fees associated with issuing bonds. However, because the operating revenue cannot usually provide the large cash flows of a bond issuance, General Fund Operating Revenues are usually used to finance smaller, lower-cost capital improvement projects that can be paid for in one year. Some cities with limited budgets have allocated a portion of their budgets annually into a fund for specific projects, such as street or drainage improvement, and allowed the fund to accumulate and gain interest until it was large enough to fund a project.

- Exactions. A city may require that a developer fund or construct public facilities in proportion to the impact the development will have on city services. Exactions can include dedication of land for specific purposes or construction of public facilities as authorized by constitutional, statutory or charter authority, such as that enabled by a subdivision ordinance. Projects often include drainage easements and facilities, street and alley right of way, water and wastewater easements and facilities, street lighting, fire hydrants, sidewalks, street signs, and traffic control devices. Less common are park dedication (or fees in lieu); school site dedications; major public works facility dedication (e.g. water treatment plant); and public service facility dedication (e.g. fire or police stations, library branches). Cities must show that the dedication, construction, or payment in lieu is "reasonably related" to the public needs created by the new development.

- Fees include user fees, impact fees, and special assessments and are usually collected from the beneficiaries of a project. User fees include public swimming pool or golf course user fees, trash collection fees, or water meter tap fees. Impact fees, a type of exaction, include charges to property developers to defray the costs of providing off-site water, sewer, and transportation infrastructure impacted by a new development. Developers typically pass the cost of infrastructure construction to the primary beneficiaries: the residents of the new development.

- Special assessments are used to fund improvements such as water, wastewater, drainage, sidewalk, parking, library, recreation, and landscaping. While impact fees reflect the cost of the development, special assessments reflect the projected increase in a development's value created by the improvements. They are assessed against properties affected by the improvement and must be approved by property owners representing more than 50% of the area of property to be taxed.

Additional Considerations

Cost of Financing: Each option available to pay for infrastructure carries a certain financial obligation. One objective of local governments is to incur minimal interest and finance charges, which may depend on the bond rating of the jurisdiction. If enterprise funds, revenues from general taxes, or outside assistance from state or federal sources are sufficient to pay for infrastructure development, no financing costs will be incurred.

Nevertheless, most cities find that they must issue debt to provide needed services. A 2016 Texas Municipal League survey of cities indicated that, for cities with populations between 5,000 and 10,000 residents, 90% had general obligation or revenue bonds or certificates of obligation. General obligation bond debt ranged from $115,000 to $23.83 million. Certificate of obligation debt ranged from $115,000 to $22.475 million. Revenue bond debt ranged from $50,000 to $21.426 million. Most of the debt paid for water and sewer infrastructure, municipal buildings, and parks.

Equity: Local governments must determine the relationship between those who receive the benefits and those who pay the costs. In some cases, it is possible to identify groups of individuals who benefit more directly from a particular project; in others, the benefit may be more widely distributed. Some forms of financing may be more burdensome to one group of citizens than another, leaving local governments to decide how the costs and benefits of infrastructure projects will be distributed. Some financing mechanisms, such as impact fees and special assessments, require the government to prove a relationship between the residents served and the fee paid.

Political Acceptability: While most communities have a range of infrastructure financing options, local political realities often play a major role in determining which option is chosen. In some communities, it may not be politically feasible to increase property taxes, while it may be acceptable to issue bonded indebtedness for a specifically earmarked purpose. In other cases, it may be more acceptable to charge fees directly to those who benefit from a project or incur debt that will be repaid by fees charged for use of the project.

13.3.2 City Debt Capacity

Debt capacity analysis is used to determine how much additional debt the City could afford. Based on the above summary of the City's finances and the following analysis, the City has the capacity to issue new debt. Currently, the City can issue approximately $10.0 million in new Proprietary Fund backed debt, or around $1.0 million in yearly debt service.

The analysis below uses standard benchmarks to evaluate the current debt burden of a municipality. Major debt issuance decisions would require more detailed study of market interest rates, available funding packages, loans and bonds issued by other area political entities, and other factors at the time of financing.

Direct Debt as a Percentage of Market Value: *Direct debt measures total debt outstanding as a percentage of the assessed value of property in the City. Direct debt should not exceed 10%*. More fiscally conservative communities use 6% as the upper limit for direct debt. Less fiscally conservative communities calculate direct debt using market value rather than assessed value.

The total assessed value of the property in Wharton in 2016 was $464,703,262. Based on a benchmark of 6% to 10% of assessed property value, Wharton's local tax base could support between $27.88 and $46.47 million in general obligation debt. Wharton's $26,134,630 is within this benchmark.

Per Capita Bonded Indebtedness: *The amount of direct debt outstanding for each citizen of a jurisdiction should generally be kept below $1,200 (principal only).* More fiscally conservative communities set the upper limit at $600. Direct debt includes all long-term obligations supported by general revenues and taxes, including combination bonds that are backed by taxes and general revenues.

Based on this plan's 2017 population estimate of 9,063, the City could support between $5.4 million and $10.86 million in tax-supported debt according to this indicator. The City's debt of $26.3 million and per capita bonded indebtedness of $2,884 is well beyond this limit.

Overlapping Debt: *The City's debt burden from debt held by all jurisdictions should be no more than 10%.* Overlapping debt is calculated as the City's direct debt plus the percentage of debt held by overlapping jurisdictions that will be paid by taxes from the assessed value of land within the city limits.

As shown in *Table 13I*, Wharton's overlapping debt is 6%. Most of the debt is generated by bonds issued by the City of Wharton.

Table 13I: Total/Overlapping Debt (FY 2016)

Taxing Entity	Outstanding Debt	City's Share of Assessed Value	City's portion of debt based on Assessed Value
Wharton	$26,041,359	100%	$26,041,359
Wharton ISD	$20,350,000	47%	$9,568,820
Wharton County Junior College District	$1,935,000	10.9%	$210,632
Totals	$48,326,359		$30,075,362
Wharton Assessed Value = $464,703,262			
Total Direct and Overlapping Debt as a percent of net assessed value:			**6%**

Source: Texas Bond Review Board Website: at www.brb.state.tx.us/lgs/lgsdbsearch.aspx

Annual Debt Service as a Percentage of Receipts: *The City's annual debt service (principal and interest) should not exceed 20% of the City's annual receipts.*

The City's annual debt service for 2017 is expected to be $2,108,378 (principal and interest for 2017). In 2016, $12,134,205 was generated in all fund revenues. That debt service is approximately 17% of the City's annual receipts, which is within the 20% maximum. According to this indicator, Wharton could support annual debt service of up to $2,426,841.

Revenue Debt (debt service coverage ratio): *The debt service coverage ratio (DSCR) refers to the amount of cash available to meet annual payments on debt, and a DSCR greater than 1.0 is required to make annual debt payments.* The DSCR is calculated using the following equation:

$$\frac{\text{(Net Operating Income + depreciation and amortization + non-operating revenues)}}{\text{Annual Debt Service (principal and interest)}}$$

For the purposes of this study two DSCR calculations were made to determine the capacity of the City to issue new debt backed by General Fund (property, sales tax) revenues and the capacity to issue debt backed by Proprietary Fund (utility fees) revenues.

In 2016, the General Fund had a Debt Service Coverage Ratio of -2.05, which indicates no new general revenue-backed debt may be incurred. The Proprietary Fund had a Debt Service Coverage Ratio of 6.14, which is well above the benchmark for revenue debt.

Accordingly, given current revenues, expenditures and debt service levels for both the general and proprietary fund, Wharton can issue additional Proprietary Fund backed debt without needing to raise revenues. Once the City pays off its tax note in 2021, it may revisit the issuance of new General Fund backed debt.

13.3.3 Impact of Projects on Protected Classes

In prioritizing projects, the City considered the locations of past infrastructure projects and the locations of projects recommended in the various studies in the plan to determine if those projects had or would inadvertently result in disparate treatment of members of protected classes. Specifically, it noted whether infrastructure projects had the impact of:

- Positively promoting affordable housing in areas outside of geographic concentration and giving members of protected classes the opportunity to move out of areas of concentration;
- Positively promoting equal treatment and access for disabled persons, particularly in public facilities;
- Negatively promoting racial concentration or disparate treatment of members of protected classes; or
- Negatively placing undesirable infrastructure in areas where protected classes reside.

As discussed in *Chapter 3: Housing Study,* Wharton several areas of significant minority concentration at the block group level, the level of analysis used by the State to define concentrations of protected classes. The geographic distribution of other protected classes (color, national origin, religion, sex, familial status or handicap) is unknown as the Census does not report this data geographically for cities the size of Wharton.

As shown in the infrastructure and housing studies accompanying this plan, the condition of existing infrastructure is similar throughout the city. There is no indication of historical neglect in any areas. Capital improvement projects prioritized in the tables that follow, and include all areas of the city. The following specific projects would have a positive impact on all residents of Wharton, including the protected classes:

- **Water Phase 1 (2018-2020):** A new 2,000 GPM well; 500,000-gallon ground storage tank; and pump station to provide a future potable water source. Project will include a new vertical turbine pump and motor, up to 800' of well casing, required screening, storage tank, pump station building, disinfection unit, motor and pump controls and associated electrical service, yard piping, alarms, and security fencing. The Project will also include administration, Engineering & Survey services.
- **Water Phase 2 (2020-2023):** Obtain funding to replace approximately 4,550 LF of existing 2" water lines with 6" PVC WL along Dahlgren, Belle, and Abel St. The project will also include replacement of 2" WL and line extension along Wayside, with approximately 3,500 LF of 12" PVC WL to loop with the existing lines. The project will also include, approximately eight (8) fire hydrants at appropriate locations, service re-connects, valves, street, pavement, and driveway repair, administration, and Engineering & Survey services.

- **Water Phase 3 (2023-2028):** Obtain funding to replace approximately 5,300 LF of existing 2" water lines with 6" PVC WL along Croom, Lily, and Circle St. The project will also include replacement of 8" AC WL along Old City Lane, with approximately 3,000 LF of 12" PVC WL. The project will also include, approximately nine (9) fire hydrants at appropriate locations, service re-connects, valves, street, pavement, and driveway repair, administration, and Engineering & Survey services.
- **Water Phase 4 (2023-2028):** Obtain funding to replace and extend approximately 9,200 LF of existing water lines with 12" PVC WL along Burleson, Sunset, Spanish Camp, Harrison, and FM 102. The project will also include approximately 300 LF of bored and encased 12" PVC WL under the Railroad ROW. The project will also include, approximately 13 fire hydrants at appropriate locations, service re-connects, valves, street, pavement, and driveway repair, administration, and Engineering & Survey services.
- **Wastewater Phase 1 (2018-2020):** Obtain funding to replace all air lines at the WWTP #1 and Convert WWTP #1 to a true activated sludge process. Projects will include administrative, engineering, and survey services.
- **Wastewater Phase 2 (2020-2023):** Obtain funding to rehabilitate the clarifier at WWTP#1 and add an Anoxic basin to WWTP #1. Projects will include administrative, engineering, and survey services.
- **Wastewater Phase 3 (2019-2028):** Obtain funding to rehabilitate one lift station per year (total 9 lift stations). Project will include administrative, engineering, and survey services.
- **Wastewater Phase 4 (2023-2028):** Caney St. 12" Sewer Line Replacement Phase I and SE Wharton Sewer Line Replacement Phase I. Projects will include replacement of existing sewer lines, manholes, and existing sewer services, pavement repair, administrative, engineering, and survey services.
- **Drainage Phase 1 (2018-2020)**: Obtain funding for two drainage studies of the southeast and north and central areas of town to evaluate existing conditions and capacity of existing underground storm sewers and ditches in Study Area B and identify and recommend opportunities for detention and restoring drainage paths to the existing ditches and creeks draining the downtown area. Project will also include re-grading of approximately 20,000 LF of roadside ditches in the southeastern portion of the city, Administration, Engineering, & Surveying services. and Administration, Engineering, & Surveying services.

- **Drainage Phase 2 (2020-2022):** Obtain funding to re-grade approximately 52,600 LF of existing roadside ditches in the northern portion of the city, and Administration, Engineering, & Surveying services.

- **Drainage Phase 3 (2023-2025):** Continue to obtain funding to re-grade approximately 41,700 LF of existing roadside ditches in the northern portion of the city and replace undersized and/or damaged culverts in selected portions of the City. Project will include culvert replacements, SET's at both ends of culvert replacements, re-grading of existing roadside ditches, pavement and driveway repair, and Administration, Engineering, & Surveying services.

- **Drainage Phase 4 (2025-2028):** Obtain funding to implement the recommendations of the Area B Drainage Study to restore and improve storm water conveyance and construct regional detention facilities, as appropriate. Project will include culvert and storm water clearance and replacements, SET's at both ends of culvert replacements, re-grading of existing roadside ditches, new channel and roadside ditches where appropriate, detention pond improvements where appropriate, pavement and driveway repair, and Administration, Engineering, & Surveying services.

- **Streets Phase 1 (2018-2021):** Repair 57,135 Linear Feet (LF) of streets primarily in Wharton's west end, with Phase 1 improvements for water or wastewater; and/or routes that direct traffic to highly traveled destinations, including schools, parks, commercial areas, and major thoroughfares. The repair operations should include an overlay process for the sections of paved streets that can be salvaged. Cost estimates assume paving of unpaved roads and reclaim/reconstruct for concrete roads in poor condition to be replaced with asphalt.

- **Streets Phase 2 (2022-2024):** Repair 88,600 Linear Feet (LF) of street primarily in north Wharton; with Phase 2 improvements for water or wastewater, and/or routes that direct traffic to highly traveled destinations, including schools, parks, commercial areas, and major thoroughfares. The repair operations should include an overlay process for the sections of paved streets that can be salvaged. Cost estimates assume paving of unpaved roads and reclaim/reconstruct for concrete roads in poor condition to be replaced with asphalt.

- **Streets Phase 3 (2025-2026):** Repair 84,457 Linear Feet (LF) of street primarily in west and central Wharton; with Phase 3 improvements for water or wastewater, and/or routes that direct traffic to highly traveled destinations, including schools, parks, commercial areas, and major thoroughfares. The repair operations should include an overlay process for the sections of paved streets that can be salvaged. Cost estimates assume paving of unpaved roads and reclaim/reconstruct for concrete roads in poor condition to be replaced with asphalt.

- **Streets Phase 4 (2027-2028):** Repair 64,300 Linear Feet (LF) of street primarily in central Wharton; with Phase 4 improvements for water or wastewater, and/or routes that direct traffic to highly traveled destinations, including schools, parks, commercial areas, and major thoroughfares. The repair operations should include an overlay process for the sections of paved streets that can be salvaged. Cost estimates assume paving of unpaved roads and reclaim/reconstruct for concrete roads in poor condition to be replaced with asphalt.

- **Thoroughfares (2018-2028):** Several improvements are recommended for Wharton's thoroughfares including construction of additional sidewalks, repaving of existing sidewalk network, installing missing stop signs, and related improvements involving the CBD.

- **Parks & Recreation (2018-2028)**: Several improvements are recommended for Wharton's parks including constructing three general use/soccer fields, one light activity area, and additional multiuse trails, as well as installing additional picnic tables with BBQ grills and park benches as appropriate. Park facilities should follow state standards for ADA accessibility.

- **Central Business District (2018-2028):** Several improvements are recommended for the Central Business District (CBD) including improvements to Riverfront Park including removal or invasive plants and tree plants, construction of pedestrian mall connecting Monterrey Square and Riverfront Park, complete sidewalk network throughout CBD, and build bike lane from Santa Fe Trail to Riverfront Park

In the past, the City has been awarded several TxCDBG grants to make improvements its water and wastewater systems. Previous City-managed fair housing initiatives are described in *Chapter 3: Housing Study.*

13.4 10-Year Capital Needs Prioritization

This section prioritizes the capital needs identified throughout the Comprehensive Plan and provides a consolidated overview of recommended improvements for the next 10 years. Due to competition for limited funds, improvements that may be considered "mandatory" because they promote health and safety may be built after other improvements considered "desirable" or "acceptable" such as certain street construction or park improvements. A community must consider both the urgency and the feasibility of a particular capital project. If funds are likely to become available for a lower priority project before a higher priority project, the City should indicate that on its capital improvements schedule. Capital needs have been classified using the following system:

1. Mandatory (M): those which address an imminent threat to life or health;
2. Necessary (N): those which provide important public services by improving existing systems and/or replacing obsolete facilities;
3. Desirable (D): those which improve the aesthetic aspects of a community or address quality of life issues;
4. Acceptable (A): those which may fall under the "necessary" or "desirable" categories above, but are undertaken primarily to reduce operating costs to the City.

Table 13J: Capital Needs Prioritization

Water Projects	Year	Need
A new 2,000 GPM well; 500,000-gallon ground storage tank; and pump station to provide a future potable water source. Project will include a new vertical turbine pump and motor, up to 800' of well casing, required screening, storage tank, pump station building, disinfection unit, motor and pump controls and associated electrical service, yard piping, alarms, and security fencing. The Project will also include administration, Engineering & Survey services.	2018-2020	Mandatory
Obtain funding to replace approximately 4,550 LF of existing 2" water lines with 6" PVC WL along Dahlgren, Belle, and Abel St. The project will also include replacement of 2" WL and line extension along Wayside, with approximately 3,500 LF of 12" PVC WL to loop with the existing lines. The project will also include, approximately eight (8) fire hydrants at appropriate locations, service re-connects, valves, street, pavement, and driveway repair, administration, and Engineering & Survey services.	2020-2223	Mandatory
Obtain funding to replace approximately 5,300 LF of existing 2" water lines with 6" PVC WL along Croom, Lily, and Circle St. The project will also include replacement of 8" AC WL along Old City Lane, with approximately 3,000 LF of 12" PVC WL. The project will also include, approximately nine (9) fire hydrants at appropriate locations, service re-connects, valves, street, pavement, and driveway repair, administration, and Engineering & Survey services.	2023-2028	Mandatory
Obtain funding to replace and extend approximately 9,200 LF of existing water lines with 12" PVC WL along Burleson, Sunset, Spanish Camp, Harrison, and FM 102. The project will also include approximately 300 LF of bored and encased 12" PVC WL under the Railroad ROW. The project will also include, approximately 13 fire hydrants at appropriate locations, service re-connects, valves, street, pavement, and driveway repair, administration, and Engineering & Survey services.	2023-2028	Mandatory

Wastewater Projects	Year	Need
Obtain funding to replace all air lines at the WWTP #1 and Convert WWTP #1 to a true activated sludge process. Projects will include administrative, engineering, and survey services.	2018-2020	Mandatory
Obtain funding to rehabilitate the clarifier at WWTP#1 and add an Anoxic basin to WWTP #1. Projects will include administrative, engineering, and survey services.	2020-2023	Mandatory
Obtain funding to rehabilitate one lift station per year (total 9 lift stations). Project will include administrative, engineering, and survey services.	2019-2028	Mandatory
Caney St. 12" Sewer Line Replacement Phase I and SE Wharton Sewer Line Replacement Phase I. Projects will include replacement of existing sewer lines, manholes, and existing sewer services, pavement repair, administrative, engineering, and survey services.	2023-2028	Mandatory
Drainage Projects	**Year**	**Need**
Obtain funding for two drainage studies of the southeast and north and central areas of town to evaluate existing conditions and capacity of existing underground storm sewers and ditches in Study Area B and identify and recommend opportunities for detention and restoring drainage paths to the existing ditches and creeks draining the downtown area. Project will also include re-grading of approximately 20,000 LF of roadside ditches in the southeastern portion of the city, Administration, Engineering, & Surveying services. and Administration, Engineering, & Surveying services	2018-2020	Mandatory
Obtain funding to re-grade approximately 52,600 LF of existing roadside ditches in the northern portion of the city, and Administration, Engineering, & Surveying services.	2020-2022	Mandatory
Continue to obtain funding to re-grade approximately 41,700 LF of existing roadside ditches in the northern portion of the city and replace undersized and/or damaged culverts in selected portions of the City. Project will include culvert replacements, SET's at both ends of culvert replacements, re-grading of existing roadside ditches, pavement and driveway repair, and Administration, Engineering, & Surveying services.	2023-2025	Mandatory

Obtain funding to implement the recommendations of the Area B Drainage Study to restore and improve storm water conveyance and construct regional detention facilities, as appropriate. Project will include culvert and storm water clearance and replacements, SET's at both ends of culvert replacements, re-grading of existing roadside ditches, new channel and roadside ditches where appropriate, detention pond improvements where appropriate, pavement and driveway repair, and Administration, Engineering, & Surveying services.	2025-2028	Mandatory

Streets Projects	Year	Need
Repair 57,135 Linear Feet (LF) of streets primarily in Wharton's west end, with Phase 1 improvements for water or wastewater; and/or routes that direct traffic to highly traveled destinations, including schools, parks, commercial areas, and major thoroughfares. The repair operations should include an overlay process for the sections of paved streets that can be salvaged. Cost estimates assume paving of unpaved roads and reclaim/reconstruct for concrete roads in poor condition to be replaced with asphalt.	2018-2021	Necessary
Repair 88,600 Linear Feet (LF) of street primarily in north Wharton; with Phase 2 improvements for water or wastewater; and/or routes that direct traffic to highly traveled destinations, including schools, parks, commercial areas, and major thoroughfares. The repair operations should include an overlay process for the sections of paved streets that can be salvaged. Cost estimates assume paving of unpaved roads and reclaim/reconstruct for concrete roads in poor condition to be replaced with asphalt.	2022-2024	Necessary
Repair 84,457 Linear Feet (LF) of street primarily in west and central Wharton; with Phase 3 improvements for water or wastewater; and/or routes that direct traffic to highly traveled destinations, including schools, parks, commercial areas, and major thoroughfares. The repair operations should include an overlay process for the sections of paved streets that can be salvaged. Cost estimates assume paving of unpaved roads and reclaim/reconstruct for concrete roads in poor condition to be replaced with asphalt.	2025-2026	Necessary

Repair 64,300 Linear Feet (LF) of street primarily in central Wharton; with Phase 4 improvements for water or wastewater; and/or routes that direct traffic to highly traveled destinations, including schools, parks, commercial areas, and major thoroughfares. The repair operations should include an overlay process for the sections of paved streets that can be salvaged. Cost estimates assume paving of unpaved roads and reclaim/reconstruct for concrete roads in poor condition to be replaced with asphalt.	2027-2028	Necessary

Thoroughfares	Year	Need
Install missing stop signs as intersections of: Grove & Milam/SH 60; 3rd & Olive; Jackson & Lees; and Jackson Quarters & CR 166.	2018-2021	Desirable
Construct sidewalks along Fulton, Ahldag, and Pioneer to complete connections between Santa Fe Trail, Wharton Junior High, Wharton Civic Center, Boys and Girls Club, Wharton High School, and Wharton County Junior College.	2022-2028	Desirable
Construct bike lane from Santa Fe Trail to Riverfront Park.	2025-2028	Desirable
Complete sidewalk network throughout Central Business District	2018-2028	Desirable
Repave existing deteriorated sidewalks and continue ADA improvements.	2018-2028	Desirable

Parks & Recreation Projects	Year	Need
Construct improvements to Harris Park, including at least three (3) general use/soccer fields, one (1) light activity area, picnic tables with BBQ grills, and park benches as appropriate.	2020-2022	Desirable
Extend Santa Fe Trail through Mayfair Park and/or elsewhere as specified in the Wharton sidewalk/trails network master plan.	2025-2027	Desirable

Construct improvements to Mayfair Park according to facility needs in updated Parks Master Plan.	2025-2027	Desirable
Central Business District	**Year**	**Need**
Improve Riverfront Park, including removal of invasive plants and tree planting.	2018-2028	Desirable
Purchase and remove single-family home and build pedestrian mall connecting Monterrey Square and Riverfront Park.	2018-2028	Desirable
Complete sidewalk network throughout Central Business District.	2018-2028	Desirable
Build bike lane from Santa Fe Trail to Riverfront Park.	2025-2028	Desirable

13.5 Five-Year Capital Improvements Program Schedule

The following table delineates the proposed capital improvements for the 2018-2022 planning period, the estimated costs, sources of funds, and timing of the projects. The projects are listed in order of priority. Projects that fall after 2022 are listed in detail in the appropriate chapters.

Costs for projects are estimates based on recent representative bids for similar items. Unit costs may vary within a given time period for a variety of reasons including but not limited to:

1. Economies of scale – A project with large quantities of a particular item will have a lower unit cost than a project with small quantities;
2. Relative location of the project with respect to the bidding contractor's location – Contractors having to mobilize labor, equipment, & materials from a long distance will bid a higher unit cost than contractors in the local area;
3. The general state of the economy – Contractors & Suppliers bid lower when work is scarce than when work is plentiful;
4. Energy prices – PVC, steel, iron, and fuel costs rise and fall with the global price of oil.

Table 13K: Capital Improvements Program Schedule: Fiscal Year 2018-2022

Type	Scheduled Capital Improvement Projects	Year	2018	2019	2020	2021	2022	Priority	Cost	Source of Funds
W	A new 2,000 GPM well; 500,000-gallon ground storage tank; and pump station to provide a future potable water source. Project will include a new vertical turbine pump and motor, up to 800' of well casing, required screening, storage tank, pump station building, disinfection unit, motor and pump controls and associated electrical service, yard piping, alarms, and security fencing. The Project will also include administration, Engineering & Survey services	2018-2020						M	$3,800,000	USDA; CDBG; GEN (General Obligation Bond); TWDB loan; City Utility Fund (Rev Bond)
WW	Obtain funding to replace all air lines at the WWTP #1 and Convert WWTP #1 to a true activated sludge process. Projects will include administrative, engineering, and survey services.	2018-2020						M	$ 1,050,000	TWDB; CDBG; USDA;; WW Utility
D	Obtain funding for two drainage studies of the southwest and north and central areas of town to evaluate existing conditions and capacity of existing underground storm sewers and ditches in Study Area B and identify and recommend opportunities for detention and restoring drainage paths to the existing ditches and creeks draining the downtown area. Project will also include re-grading of approximately 20,000 LF of roadside ditches in the southeastern portion of the city, Administration, Engineering, & Surveying services.	2018-2020						M	$ 347,000	GEN; CDBG; TWDB; USDA; FMA; CDBG-DR
S	Repair 57,135 Linear Feet (LF) of streets primarily in Wharton's west end, with Phase 1 improvements for water or wastewater; and/or routes that direct	2018-2021						N	$ 581,792	GEN

	traffic to highly traveled destinations, including schools, parks, commercial areas, and major thoroughfares. The repair operations should include an overlay process for the sections of paved streets that can be salvaged. Cost estimates assume paving of unpaved roads and reclaim/reconstruct for concrete roads in poor condition to be replaced with asphalt.									
T	Install missing stop signs as intersections of: Grove & Milam/SH 60; 3rd & Olive; Jackson & Lees; and Jackson Quarters & CR 166.	2018-2021						D	$ 2,000	GEN
R	Construct improvements to Harris Park, including at least three (3) general use/soccer fields, one (1) light activity area, picnic tables with BBQ grills, and park benches as appropriate.	2020-2022						D	$75,000 (or 50% match of TPWD grant funds fund)	GEN; EDC; TPWD (Total grant and match not to exceed $150,000)
W	Obtain funding to replace approximately 4,550 LF of existing 2" water lines with 6" PVC WL along Dahlgren, Belle, and Abel St. The project will also include replacement of 2" WL and line extension along Wayside, with approximately 3,500 LF of 12" PVC WL to loop with the existing lines. The project will also include, approximately eight (8) fire hydrants at appropriate locations, service re-connects, valves, street, pavement, and driveway repair, administration, and Engineering & Survey services.	2020-2023						M	$ 392,400	CDBG; GEN (General Obligation Bond); USDA; TWDB loan; City Utility Fund (Rev Bond)
WW	Obtain funding to rehabilitate the clarifier at WWTP#1 and add an Anoxic basin to WWTP #1. Projects will include administrative, engineering, and survey services.	2020-2023						M	$ 600,000	TWDB; CDBG; USDA; WW Utility

D	Obtain funding to re-grade approximately 52,600 LF of existing roadside ditches in the northern portion of the city, and Administration, Engineering, & Surveying services	2020-2022						M	$ 320,626	GEN; CDBG; TWDB; USDA; FMA; CDBG-DR
S	Repair 88,600 Linear Feet (LF) of street primarily in north Wharton; with Phase 2 improvements for water or wastewater, and/or routes that direct traffic to highly traveled destinations, including schools, parks, commercial areas, and major thoroughfares. The repair operations should include an overlay process for the sections of paved streets that can be salvaged. Cost estimates assume paving of unpaved roads and reclaim/reconstruct for concrete roads in poor condition to be replaced with asphalt.	2022-2024						N	$ 592,251	GEN
T	Construct sidewalks along Fulton, Ahldag, and Pioneer to complete connections between Santa Fe Trail, Wharton Junior High, Wharton Civic Center, Boys and Girls Club, Wharton High School, and Wharton County Junior	2022-2028						D	$ 375,350	GEN; SRTS; TxDOT
CBD	Improve Riverfront Park, including removal of invasive plants and tree planting.	2018-2028						D	$ 200,000	GEN; EDC; TPWD
CBD	Purchase and remove single-family home and build pedestrian mall connecting Monterrey Square and Riverfront Park.	2018-2028						D	Variable	GEN; EDC; Local
CBD/T	Complete sidewalk network throughout Central Business District.	2018-2028						D	$ 333,000	GEN; EDC; TxDOT

GEN = Municipal funds and General Obligation Bonds; **CDBG** = Texas Community Development Block Grant Program, administered through the Texas Department of Agriculture (TDA); **CDBG-CD =** Community Development Block Grant Disaster Recovery program; **EDA** = US Economic Development Administration grant program; **EDC** = Wharton Economic Development Corporation; **FHWA**=Federal Highway Administration; **FMA**=Flood Mitigation Assistance program through the TWDB for NFIP members only; **Local** = donations of time/money/goods from private citizens, developers (as required by subdivision ordinance), charitable organizations, and local businesses; **SRTS** = Safe Routes to School; **TxDOT** = Texas Department of Transportation; **TWDB** = Texas Water Development Board grants and loans; **USDA =** US Department of Agriculture Rural Development Water and Wastewater Infrastructure loans and grants; **UTILITY** = City utility fund/revenue

14 Funding Sources

Funding for projects in small, low-income, rural cities is one of the biggest challenges that city staff, residents, and volunteers face when trying to improve their communities. Not only are grants scarce and competitive, but they require time, sophistication, and patience to write and administer. Nevertheless, they are often the only resource available to reach desired goals.

Funding sources have been identified throughout this comprehensive plan that can help accomplish specific activities. This section of the plan lists detailed information on many of the most common, effective, and implementable grants available. While every attempt has been made to keep the information up to date, funding availability and rules change frequently. After identifying desired grants or loans, it is always essential to call the organization directly to confirm details such as: deadlines, whether the proposed project will be eligible, and probability of funding (i.e. how competitive the grant is).

If a specific project is desired that does not fit one of the funding options below, it is worth checking the home page of each agency for additional programs, contacting the agencies for information, and using the internet to search for additional programs. Although most grants come with specific requirements, most funding agencies are also able to offer technical assistance to help communities find the resources they need to fulfill those requirements. The Foundation Center (http://foundationcenter.org/) is a good starting point for online grant searches.

Because of the complexity of identifying, writing, and managing grants, community partners are often the key to successful grant programs. Those frequently include:

- Co-applicants (most typically with other counties or municipalities) where projects or services meet the needs of several jurisdictions
- Sponsored providers of services that benefit residents, which are often provided by nonprofit organizations (VFDs, EMS, youth programs like Boys & Girls Club) or hospital districts, water (MUD/SUDIWCID), drainage, groundwater districts.
- Sources of matching funds (EDC, municipalities, local park foundation or youth sports league, Optimists, Kiwanis or Rotary)
- Sources of information or expertise (local community college or state university, local NRCS office, regionally COG, or internally from the public works director, police chief, etc.)

The following State agencies provide a wide range of grants and technical assistance.

Agency Name	Website
Texas Department of Agriculture	http://texasagriculture.gov/
Texas Water Development Board	www.twdb.state.tx.us/
Texas Commission on Environmental Quality	www.tceq.state.tx.us/
Texas Department of Transportation (Safe Routes to School)	www.dot.state.tx.us/safety/safe_routes/default.htm
Texas Historical Commission	www.thc.state.tx.us/
Texas Department of Public Safety Division of Emergency Management	www.txdps.state.tx.us/dem/
Texas Forest Service (Rural VFD assistance)	http://txforestservice.tamu.edu
Texas Task Force on Indigent Defense	www.txcourts.gov/tidc/tidchome.asp
Texas Parks and Wildlife Department	www.tpwd.state.tx.us/
Texas Department of Housing & Community Affairs	www.tdhca.state.tx.us/
Texas General Land Office (Coastal Programs)	www.glo.texas.gov/what-we-do/caring-for-the-coast/index.html
Texas Governor's Office Criminal Justice Division	http://governor.state.tx.us/cjd/
Texas Governor's Office Economic Development Bank	http://governor.state.tx.us/
Texas Office of the Attorney General (Crime victim services)	www.oag.state.tx.us/victims/victims.shtml
Texas Department of State Health Services (Indigent Health Care)	www.dshs.state.tx.us/cihcp/default.shtm
Texas State Library	www.tsl.state.tx.us/
Texas Comptroller of Public Accounts (SECO)	http://seco.cpa.state.tx.us/

Detailed Grant Tables by Project Type

Economic Development						
Project Type	**Deadline**	**Organization**	**Program Name**	**Program Description**	**Grant/Loan Amount**	**Local Contribution**
Industry - Infrastructure	Monthly	Texas Department of Agriculture (TDA) www.texasagriculture.gov	Texas Capital Fund (TCF) – Infrastructure / Real Estate Programs	For economic development projects that create new jobs for low-to-moderate income persons (new or expanding businesses). Public infrastructure improvements can include: water & sewer facilities/lines, road/street construction/improvements, natural gas line construction/improvements, electric, telephone, & fiber optic line construction/improvements, harbor/channel dredging, purchase of real estate related to public infrastructure improvements, traffic signals and signs, drainage improvements, and railroad spurs. OR Funds must be used for real estate development to assist a business that commits to create and/or retain permanent jobs, primarily for low and moderate-income persons. The real estate and/or improvements must be owned by the community and leased to the business.	$100,000 to $1,500,000, based on the number of jobs the business will create or retain. Locality can request up to $25,000 per job business will create and $10,000 per job business will retain.	Requirements for minimum amount of leveraged funds (match and fixed assets) varies by project.
CBD - Infrastructure	Annually in early October	TDA	TCF – Downtown Revitalization Program	Funds can be used for public infrastructure improvements such as parking, sidewalks, lighting, utility upgrades in designated "historic commercial district." Engineering costs are not eligible.	$50,000 to $250,000	Cash or in-kind. 10% minimum required, but points awarded for 20% or 30%. Example: on a $150,000 grant, $15,000 is required, but points awarded for $30,000 or $45,000
CBD - Infrastructure	Annually in early October	TDA	TCF – Grants for Main Street Communities	Funds can be used for public infrastructure improvements such as parking, sidewalks, lighting, utility upgrades in the designated "historic commercial district" of participating Main Street communities. Engineering costs are not eligible to be paid with TCF-DRP funds so those costs must be paid for with local funds.	$50,000 to $250,000	Cash or in-kind. 10% minimum required, but points awarded for 20% or 30%. Example: on a $150,000 grant, $15,000 is required, but points awarded for $30,000 or $45,000
Planning	Every	TDA	CDBG - Planning	Funds can be used to map housing, land use, streets, drainage,	Varies by size, but	Match based on

	other year. Due in summer of 2026 for 2027-2028		and Capacity Building Fund	public utilities; determine needs to ensure adequate utilities; determine future growth patterns (10-year growth period); & establishes a capital improvement plan.	maximum grant is $55,000.	population: 0 – 1,500 persons = 5%; 1,501 – 3,000 = 10%; 3,001 – 5,000 = 15%; > 5,000 = 20%
Retail - Infrastructure	Project dependent	Texas Historical Commission (THC) www.thc.state.tx.us/	Federal Historic Preservation Tax Incentives	Available for rehabilitation of income-producing buildings. Building must be listed in the National Register of Historic Places before project completion. Tax credit application must be made before project completion. Project examples include substantial: structural work, building repairs, electrical, plumbing, heating and air conditioning, roof work and painting	Up to 20% of eligible rehabilitation costs	Private funding of at least 80% of project costs
Retail - Marketing, Preservation	Annually in early November	THC	Certified Local Government Grants	Available to Certified Local Governments (certified cities or counties, or certified counties on behalf of non-certified cities). Project examples include: surveys, oral histories, preservation planning, educational activities, ordinance review, and rehabilitation projects.	$2,000 to $30,000	1-to-1 match required. Match can be cash or in-kind and excludes federal grants except for CDBG.
Retail - Marketing, Preservation	Annually in late July	THC	Main Street	Technical assistance program for revitalization of historic downtown areas. Focus is on: organization, marketing, design, and economic development. Successful implementation requires local human resource capacity and community participation. Assistance includes training in economic development and marketing for local managers and retailers, on-site evaluation and recommendations, design assistance, and participation in the First Lady's Tour	No cash. Participation qualifies community to apply for TCF Main Street grants	City must hire a full-time coordinator and fund the program for 3years
Industry - Infrastructure	March 1, June 1, Sept 1, Dec 1	Office of the Governor http://governor.state.tx.us / http://texaswideopenforbusiness.com	Texas Enterprise Zone	State sales and use tax refunds capital costs to businesses that invest in and employ residents of qualified economically disadvantaged areas. Each business must be nominated by a local community. Maps of designated Enterprise Zones, based on Census data, are located at the state's mapping website of http://www.texassitesearch.com/	$25,000 to $3.75M refund for capital improvement investment from $40,000 to $250M	The local community must offer tax or permitting incentives to the nominated business.
Industry - Infrastructure	Monthly	U.S. Department of Agriculture (USDA) www.usda.gov	Rural Economic Development Loan and Grant (REDLG)	REDLG program finances utility-managed loans and revolving loan funds. Under the loan program, the managing utility makes zero interest loans to local businesses. Under the grant program, the utility creates a revolving loan fund that makes loans to local businesses. Qualifying projects include: business incubators, telecom. facilities for distance learning, etc.	N/A	N/A

Industry - Infrastructure, Education	Varies	USDA	Rural Business Enterprise Grant (RBEG)	Grants available to small cities and non-profits for activities that will benefit small and emerging private businesses. Examples include: land acquisition, plant renovations/ modernizations; construction of access roads to businesses; parking areas, utilities; distance learning/adult education; and revolving loan fund capitalization	No maximum, but typical award is $10,000 to $500,000	N/A
Industry & Retail - Education, Planning	Varies	USDA	Rural Business Opportunity Grants (RBOG)	Technical assistance grants available to rural towns, non-profits, and cooperatives. Typical projects include development of: trade strategies, economic plans, business training, business incubators, and leadership training programs	$100,000 maximum for projects within one state	N/A
Industry - Infrastructure	Varies	USDA	Business and Industry Guaranteed Loans	Loans to an organization or an individual for: office/plant modernization or enlargement; employee retention/expansion; land or equipment lease/acquisition. Emphasis on employee expansion, renewable energy, and water conservation/aquaculture	60%-80% loan guarantee, terms negotiated with the agency	Collateral required to secure loan
Industry & Retail - Infrastructure	Varies	Texas State Comptroller www.comptroller.texas.gov	4A/4B Sales Tax	Locally implemented program that allows municipalities to create economic development corporations that manage projects funded by local sales tax. The program is established by vote at the local level. Type A corporations fund industry projects that have specific job creation requirements, while Type B corporations can also fund a broader range of community improvement projects.	Varies	Local management by volunteer board
Retail - Marketing, Preservation	Varies	Comptroller	Hotel/Motel Tax	Available to cities and counties. Maximum tax is 7% of room bill within the city or 15% combined across taxing entities if located in the ETJ. Tax funds must be used on projects that will increase hotel occupancy and can be used for: historic restoration/preservation, visitor centers, arts promotion, city advertising, and similar.	Varies	City staff manages accounting.
Industry - Education	Ongoing	Texas Workforce Commission (TWC) www.texasworkforce.org	Skills Development Fund	The Skills Development Fund pays for workforce training programs created as a partnership between businesses and educational institutions.	$500,000 maximum per business	None

Industry & Retail	Ongoing	Accion Texas http://us.accion.org/your-accion/location/texas	Multiple	Loans to small businesses or individuals for: business expansion and stabilization. In addition to loans, Accion Texas also provides business support services through their business support team as well as a number of online resources for entrepreneurs.	Varies	N/A
Industry & Retail - Infrastructure	Ongoing	Texas Mezzanine Fund, Inc.	Multiple	Loans to small businesses or individuals for: business expansion, equipment, acquisition, and real estate in distressed and low/moderate income communities or that provide jobs for low/moderate income persons. Also provides loans for community facilities that serve the community's social and economic needs.	Up to $300,000 for stand-alone loans; Up to $500,000 for in tandem loans; Up to $750,000 when collateralized by real estate	N/A
Industry & Retail	Ongoing	People Fund	Multiple	Loans to small businesses and nonprofits for: equipment purchases, permanent working capital term loans, revolving lines of credit, and real estate. Also provides business assistance and education programs through workshops and one-to-one mentorship.	Varies	NA
Multiple	None	Meadows Foundation www.mfi.org	Multiple	The Meadows Foundation provides grants and loans statewide for a variety of causes. Ideal projects already have at least 50% of needed funding and the organizational and financial capacity for execution beyond the grant period. The Foundation should be contacted for information about whether a given project fulfills its priorities.	Varies	Local organizational capacity
Library	January 15, June 1	Tocker Foundation http://tocker.org/	Multiple	The Tocker Foundation offers grants that increase library and literacy assistance to underserved populations (rural, handicapped, elderly, youth, non-English speakers, and the illiterate) and provide training for rural librarians.	Varies	Varies

Public Service Infrastructure (water, sewer, streets, drainage, energy, telecommunications)						
Project Type	**Deadline**	**Organization**	**Program Name**	**Program Description**	**Grant/Loan Amount**	**Local Contribution**
Water/ Sewer	First-come first-serve basis per year	Texas Department of Agriculture (TDA) www.texasagriculture.gov	Small Towns Environment Program (STEP)	Funds for water and sewer projects utilizing at least 51% local volunteer labor and in-kind donations to complete project.	Up to $350,000	No match required.
Water/ Sewer	Every other year. Due in summer of 2017 for 2018-2019	TDA	Community Development Block Grant Program (CDBG) - Community Development Fund	Funds can be used for water and/or sewer improvements. Drainage improvements can be constructed if they are incidental to the water or sewer improvements.	Up to $350,000 (varies by region)	Match based on population: 0 – 1,500 persons = 5%; 1,501 – 3,000 = 10%; 3,001 – 5,000 = 15%; > 5,000 = 20%
Energy	Annually in early July	TDA	CDBG - Renewable Energy Demonstration Pilot Program	Assists rural communities with installing renewable energy projects, including wind turbines or solar panels to power wastewater treatment or water treatment facilities.	Up to $500,000	Match of 2% to 25% required, depending on population size. Sliding scale earns points on application. Match can be cash, land, or in-kind.
Drainage	Annually	Texas Water Development Board (TWDB) www.twdb.texas.goc/flood/grant	Flood Mitigation Assistance Program	Funds for planning and project grants to develop or update the flood hazard component of a Multi-Hazard Mitigation Plan (prepared by the COG) and for constructing flood mitigation projects.	Planning grant max: $50,000; Construction: < $3.3 million over a 5-year period.	25% match of which not more than half (12.5%) can be of in-kind services.
Drainage	Annually	TWDB	Flood Protection Planning	Funds for regional/watershed-wide planning to evaluate structural and nonstructural solutions to flooding problems.	Varies	1-to-1-match

Water/ Sewer	Annually	TWDB	Revolving Loan Funds	Below-market interest rate loans for planning, acquisition and construction of **Clean Water** (also for wastewater treatment, storm water and nonpoint source pollution control, and reclamation/reuse projects) and **Drinking Water** (also includes water supply and Source Water protection infrastructure)	Up to 15% of available funds; 70%-100% principal forgiveness for low-income	Varies
Water/ Sewer	Monthly	TWDB	Rural Water Assistants Funds (RWAF)	Below-market interest rate loans for small, rural cities, counties, water districts, and non-profit utilities. Typical projects: water/sewer lines, storage, purchase/lease of water rights.	Varies	Varies
Water/ Sewer	Ongoing	TWDB	Economically Distressed Areas Program (EDAP)	Grants and loans for water/sewer in economically distressed areas for PAD (planning, acquisition, design) and construction.	50%-100% grant for PAD; Grant-to loan calculation for construction varies	Varies
Streets/ Sidewalks	Fall	Texas Department of Transportation (TxDOT) www.txdot.gov	Safe Routes to School	Non-infrastructure funds can be used to create student safety programs and incentives. Infrastructure funds can be used to construct sidewalks, bike lanes, drop-off lanes, etc., or install signage, signalization, etc. Must have a TxDOT approved SRTS Plan in place to apply for infrastructure construction funds.	Infrastructure construction projects: Up to $750,000	No match required, but local injection can earn additional points. Match contribution can be cash, land value, and/or in-kind.
Streets/ Sidewalks	Varies	TxDOT	Statewide Transportation Alternatives Set-Aside Program	Previously the Statewide Transportation Enhancement Program, 2017 program details not available at this time. Contact Teri Kaplan – Tap Program Manager, TxDot-PTN (512) 374-5235 or teri.kaplan@txdot.gov	Fixed amount of TA Set-Aside funds for each project determined by commission.	At least 20%
Streets	Varies	Texas State Comptroller http://www.comptroller.texas.gov	Street Maintenance Sales Tax	Cities can vote to dedicate a percentage of sales tax to street maintenance and repair.	Varies	City staff manages accounting.

Parks and Recreation						
Project Type	**Deadline**	**Organization**	**Program Name**	**Program Description**	**Grant/Loan Amount**	**Local Contribution**
Infrastructure	October 1	Texas Parks & Wildlife (TP&W) www.tpwd.state.tx.us	Small Community	Funds can be used for development or rehab of any public outdoor recreation facilities. City would be required to self-administer the project.	Up to $75,000	1-to-1 match. Can be cash, land, or in-kind.
Infrastructure	October 1	TP&W	Outdoor Recreation	Funds can be used for development or rehab of any public outdoor recreation facilities. Must have master park plan completed prior to application.	Up to $500,000	1-to-1 match. Can be cash, land, or in-kind.
Infrastructure	October 1	TP&W	Indoor Recreation	Funds can be used for development or rehab of any public indoor recreation facilities. Must have master park plan completed prior to application.	Up to $750,000	1-to-1 match. Can be cash, land, or in-kind.
Programming	February 1	TP&W	Community Outdoor Outreach	Funds can be used to purchase supplies and equipment for outdoor programs. No construction allowed.	Up to $50,000.	No match required, but match improves chances of funding.
Infrastructure	February 1	TP&W	Recreational Trails	Funds can be used for new trail development or rehab of existing trails, and trail amenities such as parking areas, restrooms, drinking fountains.	Up to $200,000	20% of total project cost required as local match (can be cash, land, or in-kind).
Infrastructure	October 1	TP&W	State Boating Access	Funds can be used to develop new or renovate public boating access facilities including boat ramps, parking areas, access roads, boater amenities such as restrooms, picnic areas, courtesy docks, etc.	Up to $500,000	25% of total project cost required as local match contribution (can be cash, land value, and/or in-kind).
Infrastructure	February 7	TxDOT & Keep Texas Beautiful	Governor's Community Achievement Awards	Funds can be used for landscaping along public right of way. Location and type of project is decided by the community and TxDOT.	By population: <3,000=$90K; <5,000=$110K; <9,000=$130K	N/A

Infrastructure	Jan. 1, April 1, July 1, Oct. 1	Major League Baseball (mlb.com)	Baseball Tomorrow Fund	Funds can be used for field improvements, equipment purchases, umpire training, but not on-going operational costs. Letter of interest submitted first (due 45 days before deadline). If invited to apply, application submitted by deadline.	No maximum, but typical award is $50,000 to $100,000	No match required, but match improves chances of funding.
Infrastructure	February; Rolling deadline for Safe Place to Play grants	U.S. Soccer Foundation www.ussoccerfoundation.org	Program Grants; Safe Places to Play	Priority focus changes annually, but funds can be used for construction of new fields or enhancement of existing fields with lighting or irrigation, in areas primarily designed to serve low-income communities.	Varies, current award is $30,00 to 90,000	No match required, but match improves chances of funding.
Infrastructure	Jan. 18, June 14	Tony Hawk Foundation www.tonyhawkfoundation.org	Skatepark Grants	Funds can be used for the design, construction or operation of new skateboard parks, primarily to serve low-income communities.	Up to $25,000	If funds requested for construction, match must be provided.
Infrastructure/ Programming	Sept. 30, Jan. 31st	Captain Planet Foundation http://captainplanetfoundation.org/	CPF Grants	Funds can be used for community gardens, native plant gardens, learning trails, cleaning up local parks, maintaining/restoring environmentally sensitive areas such as forests and prairies, wetlands, rivers, streams. Preferential consideration is given to projects seeking seed funding of $500 or less or projects that have at least a 50% match or in-kind contribution in funding.	Up to $2,500	No match of in-kind funding required, but match improves chances of funding.
Infrastructure	Sept. 28, February 9	Lowes www.toolboxforeducation.com	Toolbox for Education Grants	Funds can be used for a variety of projects including reading gardens, vegetable gardens, fitness areas, school landscaping projects, nature trails, and playgrounds. Applicants are limited to K-12 schools or parent-teacher organizations.	$2,000 to $5,000	No match required.
Infrastructure/ Programming	Ongoing	National Gardening Association http://grants.kidsgardening.org/	The Garden Registry	The program connects communities with various grant programs available through the National Gardening Association depending on the community's need.	Varies	No match required.

Infrastructure	New deadlines to be published in Jan. 2017	Fiskars http://www2.fiskars.com/Community/Project-Orange-Thumb	Project Orange Thumb	The program awards grant recipients a combination of financial funding and Fiskar tools to build or make over community gardens.	$3,500	No match required.

Housing						
Project Type	**Deadline**	**Organization**	**Program Name**	**Program Description**	**Grant/Loan Amount**	**Local Contribution**
Construction	Ongoing	Texas Department of Housing and Community Affairs (TDHCA) www.tdhca.state.tx.us	HOME	Funds can be used for rehabilitation or demolition and reconstruction of up to six substandard homes. Rehabilitation is not permitted for manufactured homes.	$85,000 per home constructed	Match required, 1% to 12.5% on total project amount, depending on population size. Plus $12,000 in cash leverage. Match can be in-kind or cash.
Construction	Ongoing	TDHCA	Multifamily (Rental Housing) Development	Available to local governments, public housing authorities, non-profit, and for-profit organizations for funding multifamily rehabilitation and new construction projects	Subsidy varies by county and number of bedrooms.	Long-term rent and renter income restrictions
Financial Assistance	Ongoing	TDHCA	Tenant Based Rental Assistance (TBRA); TBRA for Persons with Disabilities and Veterans	Assists renters, including veterans and persons with disabilities, with utility and security deposits for up to 24 months. Available to local governments, public housing authorities, and non-profits	Varies	Varies

Financial Assistance	Ongoing	TDHCA	Texas HOME buyer Assistance Programs	Available to local governments, public housing authorities, and non-profits to provide down payment and closing cost assistance to individuals who have not owned a home in three years or who are first-time home buyers. Also includes funding for single-family housing accessibility modifications.	Varies	Varies
Construction	Ongoing until fund emptied	TDHCA	Amy Young Barrier Removal Program	Available to local governments, public housing authorities, and non-profits to construct home accessibility projects for disabled residents (tenants and owners)	Up to $20,000	N/A
Construction	Ongoing	U.S. Department of Agriculture (USDA) www.usda.gov	Rural Housing Repair and Rehabilitation grants and loans	Available to very low-income residents. Grants available to those over 62 years of age to remove health and safety hazards. Loans available for hazard removal, home repair, improvement, and modernization.	Loan maximum: $20,000; Grant maximum: $7,500	N/A
Financial Assistance	Ongoing	USDA	Guaranteed Housing Loans	Available to any State housing agency or approved lender for loans to those making no more than 115% of the area median income who lack adequate housing.	Varies	Loan recipient must be able to pay mortgage, tax, and insurance
Construction	Ongoing	U.S. Department of Energy through local Council of Government or Action Agency	Weatherization Assistance	Low income families can apply for assistance to make home improvements that will improve energy efficiency and reduce energy bills.	Varies	Varies
Programming	Ongoing	Aging in Place Initiative www.aginginplaceinitiative.org	JumpStart	Grants have been used to create programs that assist seniors with home maintenance and lawn care, provide paratransit services, and create “return visit” programs where nurses/social workers visit regularly to identify possible issues that may impair the individual’s ability to remain in their home	Varies	Varies
Construction	Ongoing	Texas Ramp Project www.texasramps.org	Texas Ramp Project	The mission of this organization is to build accessibility ramps. The organization accepts referrals from social service agencies and establishes regional capacity for ramp building.	Ramp building	N/A

Programming	Ongoing	Legal Aid www.lonestarlegal.org	Legal Aid	Legal aid organizations provide civil legal representation and advice at little or no cost to low income individuals who cannot afford a lawyer. Assistance focuses on basic needs, self-sufficiency, children and families, elderly and disability, and housing and homelessness prevention.	Varies	Varies
Programming	Ongoing	Leader Dog for the Blind www.leaderdog.org	Guide Dogs	Applicants must be 16 years or older and in good mental and physical health. They complete a 26-day residential training program in Rochester Hills, Michigan. Room, board, training, and transportation costs for clients traveling within the U.S. are free of charge. The organization also offers mobility and GPS programs to professionals and clients.	N/A	N/A

15 SUBDIVISION ORDINANCE

15.1 Introduction & Intent

The subdivision of land is a major factor in the process of achieving sound community development which ultimately becomes a public responsibility, since streets and utilities must be maintained and public services customary to urban areas must be provided. Without a subdivision ordinance, a city has little recourse to prevent installation of substandard infrastructure beyond denial of water and sewer connections or rejection of roads for city maintenance. When a city refuses to allow infrastructure connections or to accept dedication of street rights-of-way, it can wind up in expensive legal battles with developers.

More importantly, the built environment can enhance or diminish the overall quality of life in the community. Land subdivision is a critical first step in defining the built environment. Therefore, it is to the interest of the public, the developer, and the future owners that subdivisions be conceived, designed and developed in accordance with appropriate design standards and development specifications.

Discussion of how land subdivision standards affect various aspects of community development are located in multiple chapters of the comprehensive plan:

- *Chapter 4: Land Use* – design principals, standards for streets, water, sewer, and drainage components for new development
- *Chapter 7: Drainage Study* – floodplain development
- *Chapter 8: Street Study* – street standards and layout for new developments

The City of Wharton has enacted subdivision controls within its incorporated limits and within its approximately five-mile extraterritorial jurisdiction (ETJ). The City of Wharton previously received suggested amendments to its existing subdivision ordinance from the engineering firm Jones and Carter. The subdivision ordinance included as part of this comprehensive plan expands on the previously submitted amendments to further promote new development that meets high standards for subdivision design and complements existing development in Wharton.

The provided subdivision ordinance is suitable for consideration and adoption by the Wharton City Council. This ordinance should be considered and adopted if and when the City Council determines that updating its existing subdivision controls is necessary to the City's continued orderly development.

15.2 Purpose

It is the intent of these regulations to aid in guiding the growth of the city of Wharton, Texas and its environs in an orderly manner; and to provide attractive, well planned subdivisions with adequate streets, utilities, and building sites in a manner that will be uniformly applied. The goals and objectives guiding the City in the preparation and adoption of its standards for subdivision of land are:

- Assist orderly, efficient and coordinated development of land within the City's jurisdiction
- Provide neighborhood conservation and prevent the development of slums and blight.
- Harmoniously relate the development of the various tracts of land to the existing community and facilitate the future development of adjoining tracts.
- Provide that the cost of improvements to minimum standards which primarily benefit the tract of land being developed be borne by the owners or developers of the tract, and that the cost of improvements to minimum standards which primarily benefit the whole community be borne by the whole community.
- Provide the most appropriate design for each tract being subdivided.
- Provide an attractive relationship between the land as developed and the circulation of traffic throughout the municipality, having particular regard to the avoidance of congestion in the streets and highways, and the pedestrian traffic movements appropriate to the proposed development, and to provide for the proper location and width of streets and building lines.
- Prevent pollution of the air, streams and ponds; to assure the adequacy of drainage facilities; to safeguard both surface and groundwater supplies; and to encourage the wise use and management of natural resources throughout the municipality in order to preserve the integrity, stability, and beauty of the community and the value of the land.
- As appropriate, reconcile any differences of interest among the developer, other property owners and the City.
- Establish adequate and accurate records of land subdivision.

- Ensure that public or private facilities are available and will have a sufficient capacity to serve proposed subdivisions and developments within the City's jurisdiction.
- Standardize the procedure and requirements for developing property and submitting plans for review and approval.
- Protect and provide for the public health, safety, morals, and general welfare of the community.
- Provide a healthy environment for the present and future citizens; and environment designed to reasonably secure safety from fire, flood and other damages; and to provide that land will be subdivided in a manner to attain such goals and benefits for the community.
- Protect the character and the social and economic stability of all parts of the community and encourage the orderly and beneficial development of all parts of the community.
- Protect and conserve the value of land throughout the community and the value of the buildings and improvements upon the land.
- Guide public and private policy and action in providing adequate and efficient transportation systems, water and wastewater systems, public utilities, and other public amenities and facilities.
- Encourage the development of stable, prospering economic environment.

15.3 Adoption

During consideration and prior to adoption of the revised ordinance, the City Council should seek counsel and advice from the City's attorney regarding the legal aspects and implications of subdivision controls. The City's regulation of subdivision is directed by the Texas Local Government Code, Title 7, Chapter 212. At least one public hearing is required prior to initial adoption of a subdivision ordinance.

During consideration and prior to adoption, the City Council should consider the following:

- Attorney advice regarding implications of subdivision controls.
- Fees needed to recover costs related to plat review and public improvement construction and acceptance by the City.
- The City should consider adoption of a Public Works Construction Manual, either written especially for the City or adopted from a neighboring municipality or County, to govern construction of public improvements.