

**CITY OF**  
**LEONARD**

**VOLUME I**  
**2005-2025**

**COMMUNITY DEVELOPMENT PLAN**  
**POPULATION**  
**HOUSING**  
**LAND USE**  
**PARKS**  
**STREETS**  
**THOROUGHFARES**

**SOUTHWEST CONSULTANTS**  
**P.O. BOX 830634**  
**RICHARDSON, TEXAS**  
**AND**  
**MAURICE SCHWANKE & COMPANY**  
**1209 SOUTHWOOD BLVD.**  
**ARLINGTON, TEXAS**

## **DISCLAIMER**

The Office of Rural Community Affairs in conjunction with the United States Department of Housing and Urban Development furnished financial support to the activity described in this publication which does not necessarily indicate the concurrence of the Office of Rural Community Affairs or of the United States Department of Housing and Urban Development with the statements or conclusions contained in this publication.

## **FINANCED THROUGH THE OFFICE OF RURAL COMMUNITY AFFAIRS**

The preparation of this document was financed through provisions of a Texas Community Development Program Grant from the U.S. Department of Housing and Urban Development.

# PURPOSE

Each Texas town has a unique form and character that are shaped by the response of its community leadership to a localized set of social, physical, and economic attributes. As the City of Leonard ages, each of these, character-shaping attributes will undergo varying degrees of change. This Community Development Plan is designed to provide decision-makers a comprehensive framework for responding to such change, and assist them in evaluating alternative future scenarios, responding to market demands, and formulating proposed actions.

Moreover, the Community Development Plan should aid the City in making important future decisions in a manner that supports the best overall, long term interests of Leonard's citizenry. If actively used and regularly updated, this Plan can give elected and appointed officials a useful tool for: (a) considering the future implications of their actions; and (b) efficiently providing a higher level of service to their constituents. Planning is not new to Leonard. A Community Development Plan was prepared in 1996. Significant changes have occurred since previous Plans were prepared and adopted. Also, it should be noted that plans are normally good for only a five to ten year period. The 1996 Planning Effort was prepared by the firm of Southwest Consultants and Maurice Schwanke and Company

# LOCATION

Leonard is a small North Central Texas town (population: 2,122 as of 2005), containing a total land area of approximately 1,530.1 acres, and located roughly 15 miles southwest of Bonham, 20 miles northwest of Greenville, 33 miles southeast of Sherman, and 67 miles northeast of the Central Business District of Dallas. Leonard was developed on flat to gently rolling terrain with scattered trees. Situated in southwest Fannin County the City is at an elevation ranging from approximate 640 to 750 feet above sea level. U.S. Highway 69 traverses the City from north to south and State highway 78 traverses the City from east to west. Bonham is the closest major economic center. The Leonard area climate produces an annual average daily maximum temperature of 75.1 degrees, and an average annual rainfall is 43.99 inches.

Overall, Leonard's location outside the pressures and restrictions of intense urban life, combined with its excellent physical condition, proud heritage, and relative proximity to major highways and local and regional economic centers, makes Leonard a stable Texas community capable of providing a good, small town quality of life and a healthy environment for raising a family.

# INTRODUCTION

A primary intention of this Community Development Plan is to formulate and communicate clear, practical methods for Leonard to use in meeting both the existing and future needs and service demands of its citizenry. The first major step in discerning citizen needs and demands is to understand certain quantitative and qualitative characteristics of the local population. Therefore, analysis of past, current, and future population estimates is a crucial factor in the development of this plan. For example, an increasing population generally signals the need for an increased employment market, an extension of community facilities and utilities, and the allocation of additional acreage to fulfill land use demands; whereas, a stable population mostly requires community planning for maintenance, improvement, and modernization of services and facilities.

For the most part, the amount and general type of potential growth and/or improvement for Leonard is mostly predicated on its population size, composition, and spatial distribution. The population size expresses the overall dimensional requirements of the physical environment, and serves as a basic benchmark by which to estimate and categorize the spatial demands for various land uses. When the element of time is introduced, and future trends in population size are estimated, a rational basis is formed for approximating the timing, sizing, and extent of future public

and private improvements. It is especially important to emphasize that holding capacity projections and facility planning require an understanding of the timing and distribution of future population patterns. In short, projected population demand is the rational basis for sizing infrastructure and estimating the optimal timing of capital expenditures. Suffice it to say, cities cannot properly budget for service delivery without a basic knowledge of its population trends.

## **PAST POPULATION TRENDS**

The existing and past population levels for Leonard are depicted in Table 1. As indicated, between 1940 and 2000 the population growth has been moderate, increasing from 1,331 persons in 1940 to 1,846 persons in 2000. The 2005 estimated population (based on the 2005 housing inventory) is 2,122 persons, which represents a significant increase (15%) since the 2000 total population was determined and reported by the census.

**TABLE 1**  
**LEONARD**

**POPULATION GROWTH**

<u>YEAR</u>	<u>POPULATION</u>
1940	1,331*
1950	1,211*
1960	1,117*
1970	1,423*
1980	1,421*
1990	1,744*
2000	1,846
2005	2,122**

\* SOURCE: U.S. BUREAU OF THE CENSUS

\*\*BASED ON 2005 HOUSING SURVEY INVENTORY CONDUCTED BY SWC & MSC.

The age composition of a population provides a profile, illustrating when and where the greatest need for various types of public expenditures will be required in order to meet citizen demand. The population pyramid arranges all elements of the population

into age groups or cohorts, generally by five-year increments. The population is further divided according to sex.

Figure 1 illustrates the 2000 population pyramid constructed for Leonard. The pyramid indicates that no one age group dominates and that all facets of community facilities will need to be planned for. The median age of the Leonard population is 33.2 years. 51.8 percent of the total population is female, compared to 48.2 percent on the male side of the equation. Since 13.9 percent of Leonard's population is over 64 years of age, 30.2 percent is under 18 years old, and 39.8 percent is 25 to 54 years old, it is evident that the demand for City services must meet the needs of a broad range of age groups, including the young and the elderly.

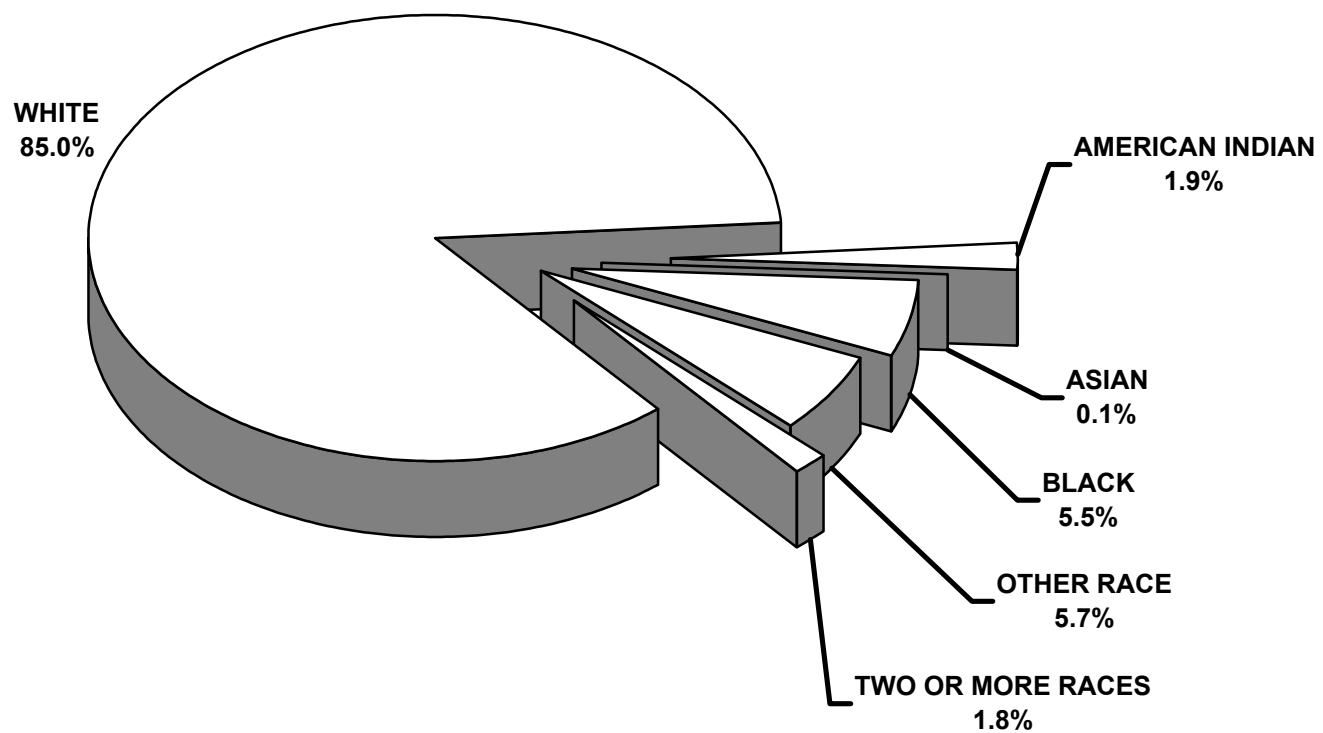
The 2000 population composition is shown in Table 2 and illustrated in Figure 2. As shown, in 2000 Leonard was 85.0 percent White, 5.5 percent black, 7.9 percent Hispanic Origin of any race, 0.2 percent Asian, 1.9 percent American Indians, 5.7 percent other, and 1.8 percent two or more races. Table 2 also indicates that between 1990 and 2000 there were several significant changes in population composition. As shown, the amount of handicapped residents increased by 8.1 percent and female heads of households grew by 8.1 percent. Additionally, the most notable change was the decrease of the white population of 6.1 percent with the



FIGURE 2

# CITY OF LEONARD

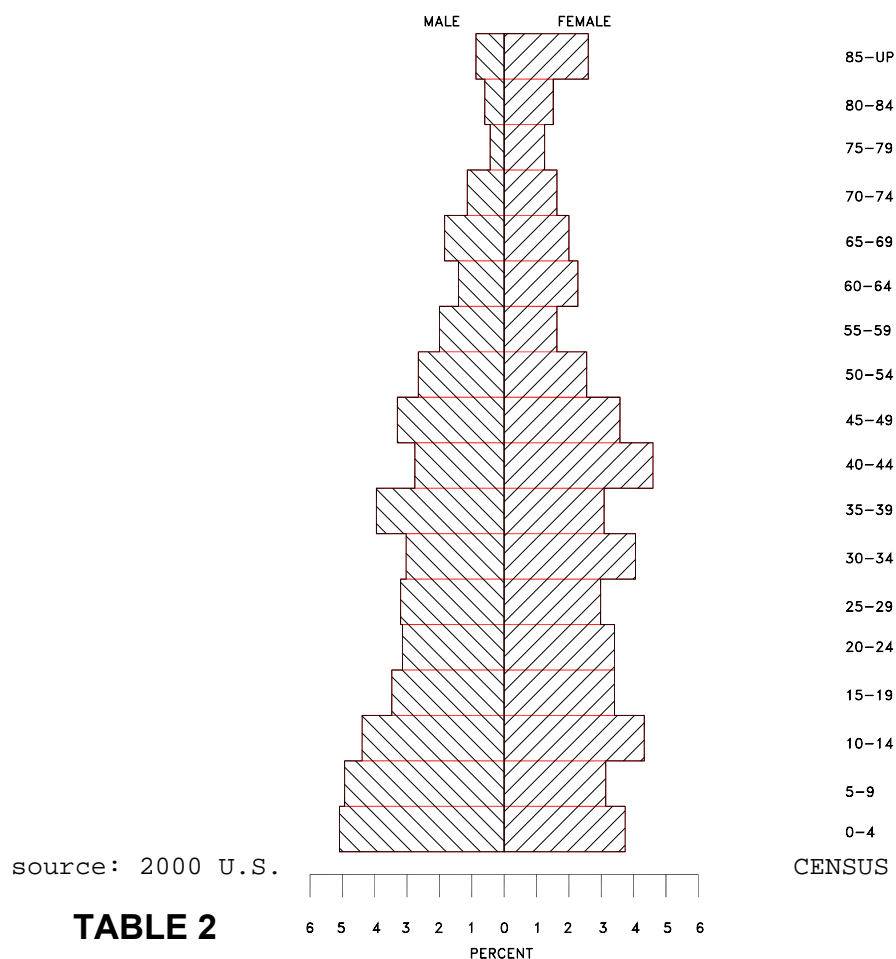
## POPULATION COMPOSITION



SOURCE: 2000 U.S. CENSUS

addition of a new category for the 2000 census which was two or more races which included 1.8 percent. All other changes were 5 percent or less.

FIGURE 1  
LEONARD  
2000 POPULATION PYRAMID



# LEONARD

## 2000 - 1990 POPULATION COMPOSITION\*

<b>CLASSIFICATION</b>	<b>1990</b>	<b>%</b>	<b>2000</b>	<b>%</b>	<b>% CHANGE</b>
White	1,590	91.1%	1,569	85.0%	-6.1%
American India	11	0.6%	35	1.9%	1.3%
Asian or Pacific Islanders	3	0.2%	5	0.2%	0.0%
Black	121	6.9%	102	5.5%	-1.4%
Other Race	19	1.1%	105	5.7%	4.6%
Two or more Races			33	1.8%	-----
Hispanic Origin (of any race)	39	2.2%	145	7.9%	5.9%
Handicapped	116	6.7%	257	13.9%	7.2%
Female Heads of Households	72	4.1%	94	12.2%	8.1%

\*Based on 2000 & 1990 U.S. Census

## POPULATION PROJECTIONS

Population projections provide the most basic planning assumptions required for strategically meeting future public needs. Any change in population trends is affected by birth rates, death rates, and migration. Because an accurate manner of recording this data has not yet been devised, population projections must be based on potential for growth, local and regional trends, and economic conditions. Four significant assumptions specific to Leonard help form the basis from which to project the 2010, 2015, and 2020 populations, and are listed below:

1. Leonard will continue to exist as a viable community.
2. Leonard's commercial/industrial base will increase.
3. Leonard will provide an appropriate level of basic services to its existing and future citizenry, such as water, sewer, and community facilities.
4. The northward growth of Dallas/Fort Worth and associated suburbs, will maintain the rate of migration into Leonard.

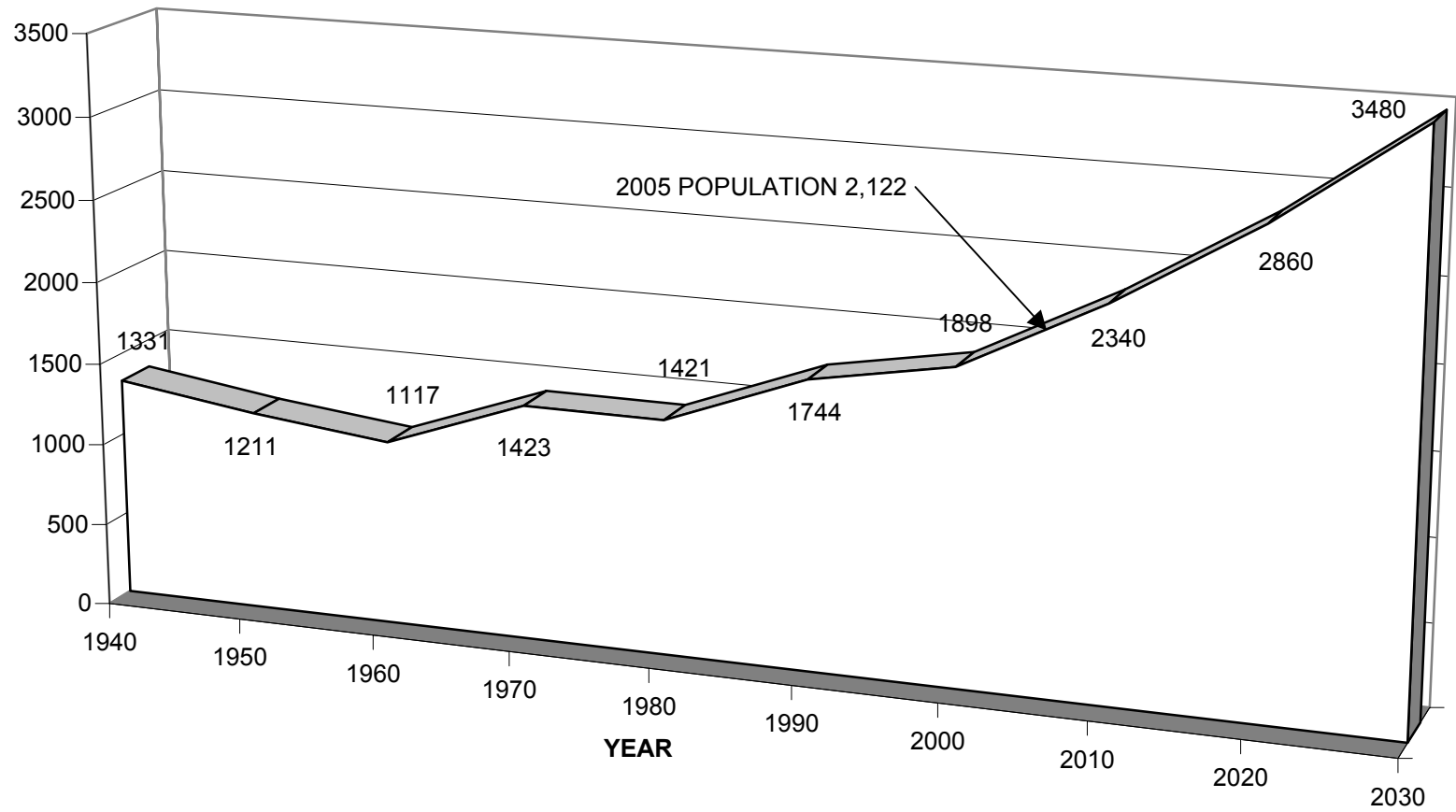
The population projections for Leonard are contained in Table 3 and are graphically illustrated in Figure 3. In addition to the assumptions mentioned earlier, these projections were based on the five general assumptions listed below:

1. There will be no major depression, war, or plague.

FIGURE 3

# CITY OF LEONARD

## POPULATION PROJECTIONS



2. There will be no great discovery of natural resources in the area or a change in producing presently discovered resources in such a way that will significantly affect the economy and natural growth of the community.
3. The fertility rate will remain consistent with the present figures.
4. The age at first marriage will not significantly change relative to the present averages.
5. The form of government, economy, and social organization in the city, county, state, and nation will not change considerably.

Over the 75-year period between 1930 and 2005, the Leonard population increased by 791 people (a 59.4 percent increase). Between 2000 and 2005, Leonard grew by 276 people - the average annual compounded growth rate for the five year period was approximately 2.0%. The 2 percent scenario appears to be what Leonard is currently experiencing. However, that trend may be beginning to accelerate with a higher growth rate expected over the planning period. In developing the population projections for Leonard, past population data and current population trends were utilized (in addition to the assumptions and analysis above) to project anticipated future population levels. Based on this analysis, the future population of Leonard is expected to be 2,340 residents by

2010, 2,590 residents by 2015, 2,860 residents by 2020, and 3,150 residents by 2025.

It should be understood that regardless of population, the principals of good ongoing planning should still be applied. The changing society, migration, and birth control can change immensely in 20 years; however, the projected population, whether reached five years early or 10 years late, will require basically the same number of facilities for the projected number of people. The City should set and strive to achieve goals for both the desired population levels and the facilities necessary to accommodate the resultant population demands.

Population density is important to numerous facets of the planning program - land use projection, utility projections, planning for schools and parks, all require a knowledge of population density. The demand for public facilities is sometimes created by population location, and other times the population may be the result of the presence or availability of public facilities. The Population Distribution Map locates the existing and projected populations. The number of future residences which will locate in specific areas is unknown due to individual preference; therefore, the location of the density shown could change. The total growth of the City will still require a specific amount of land area. The population distribution is shown in Figure 4.

**TABLE 3**  
**LEONARD**

**POPULATION PROJECTIONS**

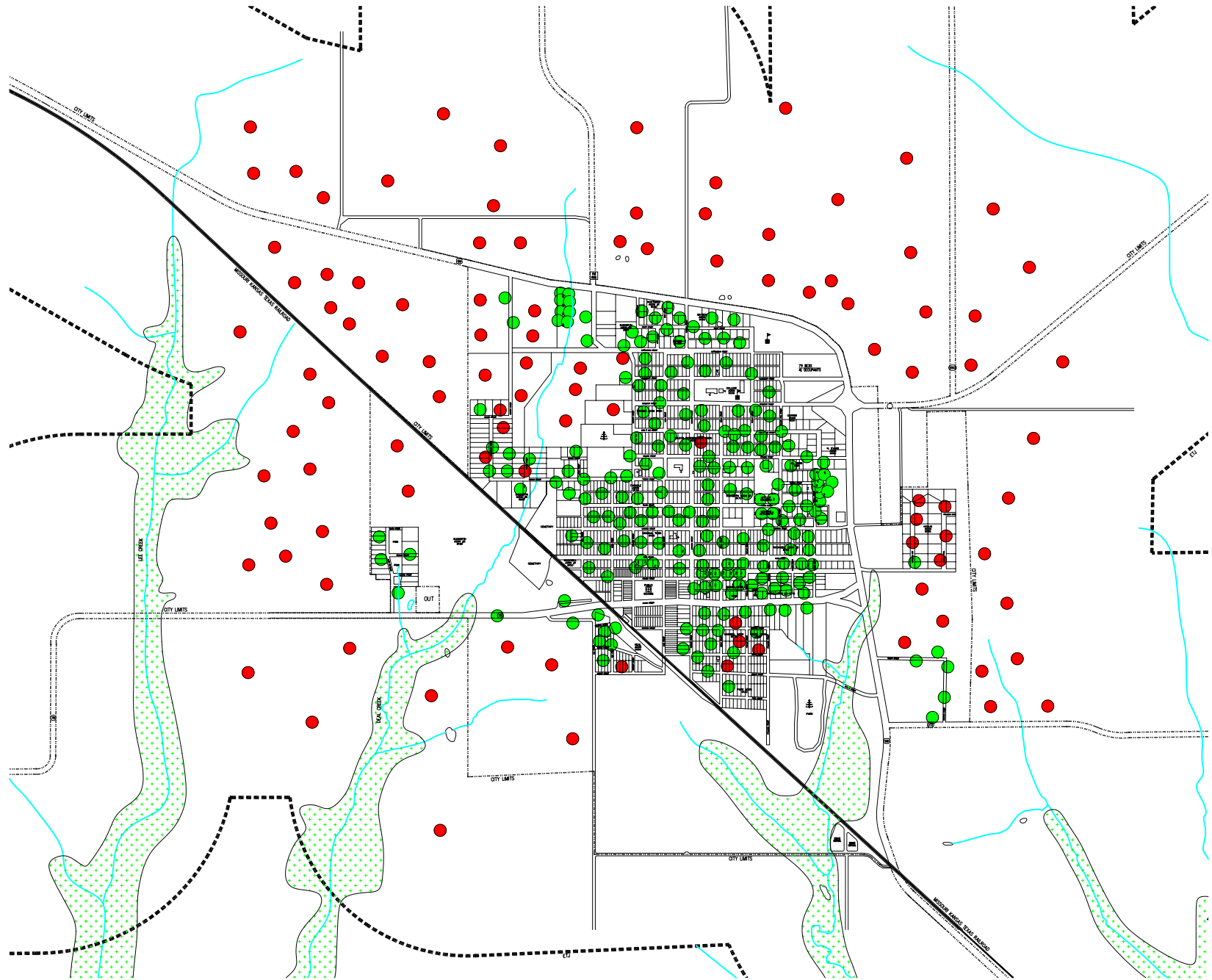
<b>YEAR</b>	<b>POPULATION</b>
2000	1,846*
2005	2,122**
2010	2,340***
2015	2,590***
2020	2,860***
2025	3,150***

\* 2000 U.S. Census

\*\* 2005 Housing Survey by SWC/MSC

\*\*\* SWC/MSC Projections





## CITY OF LEONARD



0 200 400 600  
JULY, 2005

### LEGEND

- CITY PARK
- WATER TOWER
- CITY HALL
- SCHOOL
- FLOOD HAZARD AREA

### POPULATION DISTRIBUTION

- EXISTING 10 PERSONS
- FUTURE 10 PERSONS

FINANCED  
THROUGH THE  
OFFICE OF RURAL COMMUNITY AFFAIRS  
OF THE  
STATE OF TEXAS  
The preparation of this document was financed through  
provisions of a Texas Community Development Program  
Grant from the U.S. Department of Housing and Urban  
Development.

PREPARED THROUGH A JOINT VENTURE OF  
SOUTHWEST CONSULTANTS  
P.O. BOX 60634  
RICHMOND, TEXAS 77460-0634  
AND  
MAURICE SCHWABKE & COMPANY  
2809 SOUTHWOOD BLVD.  
ARLINGTON, TEXAS 76010

# INTRODUCTION

Providing protection from nature's harsh natural elements by the construction of safe, sanitary shelter is essential for meeting one of our most basic and universal human needs. Addressing this fundamental need is a primary duty of every responsible Texas municipality; it is incumbent upon each community to assure that there is equal and sufficient opportunity for all its citizens to acquire and maintain adequate housing.

Since housing is one of the most prevalent of all urban land uses, housing conditions are crucial to every city's economic future. The physical characteristics of a community's housing stock have become a key indicator of the quality of life enjoyed by its citizens. Further, adequate housing supply is basic to most economic development efforts for any given community or region. Based on the foregoing observations, it is quite apparent that the healthy growth and stability of each Texas community depend on universal availability of safe, attractive housing.

In order for a community to evaluate its relative success in assuring universal availability of good housing, it must assess its existing housing stock. The primary reasons for assessing the housing stock as part of a community development planning process can be summarized as follows:

- (1) to address critical issues affecting the safety, value and attractiveness of housing;
- (2) to determine the availability of units in the housing inventory for purchase and rent by families of lower economic income levels;
- (3) to analyze housing conditions in order to determine whether it is necessary to prepare housing programs and activities for the purpose of upgrading or stabilizing existing housing and neighborhoods within the subject community; and
- (4) to determine the extent of housing inventory within the community which is available for rent or purchase by families migrating into the City, or by local families with changing housing desires or needs.

## **EXISTING HOUSING CONDITIONS**

In order to form a basis for planning activities which provide for adequate housing in the City of Leonard, it is necessary to determine the condition of the existing housing

stock. To compile this information, an exterior survey of the condition of housing structures was conducted 2005. Housing units were further classified using the following four categories:

- |                        |                          |
|------------------------|--------------------------|
| 1. Standard Condition  | 3. Major Deterioration   |
| 2. Minor Deterioration | 4. Dilapidated Condition |

Further explanation of the structural condition categories is given below for clarity of definition.

Standard Condition: A standard structure is defined as one that basically has no defects.

Minor Deterioration Condition: A structure requiring minor or no apparent structural repair but which, within the planning period, will require such maintenance to retain its value and usefulness. Examples of minor defects are:

1. Light damage to steps or porches or mobile home skirting and siding;
2. Slight wearing away of mortar between bricks or other masonry;
3. Small hairline cracks in the walls, plaster or chimney or mobile home siding separations;
4. Torn screens or cracked window panes;

5. Slight wear of door sills and frames, window sills or window frames; and,
6. Broken gutters or downspouts.

Major Deterioration: Those units exhibiting a need for additional repair that would normally not be provided during a regular course of maintenance. Such units have one or more deficiencies that are of an intermediate nature, and that must be corrected if the unit is to continue providing safe and adequate shelter for the occupants. Examples of intermediate defects are:

1. Holes, open cracks, rotted, loose or missing materials over a small area of the foundation, roof, or wall or siding of mobile home;
2. Shaky or unsafe steps, rails, and porches;
3. Broken or missing window frames;
4. Rotted or loose window frames that are no longer rain or wind-proof;
5. Loose, broken or rotted stair treads, risers, balusters, or rails;
6. Deep wear on doorsills, frames, steps, or porches;
7. Missing bricks or cracks in the chimney, trim on mobile homes; and,
8. Makeshift chimneys, such as stovepipes or other un-insulated pipe leading directly from stoves to the outside through a hole in the window, wall, or roof.

Dilapidated: Units that, in their present condition, do not provide safe or adequate shelter, and endanger the health, safety, and well being of the occupants. Such units have one or more critical defects, or have a combination of intermediate deficiencies in sufficient number or extent to require considerable repair, or are of inadequate construction. The defects are either so critical or widespread that the structure will have to be extensively repaired, reconstructed, or demolished. Examples of critical defects are:

1. Holes, open cracks, loose, rotted, or missing materials over a large area of the foundation, walls, or roof, including the framework of mobile homes;
2. Sagging roof ridges, eaves, or out of plumb walls, including mobile home walls; and,
3. Extensive damage caused by fire, storms, flooding, termites, etc.

During the course of the housing survey, dwelling structures were also identified according to four basic types: single-family, mobile homes, multi-family, and group quarters. Single-family units were defined as such if they were originally designed to provide living quarters for one family unit and were of a permanent nature. Mobile homes included those housing units which were designed to permit their being transported over public streets and highways with a minimum of effort and congestion and whose original design had not been altered so as to detract from their ability to be

readily moved. Multi-family units include those, which were observed to be originally designed to provide living quarters for two or more families and were of a permanent nature. Group quarters are structures that are normally used as nursing homes, dormitories, or prisons.

## **HOUSING ANALYSIS**

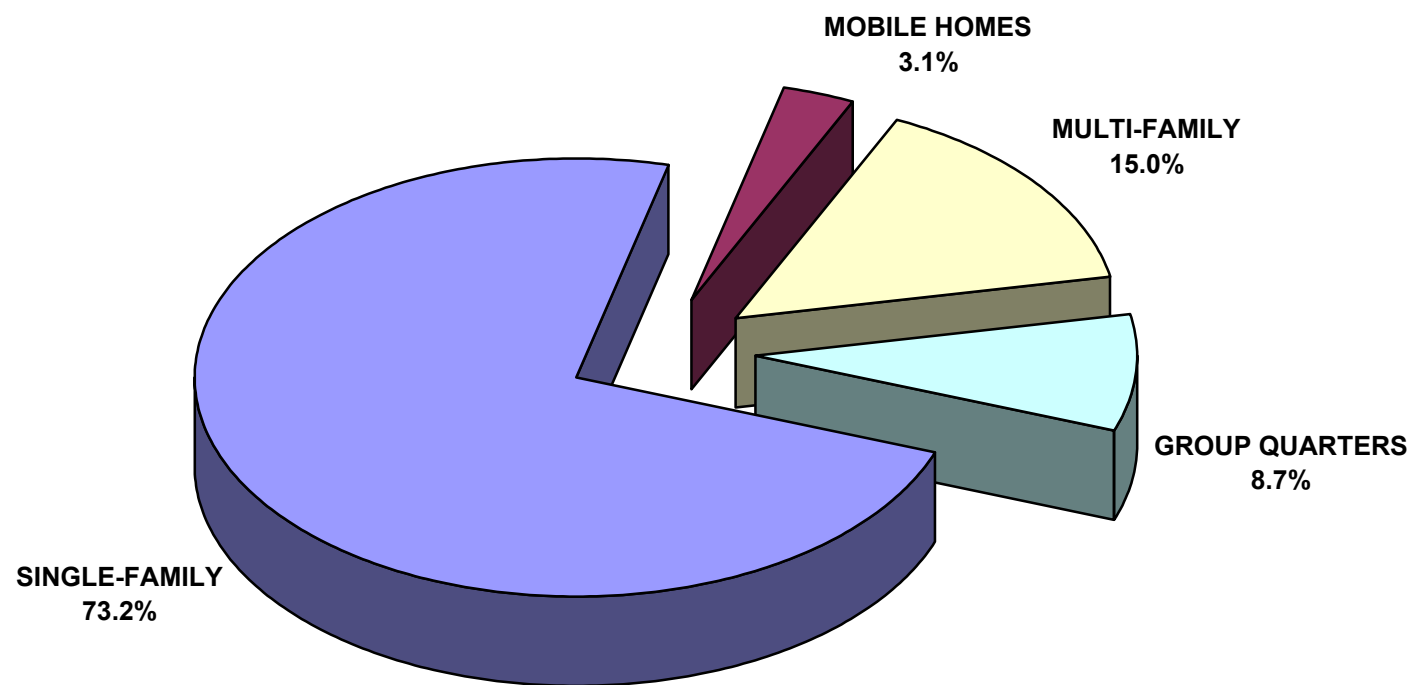
Based on the results of the housing survey, it was determined that a total of 903 housing units exists in Leonard. Of this total, 661 units (73.2 percent) are classified as single-family; 28 (3.1 percent) as mobile home; 135 units (15.0 percent) as multi-family; and 79 (8.7 percent) as beds in group quarters.

The housing survey provided the following results concerning housing condition: 676 units, or 74.9 percent, are classified as being in standard condition; 162 units, or 17.9 percent, are classified as having minor deterioration; 40 units, or 4.4 percent, are classified as having major deterioration; and 25 units or 2.8 percent are classified as dilapidated. Existing housing locations and characteristics for Leonard are provided in greater detail in Figures 5, 6, and 7, and in Tables 4, 5, 6, and 7 below.

FIGURE 5

# CITY OF LEONARD

## HOUSING UNITS

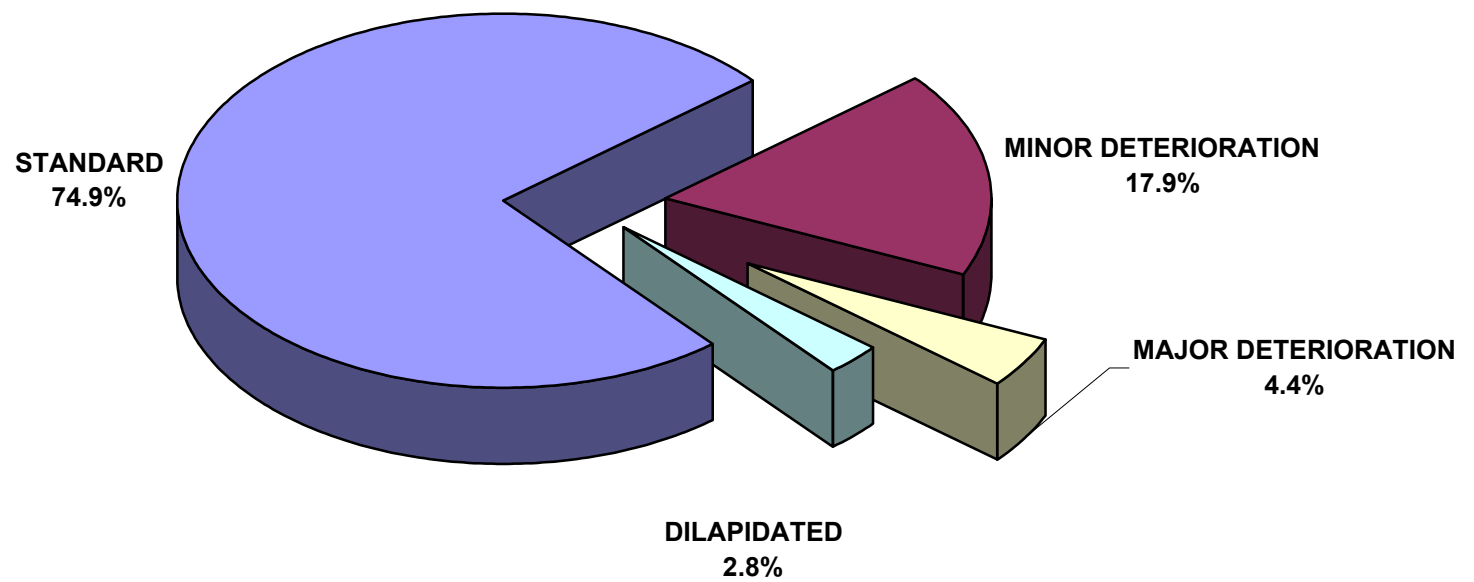


SOURCE: 2005 HOUSING SURVEY BY MSC/SWC



FIGURE 6

## CITY OF LEONARD HOUSING CONDITION



SOURCE: 2005 HOUSING SURVEY BY MSC/SWC



Though few in number, substandard housing units are scattered throughout the City; there are no significant concentrations of deterioration. Most of these units are classified as having minor deterioration; however, some of the housing units have major deterioration, and should receive priority for repair.

**TABLE 4**  
**CITY OF LEONARD**  
**EXISTING HOUSING UNITS**

<b>Housing Type</b>	<b>Number</b>	<b>% of Total</b>
Single-Family	661	73.2%
Mobile Home	28	3.1%
Multi-Family	135	15.0%
Group Quarters	79	8.7%
Total	903	100.0%

Source: Field Survey Conducted by SWC & MSC in 2005

At the time the survey was conducted, 44 single family units were identified as vacant, and are geographically depicted in Figure 7. Of these 44 vacant units, 10 structures

were considered to be in a major deterioration condition and 18 additional structures were considered to be in a dilapidated condition.

**TABLE 5**  
**CITY OF LEONARD**

**EXISTING HOUSING CONDITIONS**

Condition	Single-Family	Multi-Family	Mobile Home	Group Quarters	Total
Standard Condition	452	133	12	79	676
Minor Deterioration	147	2	13	0	162
Major Deterioration	39	0	1	0	40
Dilapidated	23	0	2	0	25
Vacant*	44	2	4	38	86

Source: Field Survey Conducted by SWC & MSC in 2005

\*Vacant units are a subset of housing in all conditions.

**TABLE 6**  
**CITY OF LEONARD**

**2000 HOUSING OCCUPANCY CHARACTERISTICS**

TOTAL PERSONS IN OCCUPIED UNITS	PERSONS IN OWNER OCCUPIED UNITS	PERSONS IN RENTER OCCUPIED UNITS	NUMBER OF VACANT UNITS
1,898	1,208	690	68

SOURCE: U.S. CENSUS BUREAU, 2000

**TABLE 7**  
**CITY OF LEONARD**

**2000 GENERAL HOUSING CHARACTERISTICS**

TOTAL HOUSING UNITS	OCCUPIED HOUSING	MEDIAN VALUE	MEDIAN RENT	MEDIAN MONTHLY OWNER COSTS	
				W/MORTGAGE	W/O MORTGAGE
755	683	\$58,700	\$427	\$721	\$284

SOURCE: U.S. CENSUS BUREAU, 2000

The normally accepted vacancy rate is approximately five percent to ensure an adequate supply of housing is available at all levels of the housing market. Based on the estimate of an average of 2.74 (Owner Occupied) persons per household, allowing for a five percent vacancy rate, assuming no increase in group quarters,

and reflecting anticipated future population levels, the estimated future total housing needs for the City of Leonard have been estimated to be 866 units by 2010, 962 units by 2015, and 1,177 units by 2025 (not including group quarters). If the City grows as projected, and since there are 25 dilapidated units to be removed, a total of 353 new units will need to be added to the housing stock by the year 2020.

25.1 percent of the existing housing stock in Leonard is considered to be in a deteriorating condition, with about 4.4 percent of the single family units needing major repair. Despite the fact that the City housing stock is near the average for most of Texas small communities, the City should educate its citizens about the importance of maintaining the sound condition of housing in order to maintain the excellent condition of Leonard's housing stock. In areas where substandard housing was identified, active code enforcement should be stepped-up. Deteriorating housing should be improved to standard condition. Over a period of time, every housing unit in the City should be brought into compliance with minimum safe housing standards.

# **HOUSING GOALS**

The goals set forth below are presented to ensure decent housing for all citizens.

## **GOAL 1. ASSURE THAT ALL HOUSING WITHIN THE COMMUNITY IS MAINTAINED IN A DECENT, SAFE, AND SANITARY CONDITION FOR ITS USEFUL LIFE.**

Although Leonard will add new dwelling units, the existing units must be adequately maintained in order to meet the local housing demand and foster a stable housing environment. Thus, it is important to direct attention to maintenance of the existing housing stock. Housing should meet appropriate health and safety standards, and comply with the provisions of the local Construction Code for new or existing housing.

### **Policies:**

- \* Encourage high-quality construction of all new housing.
- \* Assure that the design quality of all housing does not contribute to future, long term blight.
- \* Discourage homeowners from neglecting the proper maintenance of their properties.

- \* Consider adopting maintenance standards and enforcement methods.
- \* Promote housing improvements and well-planned rehabilitation programs.
- \* Remove dilapidated structures to help assure the health, safety, and welfare of all citizens.

**GOAL 2. A SUFFICIENT CHOICE OF ADEQUATE HOUSING SHOULD BE PROVIDED TO MEET THE NEEDS OF THE INDIVIDUALS OF ALL SOCIOECONOMIC BACKGROUNDS.**

Households earning less than 80 percent of the local median income and paying more than 30 percent of their income for housing are considered to have a housing need.

**Policies:**

- \* Develop a range of available housing opportunities within the City.
- \* Zone the land in areas with housing needs to promote long term neighborhood stability.
- \* Identify and participate in new programs that provide housing assistance to eligible residents.



- \* Provide public assistance and/or incentives to foster good quality, low to moderate priced housing.

## **HOUSING PLAN**

Housing needs and some of the potential housing issues/problems within the City have been identified above. The prevention and elimination of housing problems in Leonard will require the development and implementation of an effective housing program. Although this will be an ongoing process, specific actions for the short-term period covering the next five years have been developed. These are listed below:

### **2005 through 2006**

1. Adoption of this Community Development Plan. (Cost \$500)
2. Publishing in a newspaper of general area circulation that Fair Housing is the Law, and designate a month annually as a Fair Housing Month. (Cost \$50)
3. Beginning a public awareness program on the need to preserve the existing housing stock. (Cost \$950)

4. Removal of the vacant dilapidated housing structures. (Cost \$12,000)
5. Applying annually to seek funds to improve housing quality and a monthly review for applicable new Housing Programs by checking the Texas Department of Housing and Community Affairs web site (<http://www.tdhca.state.tx.us/hp.htm>). (Cost \$0)

**2007 through 2010**

1. Obtaining annually an updated copy of the State Low Income Housing Plan. (Cost \$50)
2. Beginning with those units in worst condition, completion of the rehabilitation of at least 100 of the deteriorating housing units in the City by using a combination of the following methods:
  - A. Strict Code Enforcement. (Cost \$850/month)
  - B. Seeking HOME funds. (Cost \$0)
  - C. Establishing Benevolent Groups to help those unable to help themselves. (Cost \$0)
  - D. Seeking funding from other housing programs (See State Low Income Housing Plan). (Cost \$0)
3. Obtaining Federal/State financial assistance for housing improvements. (Cost \$0)

4. Development of strategies to obtain and use the HOME Program created by the National Affordable Housing Act (see State Low Income Housing Plan). (Cost\$500)
5. Based on the projected population and housing needs, an average of 19 housing units needs to be constructed every 12 months (until a total of 353 new units are provided to meet the anticipated 2025 housing demand). The construction of the needed housing units should be provided through private home builders responding to local demand. The City should encourage high quality units subject to adopted zoning and subdivision regulations and building codes.

## **FAIR HOUSING ACTIVITIES**

The City of Leonard has been active with Fair Housing Activities. Activities in the past include the adoption of a “Fair Housing Ordinance. Additionally, the City in July 22 of 2004 as part of this project Publishined a Notice in a newspaper that Fair Housing is the Law. Additionally, During August of 2005 the citizens of Leonard were given the opportunity to address housing needs during open forum during the initial presentation of this document to the Leonard City Council.

# INTRODUCTION

Urban land use planning in the United States began during the late seventeenth and early eighteenth centuries when the colonial settlers of the new world started building North American cities on the eastern seaboard. These new American towns reflected the European cultural assumptions held by the colonial leadership with regard to human settlement patterns and urban design. Consistent with Euclidean philosophy, communities were spatially surveyed and segmented based on an analysis of human needs, activities, and functional relationships desired for given geographic areas.

The colonial urban designs served the citizens of our new nation quite well, so long as the majority of the population lived and worked on farms, and the uses of urban lands imposed a relatively low impact on the living environment of the urban citizens. However, as the industrial era took hold, populations shifted from farms to cities in order for workers to live in closer proximity to job opportunities. Unfortunately, the operations of these new industrial employers had significant environmental impacts, which especially affected the quality of life experienced by the new job-seeking urban citizens.

The rapid changes in population density and land use intensity presented a new

demand in the United States for changes in urban design which would create more segmentation and separation within the emerging modern land use patterns. As new urban forms evolved in response to market gravity (created by the developing centers of commerce), methods of land use planning also evolved to meet the growing concerns for the health, safety, and welfare of the municipal citizenry. With the industrial age it became especially apparent that a given community's physical future depended on the way the land within its jurisdiction was managed and used. Greater priority had to be given to managing the emerging land use relationships.

The events described in the foregoing history of American urban experience had made it apparent to community leaders that the very quality of life and economic viability of modern communities are greatly affected by the arrangement of its land uses. In fact, today it is obvious to most municipal officials that the degree of harmony, desirability, efficiency, and convenience that a city has to offer to its citizens is largely determined by the quality of public and private land use decision making within its jurisdiction. Therefore, proper planning for healthy growth and change in a given town or city must begin with a sound local land use planning effort.

Consequently, the laws of the State of Texas acknowledge and encourage land use planning as a fundamental activity of responsible local governing bodies. In order to begin a land use planning effort, it is important to establish a common understanding among participants regarding the basic nature of planning. Fundamentally, a plan is

a way of communicating a desired future; a means for transforming thoughts into a reality. In order to produce a plan it is necessary to compare "what is" with "what is desired". Strategies must then be developed to maintain the existing elements deemed desirable, and encourage equitable, healthy change, which addresses those desires that are currently unrealized.

The method a public entity uses for formulating such a plan should reflect the political and socio-economic context of its jurisdiction. Within our system of governing (a democratic republic with a capitalistic economy), it is important for a land use plan to (a) express a vision that is shared by local leadership, and (b) acknowledge and respect private property rights. Further, the plan should be formulated in a manner that enables it to function as a guide for capitalizing on local opportunity.

When considering the dynamics affecting land use planning for the City of Leonard, several factors affecting market processes and responses should be kept in mind. The pattern of land uses existing in Leonard today are developing in response to the on-going and changing needs of the community. The day to day activities and desires of persons living and/or working in Leonard create demand for residential, retail, service, commercial, office, and industrial areas, as well as need for an efficient system of streets and public services. The market and human response to

these demands on the existing land use patterns will impact Leonard's economic development and affect the relationships of existing and future land uses. The evolving relationships between existing and future land uses will shape the character of the community, and create both short term and long-term impacts on the physical, socio-economic, and political future of Leonard.

Additionally, the development of these land use relationships will be important in the provision and management of public services and facilities throughout the community. An orderly and compact land use arrangement can be served more easily and efficiently than a random and scattered association of unrelated uses. Providing for this orderly and efficient use of land should be a major planning consideration in the City of Leonard.

More specifically, in considering future land use, the present use of land must be analyzed. Future decision-making must consider the conditions existing today. For example, in a given city, the land use patterns have generally been established, and an overall market consensus on the reasonable range of property values has been reached. A future land use plan must respect these existing patterns, protect established value ranges, and not jeopardize the socio-economic stability by suggesting adverse changes to land use. A future land use plan also must recognize existing conditions, which may require expansion of certain land uses, as

well as trends influencing development that may require allocation of additional land for new uses in presently undeveloped areas.

In order to analyze the present use of land in Leonard, and enable community leaders to envision future land use arrangements, the specific nature, location, and intensity of all existing land uses must be considered. Therefore, a thorough and comprehensive examination of land uses was undertaken in 2005. All tracts of land within Leonard's city limits and extraterritorial jurisdiction were examined on a parcel-by-parcel basis to determine the nature, extent, and quality of use. This information was recorded on specially prepared base maps. The use of each parcel was also classified within a series of land use categories to reflect the City's current patterns of use. These various land use categories are summarized as follows:

1. Residential:

- Single-family dwellings

- Multi-family dwellings

- Mobile homes

2. Commercial

3. Industrial

4. Parks

5. Public and semi-public areas

6. Streets, Alleys and Railroads



7. Vacant Developed
8. Vacant Undeveloped
9. Agriculture

Each of these categories can be generally defined in the manner described below.

1. Residential: Land on which there exists one or more dwelling units, including accessory buildings; the primary use being for sheltering individuals, families, or groups of persons. The residential land use classification examined three specific types - single-family, multi-family (including group home), and mobile home. Single-family includes those permanent structures, which were originally designed to provide housing for one family unit. Multi-family housing structures include those which were originally designed to house two or more family units, such as duplexes, apartment houses, and group quarters. Mobile homes include those housing structures, which were designed to permit mobility over public streets and highways with a minimum of effort and congestion and have not had significant design alteration (e.g.. setting a unit on a permanent foundation, thereby limiting the ability for easy movement).

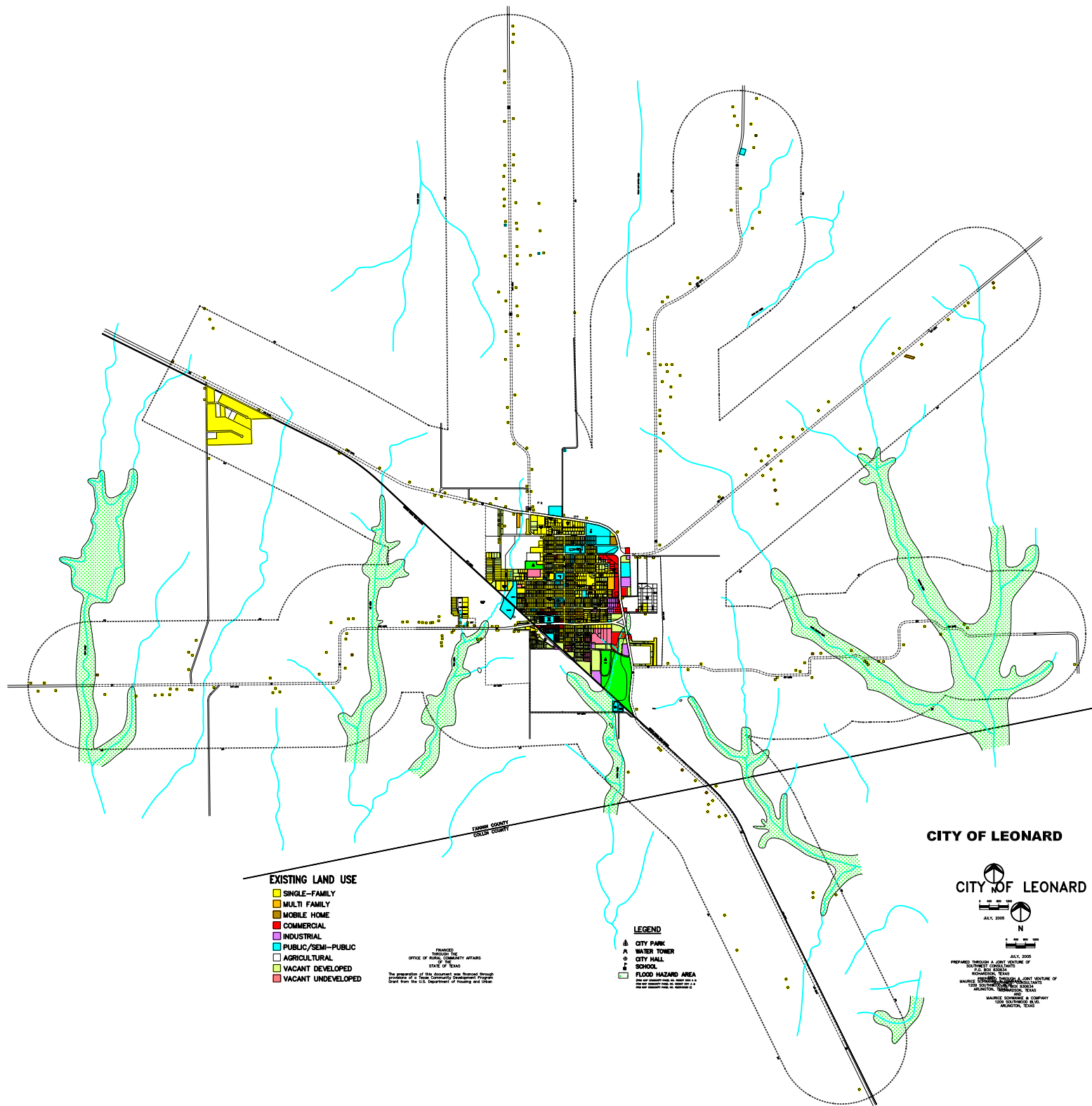
2. Commercial: Land or buildings where merchandise or services are offered for sale. The primary purpose of the land is to provide a location for displaying merchandise or communicating services in a manner that enhances the convenient retail sale of goods and services.  
Example: grocery stores, clothing sales, car sales, farm equipment sales.
3. Industrial: Land occupied by buildings or open areas primarily being used for storage, transportation, or manufacturing of a product.  
Example: manufacturing, construction yards, heavy equipment or material storage, warehousing, wholesale operations, utility stations.
4. Parks: Land devoted to active or passive recreation, or preservation of open space, natural beauty, or environmentally sensitive lands.
5. Public and Semi-Public: Land or buildings occupied by agencies of the government or religious or educational groups. Example: schools, churches, cemeteries, city buildings, post offices, and fire stations.

6. Streets and Alleys: This category includes rights-of-way for highways, streets, and alleys opened for use as thoroughfares, and freight and passenger depots.
7. Vacant developed: Land on which none of the uses in 1 through 6 above are performed and where access to streets, sewer service, and water service is readily available.
8. Vacant undeveloped: Land on which none of the uses in 1 through 6 above are performed and where access to streets, sewer service, and water service is not available.
9. Agricultural: Cultivated and range land (five or more acres).

## **EXISTING LAND USE COMPOSITION AND ANALYSIS**

### **Land Use Inventory**

The land use inventory is an identification of the current uses of land throughout the planning area. The inventory was graphically recorded on a map (See Figure 8),



# EXISTING LAND USE

- SINGLE-FAMILY
- MULTI-FAMILY
- MOBILE HOME
- COMMERCIAL
- INDUSTRIAL
- PUBLIC/SEMI-PUBLIC
- AGRICULTURAL
- VACANT DEVELOPED
- VACANT UNDEVELOPED

FRANCO  
 FRANKLIN  
 OFFICE OF PUBLIC AFFAIRS  
 OF THE  
 STATE OF TEXAS  
 The preparation of this document was funded through  
 a grant from the U.S. Department of Housing and Urban  
 Development.

## LEGEND

- CITY PARK
- WATER TOWER
- CITY HALL
- SCHOOL
- FLOOD HAZARD AREA

## CITY OF LEONARD

CITY OF LEONARD

JULY 2005

PREPARED THROUGH A JOINT VENTURE OF  
 SOUTHWEST CONSULTANTS  
 P.O. BOX 1000  
 HOUSTON, TEXAS

ENGINEER: FRANKLIN, FRANKLIN & ASSOCIATES, P.C.  
 1000 SOUTHMOORE BLVD., SUITE 100  
 HOUSTON, TEXAS 77057

ENGINEER: FRANKLIN, FRANKLIN & ASSOCIATES, P.C.  
 1000 SOUTHMOORE BLVD., SUITE 100  
 HOUSTON, TEXAS 77057

and the corresponding acreage calculations were tabulated. The land use inventory is not a plan, but rather an important set of data for formulating a plan. To keep the plan current, this inventory should also be kept current. As a new building permit is issued or a tax record is changed, the Existing Land Use Map should be updated and the land use inventory calculations appropriately adjusted. By keeping the land use data current, the City can always assess where it is in relation to its ultimate land use as outlined in the Future Land Use Plan.

Leonard is a small North Central Texas town (population: 2,122 as of 2005), containing a total land area of approximately 1,530.1 acres, and located roughly 15 miles southwest of Bonham, 20 miles northwest of Greenville, 33 miles southeast of Sherman, and 67 miles northeast of the Central Business District of Dallas. Leonard was developed on flat to gently rolling terrain with scattered trees. Situated in southwest Fannin County the City is at an elevation ranging from approximate 640 to 750 feet above sea level. U.S. Highway 69 traverses the City from northwest to the southeast and State highway 78 traverses the City from east to west.

The City of Leonard has about 64 percent, or 972.3 acres of the City developed, while the remaining acreage is vacant (without access to streets or utilities) or being used for some agricultural purpose. Agricultural land accounts for 25.7 percent (393 acres) of the land within the Leonard city limits. Of the developed land, the most

prevalent land use (other than streets and alleys) is single-family residential, which occupies about 14.7 percent of the City's total developed land area. The single family acreage is occupied by 661 single family dwelling units.

Commercial land use covers a total of 36.7 acres in the City. Due to customer convenience and good access, most of the future commercial land use in the City is expected to develop along highway frontages with minor commercial development occurring as infill in the downtown (CBD) area.

Some industrial sites have also been developed, and include some 18.6 acres, or 1.2 percent of the developed land in Leonard.

The public/semi-public land use is generally comprised of land supporting the city hall/police station, fire station, churches, schools, future library site, utility sites, county barn, hospital and post office. Public/semi-public land uses in Leonard account for a total of 70.8 acres, or 4.6 percent of all land within the City.

### **Analysis of Existing Land Use**

An analysis of both the existing and future development activity in Leonard should examine the following basic influences: population growth, housing availability,

public utilities and facilities, transportation, and development constraints posed by both the natural and man-made environment.

### **Influence of Population**

Leonard's population growth is expected to grow moderately during the 20 year planning period. The 2000 population was 1,898 according to the census data. The 2005 population rose to 2,122 and the 2025-projected population is estimated to be 3,150. The demographic characteristics of the population are not anticipated to change significantly. Figure 3 graphically illustrates the anticipated population growth (see the Population Section of this Community Development Plan for more detail).

**TABLE 8**

**CITY OF LEONARD**

**EXISTING LAND USE CALCULATIONS**

<b>LAND USE</b>	<b>ACRES</b>	<b>% OF GROSS</b>	<b>% OF TOTAL DEVELOPED</b>	<b>ACRES/100 PERSONS</b>
RESIDENTIAL	249.2	16.3%	25.6%	11.7
SINGLE FAMILY	224.9	14.7%	23.1%	10.6
MULTI-FAMILY	17.4	1.1%	1.8%	0.8
MOBILE HOME	6.9	0.5%	0.7%	0.3
COMMERCIAL	36.7	2.4%	3.8%	1.7
INDUSTRIAL	18.6	1.2%	1.9%	0.9
PARKS	59.8	3.9%	6.2%	2.8
PUBLIC/SEMIPUBLIC	70.8	4.6%	7.3%	3.3
STREETS AND ALLEYS	439	28.7%	45.2%	20.7
VACANT DEVELOPED	98.1	6.4%	10.1%	4.6
VACANT UNDEVELOPED	164.8	10.8%		7.8
AGRICULTURAL	393	25.7%		18.5
TOTAL DEVELOPED	972.3	63.5%		45.8
TOTAL	1530.1	100.0%	100.0%	72.1

Based on 2005 land use survey conducted by SWC & MSC.



The additional residential population will place more demand on city services and utilities. As residential properties develop there will also be a proportional increase in the locally generated demand for retail/services. The City has 1.7 acres of commercial land use per 100 population (2.0 is the normal based on consultant observations). Eventually, future population growth will present good opportunities for growth in retail/service uses primarily serving the local population, tourists, and highway passer-by consumers.

### **Housing Influence**

Leonard provides four types of housing opportunities - single family units on permanent foundations, mobile homes, multi-family, and group quarters. According to the 2000 census, 90.9 percent of Leonard's housing units were occupied. The current occupancy rate for all housing in Leonard is approximately 97.4 percent. About 661 out of Leonard's 903 housing units (73.2) are single-family, and approximately 25.1 percent of the total dwelling units need repair, with nearly 4.4 percent of the single family units needing major repair (23 need demolition).

With the growth in population, the demand for well-maintained housing of various types will increase. Unless more units are built and maintained, Leonard housing will be in very short supply as evidenced by the population projections, high

occupancy rates, and the required housing units needed during the planning period.

As the City grows, new housing must be planned and constructed, and the existing housing stock must continue to be well maintained. For a more in-depth analysis of housing, see the Housing Section of the Community Development Plan.

### **Utilities**

Water and wastewater systems in the current configuration will be a significant constraint to future growth. As such, Leonard's water and sewer system will need improvement during the planning period. The water and wastewater- related issues are under study, and will be identified in volume II of the Community Development Plan. When setting priorities for future expenditures, it must be kept in mind that attraction of future growth and provision of appropriate levels of service depend on appropriate expansion of the City's wastewater collection and water supply and treatment system.

### **Public Facilities**

Public facilities in Leonard include: a city hall, police station, a fire station, churches, schools, an existing library, utility sites, and a post office. Demands of future populations will require future public facility maintenance and minor expansion.

## **Transportation**

The City of Leonard is served by a United States highway, a farm-to-market roads, local streets, and area county roads. An analysis of the street conditions as well as thoroughfare is part of this Community Plan with recommendations in the following section.

With the addition of some pedestrian access facilities, the addition of new thoroughfares and proper maintenance, the transportation facilities will be capable of accommodating anticipated population growth and resultant increases in land use demand created within the existing City Limits for the foreseeable future. Additionally, in the long term, as new areas are developed, a new network of minor streets will need to be planned and constructed.

Leonard provides no local air transportation facilities. The nearest airport outside of Leonard is the Municipal airport at Bonham which is centrally located in Fannin County. More significant nearby airports include the Dallas/Forth Worth International Airport (about 76 miles to the southwest), and Love Field in Dallas (approximately 84 miles south). The closest major link to international connections and commercial air travel and freight is located at DFW International Airport.

## **Natural and Man-Made Constraints**

Other than the barrier effect of U.S. 69 and the railroad traversing the City, there are no significant man-made constraints affecting development in Leonard; however, the head waters for several creeks impact development of the City. These waters include Bear Creek, Lee Creek, Deal Creek, Arnold Creek, South Sulphur River, Mustang Creek, Burr Oak Creek, Sugar Loaf Bottom Creek, and Valley Creek.

The creek areas (with associated flood hazard area) provide obvious challenges to development - crossings are difficult, and flood hazard areas are either unbuildable or require limited filling. The flood hazard areas associated with that portion of the above-described creek areas impacting Leonard and its future growth areas are mapped on Flood Insurance Maps for Fannin and Hunt County and are generally indicated on the Future Land Use Plan (See Figure 9). It should be noted that Leonard does not participate in the flood insurance program. The flood hazard area shown in the City is a consultant projection.

A flood hazard area consists of two sections. The center of the flood hazard area is known as the floodway. This area, which includes the actual water channel, is the area which cannot be filled without causing increased flooding elsewhere during a 100-year storm. The area extending from the floodway to the outer edge of the flood hazard area is known as the flooding fringe. This higher area can be developed

after appropriate study, but habitable structures must be built one-foot above the 100-year flood elevation. At this time, the delineation between the floodway and the flood fringe has not been determined for Leonard. However, the total flood hazard area has been determined and is shown on the existing and future land use plan.

There are two predominate soil series covering Leonard. The majority of the area within the Leonard City limits is covered by the Houston Black-Lesson-Heiden association. The western portions of Leonard are covered by the Fairlie-Dalco association. These two associations have suitabilities that are generally characterized as follows: severely limiting to community development, sanitary facilities, and recreation. Further, these soil associations have high shrink-swell, low strength, and slow percolation characteristics, and are poor for road fill or topsoil; and unsuited for sand or gravel.

The City of Leonard should adopt and enforce standards for the design and construction of development in order to mitigate the limitations posed by its soils. Any septic tanks should be carefully controlled and monitored.

## **LAND USE GOALS AND OBJECTIVES**

Leonard's future land use patterns will significantly influence the quality and cost effectiveness of local transportation, provision of public services, energy consumption, property taxes, land use compatibility, and opportunities for future growth and prosperity. Therefore, the overriding land use goal for the City is to:

**GOAL. PROVIDE ADEQUATE LAND AREAS FOR FUTURE DEVELOPMENT AND ENCOURAGE THE ESTABLISHMENT OF LAND USE ARRANGEMENTS THAT PROTECT THE HEALTH, SAFETY, AND WELFARE OF LEONARD RESIDENTS AND LAND OWNERS.**

**Policies:**

- \* Create and maintain residential neighborhoods which provide pleasant places for all citizens to live by meeting local housing needs and future market demands.
  
- \* Encourage the location of business, office, and industrial centers that: most efficiently utilize local resources; minimize adverse impacts on adjacent uses; and most effectively provide the community with desired products, services, and employment opportunities.

- \* Develop zoning and subdivision regulations consistent with the land use plan.

## **FUTURE LAND USE**

### **Principles and Process**

In order to formulate, adopt, and implement a plan that accomplishes the foregoing overall goal and objectives, it is important to incorporate certain basic planning principles and processes into the local future land use planning effort. The Future Land Use Plan expresses projections that are based on sound planning principles, recognizing and supporting existing land uses, community facilities, and physical features. Existing land uses, existing structures, surrounding market areas, transportation patterns, and natural or physical limitations all combine to affect on the planned and actual direction and extent of the City's growth. The needs addressed by the Future Land Use Plan reflect an evaluation of past needs and current trends, as well as the assumption that the City will grow in patterns predicated on those needs and trends. It must be emphasized, that the Future Land Use Plan is intended as a guide to organize the future growth of the City, but does not suggest mandatory compliance.

The plan for Leonard suggests that certain areas be reserved and developed for various land uses. The following general action guidelines were used in developing the land use arrangements expressed by the plan:

1. Establish a pattern of land use which creates sound, functional relationships between working, living, and recreational areas.
2. Establish a pattern of land use which minimizes conflict between potentially incompatible land uses.
3. Establish a pattern of land use which provides a balance between demand for different land uses and the opportunities for supplying a reasonable selection of viable, compatible sites.
4. Establish land use assignments that recognize regional opportunities and constraints that affect the local market.
5. Establish a land use pattern which creates a balance between the provision of public services, and the provision of a reasonable selection of land use arrangements addressing private development demands.

Additionally, the locational requirements and preferences regarding land use arrangements are factors to consider in formulating the guiding principles and standards for anticipating the future location and distribution of uses throughout the City. In more definite terms locational requirements consider: health and safety hazards; relative position of uses in terms of both time and distance; relative



compatibility of uses; the social implications for the people of the community; the economic feasibility of developing particular uses in particular locations; and the affect of use arrangements on the quality of life and general attractiveness of the Community.

Selecting the pattern and distribution of future land use is best accomplished through:

1. The analysis of existing land use characteristics;
2. The affect of existing infrastructure;
3. The location of existing thoroughfares;
4. The affect of the past, current, and future economy; and,
5. The application of recognized planning principles.

These characteristics and principles, then, establish a "determinant" process by which to judge the optimum use by community standards. The advantage of going through such a process is two-fold. First, it results in a land use plan for the City as represented by the Future Land Use Map. This map is a generalized guide to help keep the long-range plans for the community in perspective. Although the Future Land Use Map cannot be used exclusively to identify the proper use for each lot and parcel, it can be used to assure that individual decisions follow a comprehensive

pattern. It also helps in the sensitive but necessary evaluation of change with respect to public and private benefits.

Second, and perhaps even more important, the establishment of this process provides the City with a method of logically making subsequent land use decisions. Existing conditions, accepted principles, and current policies should be used in the evaluation of proposed changes. For example, these determinants should be used in considering a rezoning application, selecting the location for a utility line extension, or drafting new development regulations.

It is important to reiterate that the Future Land Use Plan does not attempt to set the specific use for each and every parcel in the planning area. A specific lot-by-lot assignment would both remove the competitive element from the market and suggest overly restrictive limitations to the different uses of a given piece of land. Rather, the Future Land Use Plan should be used to establish the general character and needs of an area. When the Plan is implemented through rezoning, platting, and ultimately development, each parcel should be evaluated by the application of the current policies and recognized planning principles.

### **Recommended Assignment of Land Uses**

The recommendations below are based on the consultant's review and analysis of a combination of: the forgoing general planning principals and existing land use analysis; information from other applicable sections of this plan (as periodically indicated throughout the text above); the above mentioned goal, objectives, principals, and processes.

### **RESIDENTIAL:**

Residential, commercial, and industrial uses, each have distinct sets of parameters affecting demand and location within the community. Residential land use demand is basically a function of future population level and average household and lot size. Medium to high density development should be used to serve the needs of certain population groups as well as to provide transition between widely varying intensities of use.

With respect to the location of future residential development, convenient access to major streets, commercial areas, and community facilities must be considered. For Leonard, it is anticipated that new residential will be built as: in-fill development/redevelopment, as new subdivisions close to or within current city limits, and as large lot development in sparsely populated areas on the outlying areas surrounding the City.

Based on the future size demand and land supply for residential lots in the City and the anticipated future population and household size, the amount of future demand for single family residential land can be computed. The present average single family home lot size in Leonard is approximately 14,800 square feet. As future developments occur, and the fringe areas of Leonard develop, the average lot size for single family may decrease. The Market trend with current home construction and land value appears to be driving the lot size downward. The current lot sizes being asked for by developers is 6,000 to 7,200 in the surrounding communities. Additionally, due to the large amount of agricultural land around the Leonard jurisdiction, Leonard could offer one to five acre lots that allow for less density with more privacy, areas for gardening and animals (raising horses), and plenty of room for children to safely play. Taking the foregoing factors into account, the average lot size for future single family may average close to one acre with the bulk of the lots being in the 6,000 to 7,200 square foot range. The present average household size for single family and mobile homes is estimated to be approximately 2.74 persons. As such, when considering projected population growth and adjusting for a 5% vacancy rate, the future minimum additional single family residential land use requirement for the City and planning area will be about 375 acres by 2025 (on infill lots and fringe area lots averaging close to 1 acre in size) will need to be developed and served over the next 20 years.

Finally, about 20 to 40 acres of medium to high density residential should also be provided to provide a buffer from existing and future industrial uses in various areas of Leonard.

### **COMMERCIAL:**

Future commercial land uses are often projected according to the anticipated number of acres of commercial land use per 100 persons of future population. The future commercial in Leonard should be designed as (a) in-fill in the old downtown area to serve local needs, and (b) as highway oriented uses along the highway frontages in order to serve regional, commuter, and passer-by highway traffic.

The design of future commercial establishments should provide for low-intensity, single-level structures which are accompanied by on-site parking and loading facilities. As such, due to larger than average historical demand for retail land, and the need to develop tourist/festival services, future commercial land usage is estimated to be approximately 25 to 30 more acres by the end of the planning period (2020) for a total future commercial acreage of around 65 to 75 acres, which will be above of the average 2.0 acres per 100 population standard. Most of the future commercial growth is proposed as infill in existing commercial areas of town along the corridors of U.S. 69.

### **INDUSTRIAL:**

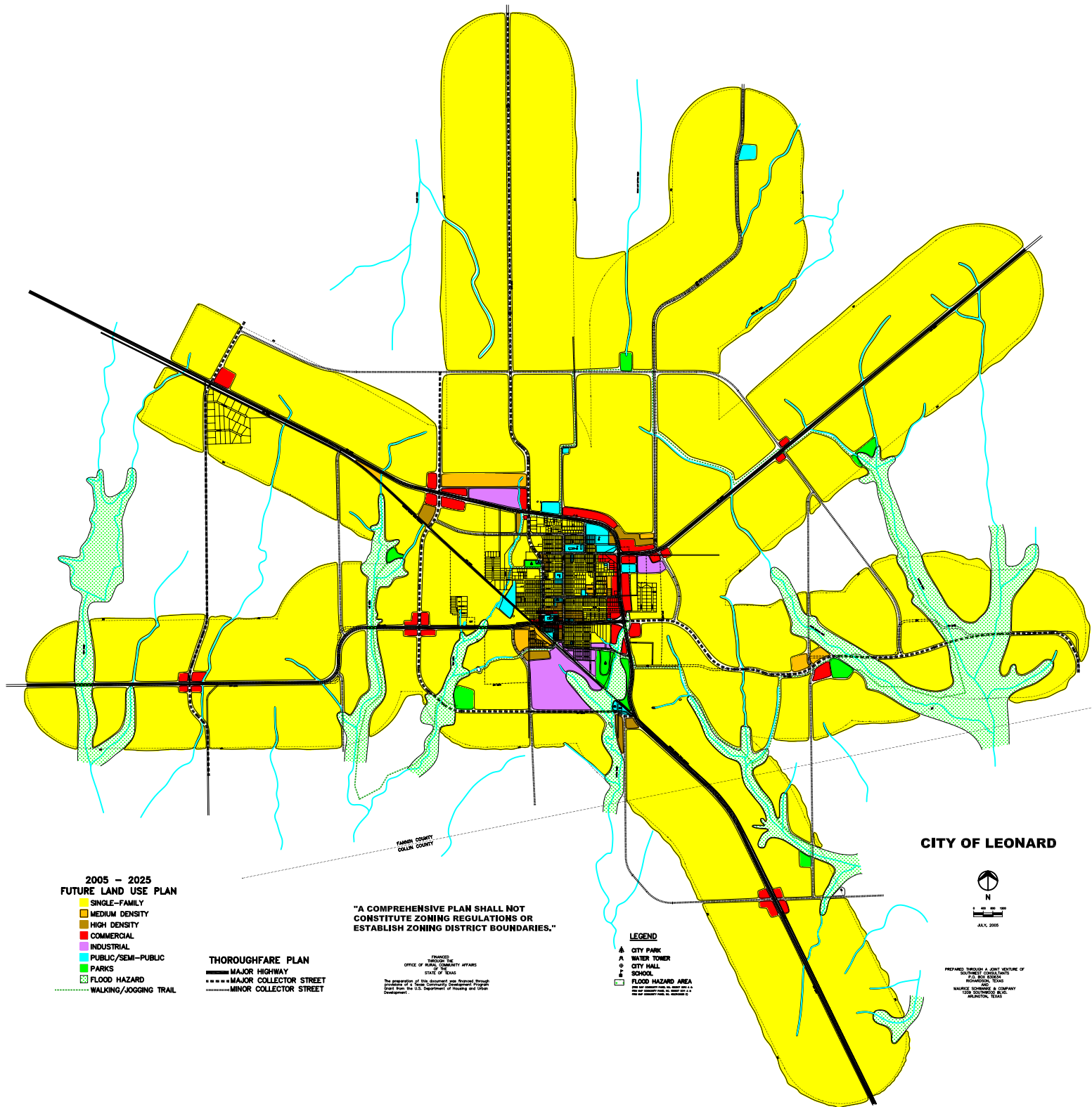
Leonard land use is likely to mostly serve residential, agricultural, and retail/services. However, industrial opportunity should be preserved for the Future. Therefore several areas are recommended to be set aside for such uses. Therefore, an area in the northern and southern sector of the city has been set aside for industrial park uses comprised of 60 to 70 acres and shown on the Future Land Use Plan.

### **PARKS:**

With respect to parks and open space, locally significant park and pedestrian/open space opportunities exist in Leonard. Leonard currently has significant park land, but no designated open space system linkages, and a need for more modern recreational development. For more detail, see the Recreation and Open Space section of the Community Development Plan.

### **RECOMMENDED LAND USE PLAN:**

The spatial arrangement of the land uses considered in the above recommended land use assignments were designed to address: the land use goals and objectives; the constraint and opportunity analysis of existing land use and future needs; and land use planning principles and processes. The resultant pattern was incorporated into the Future Land Use Plan, and is graphically illustrated in Figure 9.



2005 - 2025  
FUTURE LAND USE PLAN

- SINGLE-FAMILY
- MEDIUM DENSITY
- HIGH DENSITY
- COMMERCIAL
- INDUSTRIAL
- PUBLIC/SEMI-PUBLIC
- PARKS
- FLOOD HAZARD
- WALKING/JOGGING TRAIL

THOROUGHFARE PLAN

- MAJOR HIGHWAY
- MAJOR COLLECTOR STREET
- MINOR COLLECTOR STREET

"A COMPREHENSIVE PLAN SHALL NOT  
CONSTITUTE ZONING REGULATIONS OR  
ESTABLISH ZONING DISTRICT BOUNDARIES."

PLANNING  
THOROUGHFARE  
OFFICE OF MUNICIPAL AFFAIRS  
STATE OF TEXAS  
The preparation of this document was financed through  
Grants from the U.S. Department of Housing and Urban  
Development.

LEGEND

- CITY PARK
- WATER TOWER
- CITY HALL
- SCHOOL
- FLOOD HAZARD AREA

CITY OF LEONARD



PREPARED THROUGH A JOINT VENTURE OF  
THOROUGHFARE PLANNING  
AND  
MAURICE SCHMALE & COMPANY  
PLANNING, TEXAS

JULY, 2005

It should be especially emphasized that the value of the Plan to the decision-making process is good only as long as the Plan is kept current. The inventory of both man-made and natural characteristics must reflect all changes occurring in the community. A current tally of existing conditions in both graphic and tabular form will not only allow for an up-to-date analysis of needs but will also allow for a measurement of success at achieving the Plan.

The Plan, then, must constantly be updated to reflect the conditions and attitudes of the times. Further, the Future Land Use Map should be used as a guide only to keep incremental changes of the community in perspective. The individual decisions, which actually shape the community, however, should be evaluated with respect to the characteristics and principles discussed throughout this document.



# INTRODUCTION

This Plan has been prepared for the City of Leonard, a public entity responsible for providing adequate, safe and accessible public park, recreation, and open space facilities to all citizens within its jurisdiction. General background information on the City of Leonard has been provided below, and is followed by an overview and history of national issues affecting local park, recreation, and open space planning efforts.

Leonard is a small North Central Texas town (population: 2,122 as of 2005), containing a total land area of approximately 1,530.1 acres, and located roughly 15 miles southwest of Bonham, 20 miles northwest of Greenville, 33 miles southeast of Sherman, and 67 miles northeast of the Central Business District of Dallas. Leonard was developed on flat to gently rolling terrain with scattered trees. Situated in southwest Fannin County the City is at an elevation ranging from approximate 640 to 750 feet above sea level. U.S. Highway 69 traverses the City from north to south and State highway 78 traverses the City from east to west. Bonham is the closest major economic center. The Leonard area climate produces an annual average daily maximum temperature of 75.1 degrees, and an average annual rainfall is 43.99 inches. Leonard currently has 59.8 acres utilized as parkland and open space.

With the population estimated to be 2,122 people in July of 2005 an increase of 276 persons was experienced since the 2000 census, which reported the Leonard population as 1,846. According to the projections in the Population Section of this Community Development Plan, the population is expected to increase over the next 20 years to about 3,150 people. Figure 3 graphically illustrates the past and anticipated population growth.

It is not anticipated that the demographic composition will change significantly. The 2000 population composition is indicated by Table 2 reflects the findings of the Population Section of this Community Development Plan. As shown, in 2000 Leonard was 85.0 percent White, 5.5 percent black, 7.9 percent Hispanic Origin of any race, 0.2 percent Asian, 1.9 percent American Indians, 5.7 percent other, and 1.8 percent two or more races.

Families with children constitute more than 39.4 percent of the population. The median age of the Leonard population is 33.2 years. Since 13.9 percent of Leonard's population is over 65 years of age, 30.2 percent is under 18 years old, and 39.8 percent is 25 to 54 years old,, it is evident that the demand for park and recreation services must meet the needs of both young families and a broad range of age groups, including Leonard's children and elderly. In 2000 Leonard had 557 children under 18 years of age, and is projected to have roughly 950 children under 18 by 2025.

Before addressing specific park, recreation and open space planning information and strategies related to Leonard, the remainder of the

introduction to this Plan has been devoted to an overview of pertinent history, general context information, and significant issues and principals related to American recreation and open space planning.

Opportunities for convenient, affordable participation in outdoor recreational activities materially enhance the health, well being, and human development of urban and suburban citizens. As America's cities and towns grew, the public and private sectors recognized the importance of recreation, and have often cooperated in efforts to fulfill the human recreational need by assuring adequate public access to park and recreation facilities. The historical development of cooperative recreational efforts is summarized below.

During the transition of our society from an agricultural to an industrial society, human settlement patterns became denser. The land was subdivided into smaller parcels with increased percentages of impervious, manmade surfaces. Natural areas were sacrificed to make way for more urban environments. People living and working in these denser, town environments no longer could experience the freedom of movement and relaxation associated with larger open spaces. With the shrinkage of the agricultural life style, regular contact with nature became far less convenient and frequently unavailable to the public.

In response to the unmet human need for outdoor recreation space, town leaders found it necessary to provide park and open space opportunities in order to beautify their urban environments, and to help nurture the healthy growth and development of their citizenry. The "City Beautiful Movement"

took hold, and spread across America. The significant, positive effect of parks and open spaces became generally well recognized. Positive responses from urban citizens, improvements in the appearance of the cityscape, and strengthening of the local economy were all important results of sound park planning. Parks, recreation, and open space became an integral part of the quality of life demanded by citizens, and became generally known as essential amenities sought by people when choosing a place to live and work. Standards evolved for the appropriate provision of community recreation and beautification.

Today, many communities have much to consider when developing standards, which guide their local planning efforts for maximizing parks and recreation opportunities. First, the need and demand for park and recreation facilities in a given community are directly proportional to the population and environmental opportunities of the service area. Meeting gross area park standards alone does not adequately address a community's park needs. Perhaps, even more important is the availability of improved and accessible park areas that conveniently provide citizens with a balanced variety of facilities and environmental protection.

When determining specific service area needs, and the local strategies for addressing citizen demand for essential recreation facilities, a community should keep some basic park planning issues in mind including:

- a) Timing of land acquisition;
- b) Trends affecting demand;
- c) General design principals;
- d) Regional priorities;

- e) Conventional planning criteria; and
- f) Local determination of standards.

Timing of land acquisition - The City has the responsibility to take the lead in assuring timely reservation and acquisition of lands necessary for the creation of a well-conceived park and open space system. If provision of parks and open spaces is to be economically viable, prudent funding limitations require early land acquisition, well in advance of adjacent development. Unless it becomes necessary to correct a condition where a park deficiency is significantly depressing property values, public acquisitions of relatively expensive, developed land and/or removal of buildings are both strategies that are neither well-accepted, fiscally responsible, nor financially feasible.

Trends affecting demand - Parks, open space, and recreation facilities are obviously needed to serve all age groups. Further, the citizen demand for addressing this need is increasing with the growth of our population and changing social expectations. A number of trends have affected the volume of demand for recreational facilities:

- \* The increase in life span coupled with earlier retirement age broadens the service demand for recreational facilities,

especially for facilities serving the senior members of our communities.

- \* The increases in competitive sports activities, particularly for younger age groups, have increased the need for neighborhood park facilities.
- \* The increase in organized recreation program participation has increased the need for recreational facilities.
- \* Citizens expect more priority to be given by the public sector to creating a higher quality of life and providing greater environmental protection.

General design principals - The normal principles which generally apply to the design of most recreation areas and facilities include the following:

1. Active recreation areas should usually be separated according to the age of the users being served. If facilities for children are not separated according to age, the safety of younger children may be unnecessarily compromised; older children frequently tend to monopolize facilities. Certain areas should specifically be designed for use by family groups, which include all ages.

2. The recreation site should be accessible to the people who will use it. Generally the age of the user determines the size of the area served by a park facility. The service area of a neighborhood playground is generally limited to a radius of about a ½ mile, which is an easy and safe walking distance for most children. A facility designed to serve the entire family, with auto accessibility, normally serves a one to five mile area.
3. Where locally permissible, combined municipal and school recreation centers are a recommended and functionally appropriate. Recreational facilities should be combined with school facilities wherever possible to serve the educational and recreational needs of the local neighborhood. The two facilities are closely related and often their purposes, programs and activities overlap. Summertime use of the school's outdoor facilities allows for an economical expansion of the use. The adjacent park-school grounds should be specifically designed to be complementary and integrated.
4. Where possible, locational choices for recreation facilities should enhance opportunities for environmental protection by incorporating and respecting natural features that may otherwise be harmed by land development required for other uses.
5. Playground areas should be designed so as to create a play environment that enhances learning and aids in developing the total child. Playgrounds should provide the opportunity for a child to safely interact with the play environment at their own

level of development. Where possible, manipulative play opportunities should be provided, allowing the child to build, transport, and change their environment. Playground areas should also encourage development of the following: large and fine motor skills; eye-hand coordination; balance and locomotion skills; encouragement for children to learn about themselves in relation to the physical world; and opportunities for fantasy play, social development, and decision-making. Additionally, playground design should provide: a central vantage point for ease of supervision; shaded area for passive play; paved area for pavement games; grassy area for free play; a variety of challenge levels; opportunities for upper body development; and opportunities for learning about the natural environment.

Conventional planning criteria - A general criterion for a community's total required park area compared to the total population is one acre of developed park area for each 100 persons, or approximately 10 percent of the total developed area. According to the Texas Parks and Wildlife Department guidelines for outdoor recreational areas and facilities, Texas communities of 2,500 persons or less should have as a minimum, 25 acres of recreational land.



Local determination of standards - Recommendations for the type, size or number of facilities in a park should be based on an established set of standards, which are deemed by a given community to be acceptable, workable and practical. Various sets of standards have been adopted by local, state and federal agencies. There is no set of standards that are right for all communities. Like individuals, communities each have their own character, needs, strengths, and weaknesses. The park standards actually adopted by a community are an individual choice, depending upon specific preferences, various unique factors, and environmental opportunities of the community. No entity is better qualified to evaluate local needs than an informed community and its local leadership.

## **PLANNING PROCESS**

Assisted by professional planning consultants, the City of Leonard considered the basic park planning issues expressed in the forgoing introduction, and where possible, incorporated them into local planning process to determine its unique park and recreation opportunities and needs. Leonard began its most recent local planning effort by hiring SWC and MSC private consultant to assist with community development

planning and facility planning. Additionally, in August of 2005 meetings with City Council was held to refine local determination of needs.

After obtaining the above-described input, the final list of needs for the Leonard Park facilities was established.

An updated inventory and analysis of the existing facilities, and a basic needs assessment were then compared to: public input; previously assimilated information; population and growth projections; an analysis of Leonard's unique set of opportunities; and the basic park and recreation planning principals and standards outlined in the above introduction. Out of this comparison came a set of goals and objectives that reflected the locally determined standards and needs. The goals and objectives were then translated into a physical parks and open space plan along with implementation recommendations.

# **INVENTORY OF EXISTING FACILITIES & OPEN SPACE**

In June 2005 an inventory of the City's open space, parks and recreational facilities was conducted to determine the location, type and number of amenities offered to local citizens. The location of the existing Leonard park facilities as well as other park opportunities are graphically illustrated in Figure 10 and are listed in Table 10.

The City's existing park sites contain 59.8 acres. It should be noted that at least 46 acres of the park land falls into the open space category rather than area used for active sports and play areas. The parks serve the entire community.

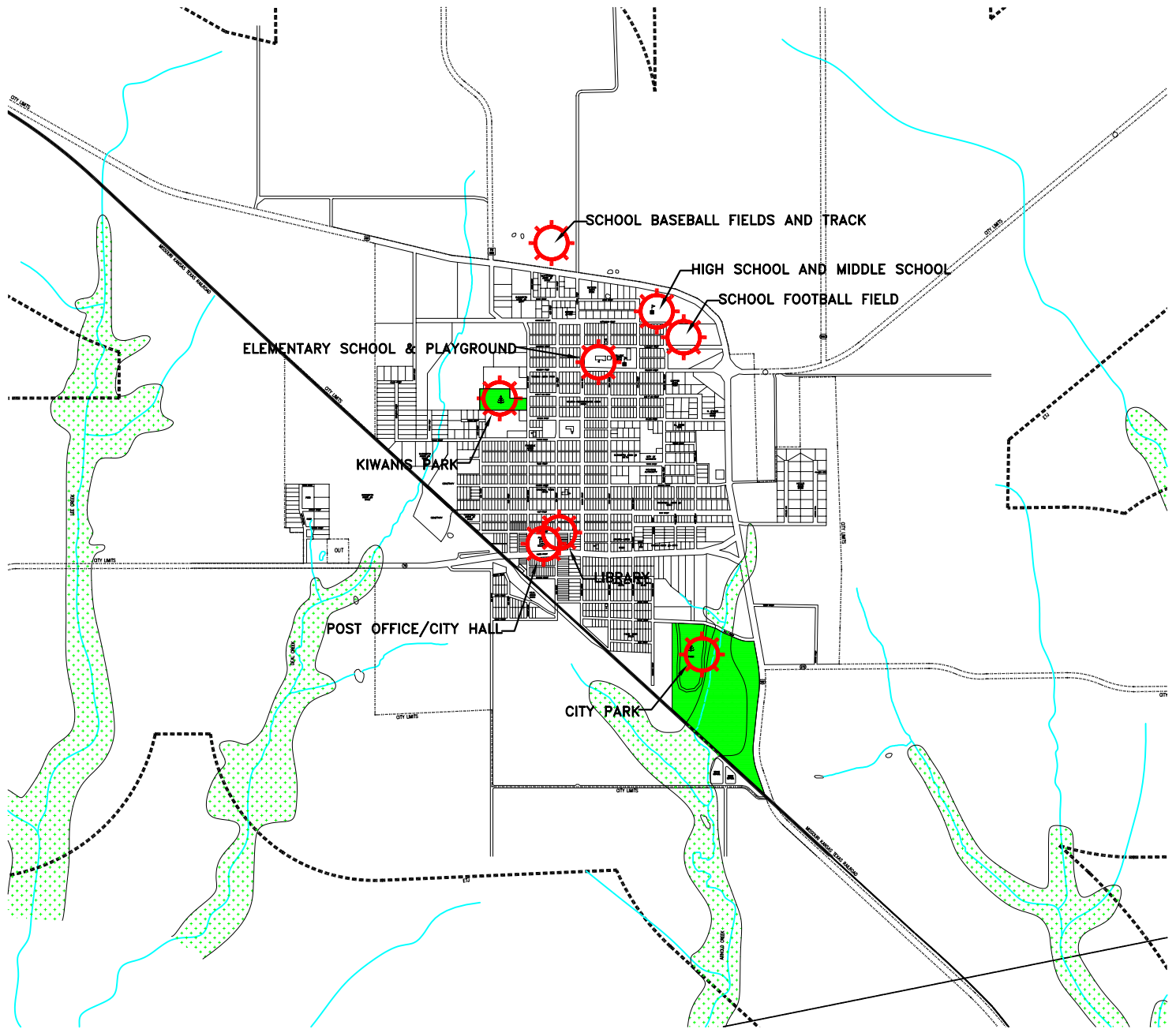
TABLE 9

## **CITY OF LEONARD**

### **PARK AND SCHOOL AND PRIVATE RECREATION INVENTORY**

#### **LEONARD CITY PARK**

- ♦ 1 - LIGHTED BALL FIELD
- ♦ 1 - UNLIGHTED BALL FIELD
- ♦ 1 - PICNIC PAVILION



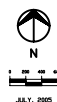
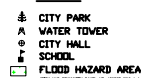
**CITY OF LEONARD**

**EXISTING OPEN SPACE  
& COMMUNITY FACILITIES**



FINANCED  
THROUGH THE  
OFFICE OF RURAL COMMUNITY AFFAIRS  
OF THE  
STATE OF TEXAS  
The preparation of this document was financed through  
provisions of a Texas Community Development Program  
Grant from the U.S. Department of Housing and Urban  
Development.

**LEGEND**



PREPARED THROUGH A JOINT VENTURE OF  
SOUTHWEST CONSULTANTS  
P.O. BOX 10000  
DALLAS, TEXAS 75208  
AND  
MAURICE SCHWABER & COMPANY  
10000 GULFVIEW BLVD.  
ARLINGTON, TEXAS 76010

- ♦ 1 – SOCCER FIELD
- ♦ PLAYGROUND
- ♦ WALKING/JOGGING TRAIL WITH EXERCISE STATIONS
- ♦ NATURAL AREA
- ♦ EQUESTRIAN AREA

#### **CITY PARK KIWANIS PARK**

- ♦ 1 – BASKETBALL GOAL
- ♦ 2 – BASEBALL DIAMONDS
- ♦ 2 - BENCHES
- ♦ 1 – CONCESSION STAND

#### **LEONARD ISD SCHOOL FACILITIES**

- ♦ 1 - FOOTBALL FIELD (UNLIGHTED) WITH BLEACHERS AND SCORE BOARD
- ♦ 1 - LIGHTED BASEBALL FIELD
- ♦ 1 - UNLIGHTED BASEBALL FIELDS
- ♦ 2 – UNLIGHTED TENNIS COURTS
- ♦ 5 – BASKETBALL GOALS
- ♦ 1- PLAYGROUND
- ♦ 1 – CLIMBING APPARATUS
- ♦ 1 – SET TRACTOR TIRES
- ♦ 2 – WOODEN BENCHES
- ♦ 1 – SLIDE
- ♦ 1 – SWING SET

It should be noted that school facilities are specifically designed for school needs, and are not intended to meet the demands and regulations of league play or to beautify the community. Additionally, the Golf Course is private therefore does not meet the needs of the general population of Leonard. No pedestrian/open space linkages exist for the school facilities.

The following existing features represent significant open space/linkage opportunities:

- (a) The floodplain areas associated with tributaries and main branches of Bear Creek, Lee Creek, Deal Creek, Arnold Creek, South Sulphur River, Mustang Creek, Burr Oak Creek, Sugar Loaf Bottom Creek, and Valley Creek.
- (b) Certain other vacant lands and right-of-way which could allow for future trail connections (see Figure 10).

Leonard is also served to a degree by some regional recreational facilities. Approximately 40 highway miles northwest of Leonard lies Lake Texhoma which offers significant open space, boating, fishing, and other water related recreational opportunities. About 25 miles (40 highway miles) to the northeast lies Caddo National Grassland.

Leonard' general population is not known to be served by any privately owned recreation facility. Private water related facilities associated with some of the region's lakes, but have limited public access and are not generally accessible to most Leonard citizens. Private facilities are also located in larger surrounding towns (such as Bonham, Sherman, McKinney, and Dallas), and are available only to those able and willing to travel the distances and pay the required entry fees/dues.

## **ANALYSIS/ NEEDS ASSESSMENT**

After reviewing: the natural features, opportunities, and inventory of facilities; the public input; and the general planning principles and generic standards included in the introduction, the following minimum standards/criteria for recreational facilities were locally determined to be appropriate for the City of Leonard to provide adequate recreation opportunities:

Open Space:	1 ac/100 pop. (in addition to all parks and schools)
Parks:	15 ac/1000 population (minimum of 25 acres)
Trails:	1 miles/1000 pop.
Passive Play:	1 ac/500 population
Baseball Fields:	1/500 population (L)
Tennis:	1 court/1000 population (L)
Beach Volleyball:	1 court/2000 population
Basketball:	1 court/500 population (L)
Soccer Fields:	1/2000 population (for each of 3 age groups)
Playgrounds:	1/200 children
Picnic Shelter:	1/2000 population
Picnic Tables:	1/100 pop. (in addition to shelter tables)
Comm. Center:	1/5000 population
Gazebo:	1/2000 population
Horseshoes:	1 set of pits/500 population
Shuffle Board:	1 court/1000 population
Skateboard Park	1 per total population
Splash Park	1 per total population

The City of Leonard has a current 2005 population of 2,122 people, and has a projected 2025 population of 3,150. It is not anticipated that the



demographic composition will change significantly. In addition to population demand, there are some important factors that should also be taken into account when considering need. The priority listing of problems are as follows:

- 1) The school recreation facilities are not intended or designed to meet the same objectives as a public park.
- 2) There is no open space system implemented for the greater Leonard area to provide additional recreation facilities for the future projected population.
- 3) There is no adequate pedestrian linkage between neighborhoods, schools and public parks and recreation facilities.
- 4) Inadequacy of some standards.

When taking the locally determined standards and opportunities into account, and comparing them to the existing and projected population, as well as the above-mentioned factors affecting need, it becomes evident that there are significant areas not addressed by the existing parks and recreation facilities.

Based on a 2005 population of 2,122 persons and a projected 2010 population of 2,340 the following facilities should be provided within 5

years, approximately 21 additional acres of parks and open space linkage needs to be provided and/or incorporated throughout the community, and roughly 1 miles of multi-use trails need to be constructed to connect the school campuses, parks, and neighborhoods into an integrated open space system. Other facilities within first 5 years include:

- 1 playgrounds;
- 14 picnic tables (with grills);
- 2 tennis court;
- 1 gazebo;
- 4 acres of passive play area;
- 3 basketball courts;
- 1 soccer field (3 fields to accommodate all age groups);
- 1 skateboard park;
- 1 splashpad;
- 4 horseshoe pits; and
- 2 shuffle board courts.

Within 10 years when the population approaches 2,590 the following facilities should be added: approximately 4 acres of new park land needs to be acquired and designated as a future parks. Additionally, the following recreational facilities should be provided and maintained:

- .5 more miles of trail section and node amenity (tying into citywide trail system);
- 2 picnic tables (with grills);
- .5 acres of passive play area;

TABLE 10

## CITY OF LEONARD

### NEEDED FACILITIES

FACILITY TYPE	NEEDS BY 2025	CURRENT FACILITIES	ADDITIONAL FACILITIES
OPEN SPACE	31 AC.	46 AC.	0 AC.
PARKS	31 AC.	13.8 AC.	17.2 AC.
TRAILS	3 MI.	1 MI.	2 MI.
PASSIVE PLAY	6.3 AC.	0	6.3 A.C.
BASEBALL FIELDS	6	3	3
TENNIS COURTS	3	0	3
BEACH VOLLEYBALL	2	0	2
BASKETBALL COURTS	6	1	5
SOCCER FIELDS	3	1	2
PLAYGROUNDS	4	1	3
PICNIC SHELTERS	1	1	0
PICNIC TABLES	31	9	22
COMMUNITY CENTERS	1	1	0
GAZEBO	1	0	1

HORSESHOE PITS	6	0	6
SHUFFLE BOARD COURTS	3	0	3
SKATEBOARD PARK	1	0	1
SPLASHPAD PARK	1	0	1

BASED ON NEEDS ASSESSMENT.

- 1 basketball court;
- 1 baseball fields;
- 1 playground

After 10 years more open space and any other deficiencies should be addressed to meet Table 10 guidelines.

## POSSIBLE OPPORTUNITIES

The Leonard community has a fortunate opportunity to create a system of parks and open space that will greatly enhance the quality of life of its existing and future citizens. The relative geographic distribution and arrangement of the features listed below combine to represent a pattern of opportunity for a cost-effective system of accessible park, open space, and recreational facilities: the environmentally sensitive floodplain areas

associated with tributaries and branches of Jordan Creek; vacant lands and right-of-way which could allow for future trail connections (see Figure 11); and, the relative locations of the existing school sites, and City park.

The location of each component of this comprehensive system opportunity is illustrated in Figure 11. The strong level of public participation and commitment in the City of Leonard will be the driving force to capitalize on this fortunate set of worthwhile opportunities.

## **GOALS, PLAN AND RECOMMENDATIONS**

### **Goals and Objectives**

Goals are clear, concise statements of **what** an individual or group desires to occur in the future with regard to a general topic of consideration. A goal does not determine how or when any action is to be performed, but does express a party's future intent. Goals may imply aggressive personal action or may call for mild encouragement of others to act. Goals may be

short or long range, or may be easy or difficult to reach. Goals may be extensions of trends from the past, maintain the present course, or chart completely new directions. Goals are always expressions of present desire, and should be periodically reviewed and adjusted.

Goals are best made by comparing what is with what is desired. Influences of opportunities and constraints, changing needs, and future trends must be taken into account when formulating goals.

A set of goals should create a balance between goals that are easy and goals that are difficult to achieve; however, goals are most potent when they clearly articulate an inspired vision of the future. Goal setters should be willing to dare to dream and share their visions. Inspirations may always be tempered with practicality, but practical thought is not often inspired. Clear, inspired, far reaching goals that articulate active new direction are the most difficult goals to formulate and achieve, but are worth the extra effort.

The results intended by achievement of goals to be set for Leonard recreation and open space planning includes the following:

- \* To provide for as many locally determined priority needs as possible.

- \* To establish new and different park and recreation opportunities within the Leonard jurisdiction and intended service area.
- \* To improve the geographic distribution/access of park and recreation opportunities.
- \* To maximize the use of development funds for basic park and recreation opportunities.
- \* To establish recreational facilities readily availability to minority and low-income citizens.
- \* To address the needs of all age groups, including the elderly and youth-at-risk.
- \* To involve the cooperation of other governmental jurisdictions.
- \* To involve land that would not otherwise be used for open space, park and/or recreation purposes, and to involve support by the private sector.

- \* To provide for acquisition, preservation, and conservation of park and recreation lands that provide needed open space.
- \* To promote conservation of natural resources by proposing the use of native plant materials and protection of natural waterways.
- \* To provide for strategic green belt linkages and improvements to historic areas.
- \* To maximize community support and private contribution.

The goals for the City of Leonard with regard to open space, parks, and recreation are listed below. Under each of the three overall goals are listed objectives that describe how the goal is to be achieved. The Goals and objectives should be attained by 2025.

**GOAL 1: Plan and acquire land and easements as necessary to appropriately expand Leonard's parks and open space system to meet the needs of area citizens.**



Objective 1.1: Obtain approximately 21 acres of park and open space land in close proximity to the urbanized area of Leonard. (Within five years)

Objective 1.2: Plan, acquire, fund, and construct the following recreation facilities in the secured land: 1 miles of multi-use trail section (with node amenities and planned in a manner to tie into the citywide open space/trail system); three basketball courts; one additional playgrounds; benches; two tennis courts; 14 picnic tables with grills; two shuffle board courts; four horseshoe pits; four baseball fields; one skateboard park; one splashpad park; one soccer complex; one gazebo; and parking facilities. (Within five years)

Objective 1.3: Develop innovative, cooperative funding strategies to properly maintain the existing and future parks and open space system. (Within five years)

**GOAL 2: Plan and acquire land and easements as necessary to appropriately expand Leonard's parks and open space system to meet the needs of area citizens.**

Objective 2.1: Formulate and begin implementation of an acquisition/donation plan for: (a) acquiring 4 plus acres of park land; (b) within certain right-of-ways, plan, acquire, fund, and construct .5 additional mile of multi-use trail section (with node amenities and planned in a manner to tie into the citywide open space/trail system); one basketball court; benches; 2 picnic tables with grills; one playground and parking facilities; (Within ten years)

Objective 2.2: Formulate and adopt policies and ordinances that protect the acquired/donated park land and open space easements. (Within five years)

### **Local Priority Needs**

In order to most effectively address the forgoing goals and objectives, the following local priority needs should be addressed in the order listed:

**LOCAL PRIORITY #1** – Obtaining Park Land.

**LOCAL PRIORITY #2** – Construction of a Gazebo.

**LOCAL PRIORITY #3** – Construction of a Skatepark.

**LOCAL PRIORITY #4** – Construction of a Splashpad Park.

**LOCAL PRIORITY #5** – Constructing Multi Use Trail System. (for more detail, see Design Guidelines in Physical Plan/Recommendations below).

**LOCAL PRIORITY #6** – Installing Picnic Tables and Grills.

**LOCAL PRIORITY #7** –Building Soccer Fields.

**LOCAL PRIORITY #8** – Constructing playgrounds.

**LOCAL PRIORITY #9** – Constructing basketball courts.

**LOCAL PRIORITY #10** – Constructing horseshoe pits and shuffleboard courts.

**LOCAL PRIORITY #11** - Add other recreational facilities as may be needed to meet the foregoing goals, objectives, and locally determined standards for recreation and open space which include tennis courts, horseshoe pits, shuffleboard courts and soccer fields.

In addressing the foregoing local priority needs, the plan and implementation sections below have been formulated and should be considered in relationship to the above goals section.

### **Physical Plan/Recommendations**

The purpose of the plan and recommendations is to provide community direction in a constantly changing environment. Under existing and currently projected conditions and circumstances, the City of Leonard's parks, open space, and recreational needs will be well satisfied if the various segments of the community will work together in organizing, programming, promoting, operating, and maintaining the existing and proposed facilities. The costs of private and public time and money will be well spent if the plan recommendations are followed and updated on a regular basis. Few things have so positive an effect on the

quality of life in a community as a well-executed plan for a community's parks, open space and recreation facilities.

Acceptance of these plan recommendations does not mean that every proposed facility will be built, rather it means that there is an overall vision which will guide specific short term decisions. Such individual decision-making processes too often lose sight of the larger, long range picture of the City of Leonard's possible future, but these recommendations should be helpful to future decision-making as each plan component is gradually considered for implementation or revision.

The physical recreation and open space plan for the City of Leonard is illustrated in Figure 11. The improvements included in the first four local priority needs should be specifically planned and met as recommended in the implementation section below. The programming of these improvements should be coordinated with the school district (and the school district should be encouraged to coordinate the programming and use of their recreational facilities with the City).



When specific implementation measures are being planned, specific design criteria should be developed and considered prior to purchasing equipment or beginning construction drawings.

The selection of play equipment for future playground areas and for playground upgrades should generally follow the guidelines described below:

**Site Safety:** All playground equipment should be located in a manner that observes the recommended use zones and fall zones, and should have the appropriate depth of resilient safety surfacing placed around and under the equipment. The surfacing material should not prevent reasonable access by persons with physical disabilities.

**Access and Egress:** Each play item should be accessible to the intended user and not overtax their developmental ability. Multi-component structures should provide for a variety of graduated skill levels for user access and egress. Handicapped access and use should be considered and evaluated for each play area.

Swings: Swings should only be placed in the play environment if they can be located out of the general path of safety. Where space permits, there should be a minimum of six swing positions provided for each playground area. A minimum of one swing position should be accessible to persons with physical disabilities. Swing toprail height should not exceed ten feet.

Slides: A variety of sliding experiences should be provided as either freestanding units part of a multi-component play structure. Freestanding slides should not be higher than six feet. Sliding poles are not recommended for children under the age of five. At least one sliding device should be accessible to persons with physical disabilities.

Climbers: A range of climbing opportunities should be made available that provide a variety of challenge levels. The climbing component's material, size, and direction of climb should vary. Climbers may also be used to promote socialization. A structure such as a geo dome allows several children to use it in different manners at the same time. Climbers offering opportunities for children to move their bodies in, out and through spaces are recommended. An accessible climber should be provided.



Balance and Movement: At least one type of balance activity should be provided in each play area. Balance equipment includes balance beams, net climbers, suspension bridges, chain walks, tunnels, and spring platforms.

Upper Body Development: At least one apparatus that increases upper body strength and coordination should be provided for each playground. Accessible apparatus should be provided. The apparatus may be freestanding or part of a multi-component play structure.

Design for the open space/trail system should consider the following general guidelines.

Open Space Width: Average of 30 feet with larger widths as needed and available at nodes.

Trail Width: 8 feet preferred; 6 feet minimum.

Trail Material: Asphalt or concrete.

Node locations: Shady, convenient areas at destinations or points of frequent trail access/egress.

Node Amenities: Lighting, drinking fountain, bench, seasonal plantings, change in paving pattern, and incorporation of existing trees for shade.

Street ROW Portions: Where possible, soften edges with tree and shrub plantings; provide adequate stripped-off lanes, or an 8-foot sidewalk, or a six-foot sidewalk with a 4-foot parkway between the curb and sidewalk.

Street Crossings: Stripe and sign for pedestrian crossing; provide handicap ramping.

Trail Drainage: Provide drains at low areas; slope to avoid puddling; where crossing drainage flow provide culverts or design to accommodate areas of sheet flow.

Interpretation: Provide markers at natural features of interest to relate to interpretive literature.

## **IMPLEMENTATION**

YEAR 1: Gather materials and donations and hire consultants to apply for a grant such as the Texas Recreation and Parks Account Program under the Texas Department of Parks and Wildlife grants-in aid program to begin implementation of local priorities #1 through #11.

COST: \$5,500

SOURCE OF FUNDS: City budget and/or donations.

YEARS 1-3: Plan and implement land acquisitions and trail related easements as required for LOCAL PRIORITY NEEDS #1 through #10.

COST: \$0 - \$500,000 (depends on negotiations and donor attitudes).

SOURCE OF FUNDS: Local donations, grant funds, local City CIP funds.

YEARS 2-5: Plan the improvements contained in LOCAL PRIORITY NEEDS #2 through #10:

COST OF ENGINEERING AND CONSTRUCTION DRAWINGS:  
\$15,000

FUNDING SOURCE: Grant from work accomplished in Year 1 above with matching to be achieved by donations of local area professionals, City personnel, volunteer labor, administrative labor, construction materials and supplies, and local tax and CIP funds. Also, the value of land/easements may be used in matching funds.

YEARS 3-8: Construct improvements contained in LOCAL PRIORITY NEEDS #2 through #10.

COST OF CONSTRUCTION:

Park Improvements - **\$950,000**

Trail Improvements - **\$150,000**

FUNDING SOURCE: Grant from work accomplished in Year 1 above with matching to be achieved by donations of local area professionals, City personnel, volunteer labor, administrative labor, construction materials and supplies, land and easement donations and local tax and CIP funds.

TOTAL BUDGET FOR DESIGN AND CONSTRUCTION (including grant application work) is anticipated to be \$1,100,000 of which the local match would be approximately \$600,000 worth of donated land, labor, equipment, materials, and cash since the State maximum is \$500,000 grant at this time for a project total of \$1,100,000.

# INTRODUCTION

An adequate transportation network is an essential goal for any city. The Movement of people to various locations within a city is a basic function of a municipality, especially in today's society. People need to be able to travel in an effective manner to work, schools, stores, churches, and many other locations. Perhaps the greatest single factor that accomplishes the goal of efficient movement of people is the street system within a city. A street conveys the vehicles that accommodate the movement of people in today's society. This element of the Community Development Plan will deal with the thoroughfares of Leonard and the overall Planning Area.

Thoroughfare and other rights-of-ways occupy over 45.2 percent of Leonard's total developed area and allow for circulation between all areas within the City. In addition to moving of traffic, streets provide access to and drainage for abutting properties, open space between buildings, and right-of-way for various utilities.

## **PURPOSE**

The chief function of the streets and thoroughfare development plan is to provide guidance in the size, location, classification, standardization, and improvement of streets and thoroughfare facilities. It offers a framework for orderly development that is responsive to present and future traffic demands within the community.

This plan is designed to establish an action oriented thoroughfare plan for the City of Leonard for the period 2005 to 2025. The Thoroughfare Development Plan examines the existing thoroughfare network, route continuity, existing land uses, major traffic generators, traffic volumes, signalized intersections and railroad grade crossings. The study area includes all lands currently incorporated by the City of Leonard as of July 2005, the extra territorial jurisdiction, and the immediately surrounding area.

This plan was developed in conjunction with anticipated area growth trends. It should not, however, be considered inflexible. On the contrary, the plan should be periodically reviewed and updated to guarantee that positive and dynamic responses are made to the ever changing needs of the community.

## EXISTING STREET NETWORK

An understanding of the existing street network is essential to the development of a coordinated street and thoroughfare plan. This section of the plan identifies the street network as they currently exist, and provides a benchmark for the future network.

In order to determine the current widths of street pavement sections of all streets and identify system deficiencies, a survey was undertaken. Data was gathered for every street in Leonard, including information on rights-of-way, pavement widths, surface composition, and the location of all curbs and gutters.

The results of the survey, graphically depicted in Figure 12 and catalogued in Table 11 indicates that most of the streets in Leonard have a paved surface of **less than 31'** and most **do not** have curbs and gutters. Figure 13 shows several streets in the City.

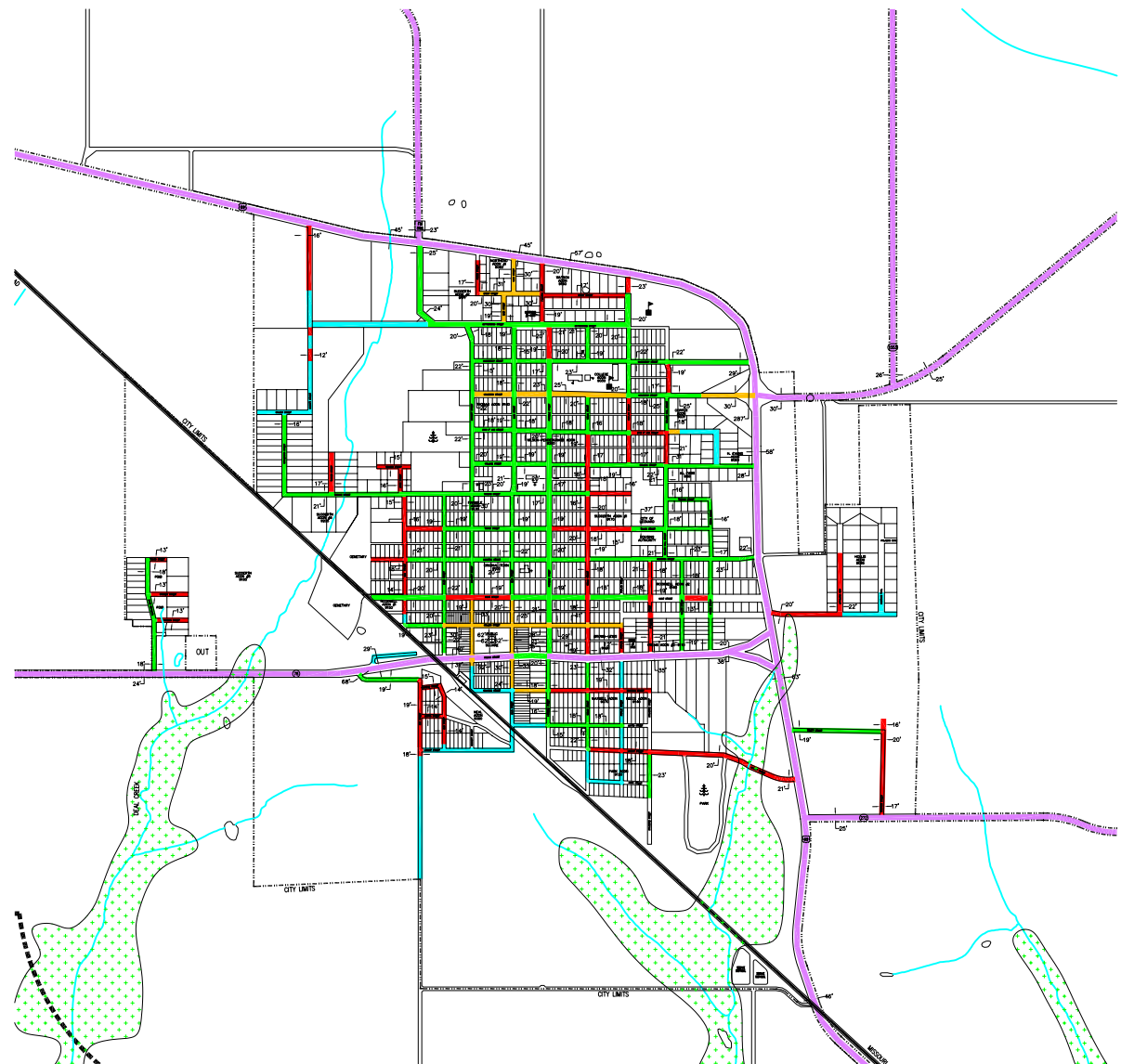
## STREET HIERARCHY

It is a well accepted principle that a roadway system contains a hierarchy of components, each promoting a different ratio of emphasis on traffic movement and property access. Different type roadways are intended to serve defined needs with a

STREET NAME	STREET SECTION	PAVEMENT WIDTH (FEET)	CURB AND GUTTER (YES/NO)	CONDITION
APALOSA WAY	ALL	22'	NO	POOR
AUSTIN STREET	MAIN TO PARMELE	15-18	NO	POOR
	PARMELE TO POPLAR	14'	NO	POOR
	OKM TO ELM	16'	NO	POOR
BARK STREET	ALL	16-18'	NO	POOR
BOB D'ARC ST.	CONNETT TO POPLAR	19-20'	NO	FAIR
CEADAR STREET	POPULAR TO WILLARD HALL	18'	NO	POOR
	COTTONWOOD TO HACKBERRY	19-20'	NO	FAIR
	MULBERRY TO BOB D'ARC	20'	NO	FAIR
	BOB D'ARC TO FANNIN	18-20'	NO	POOR
	FANNIN TO LOCUST	22-23'	NO	FAIR
COLLEGE STREET	LOCUST TO PARK	GRAVEL	NO	POOR
COLLINS STREET	ALL	17-28'	YES/NO	FAIR
	OKM TO ELM	19-23'	NO	FAIR
	ELM TO POPLAR	20-22'	YES/NO	GOOD
CONNETT STREET	COTTONWOOD TO HUNT	20-30'	NO	FAIR
	HUNT TO S. ROW OF FANNIN	33-35'	YES/NO	GOOD
	S. ROW OF FANNIN TO GRAY	GRAVEL	NO	POOR
COTTONWOOD ST.	GRIFFIT TO N. OKM	GRAVEL	NO	POOR
	N. OKM TO WILLARD HALL	16-20'	NO	FAIR
ELM STREET	THOMAS TO FANNIN	16-22'	NO	FAIR
	GRAYSON TO N. ROW OF LOCUST	14'	NO	POOR
	N. ROW OF LOCUST TO LOCUST	GRAVEL	NO	POOR
FANNIN STREET	WEST END TO MAIN	29-32'	YES/NO	GOOD
	MAIN TO PARMELE	33-35'	NO	FAIR
	PARMELE TO U.S. HWY 89	32-38'	NO	GOOD
FM 272	ALL	25'	NO	GOOD
FM 896	ALL	23'	NO	GOOD
FM 1553	ALL	28'	NO	GOOD
FRASER STREET	ALL	19'	NO	POOR
GOLDEN STREET	ALL	GRAVEL	NO	POOR
GRAYSON STREET	STATE HWY 78 TO OKM	19-28'	NO	FAIR
	OKM TO ELM	15'	NO	POOR
	CONNETT TO MAIN	GRAVEL	NO	POOR
	MAIN TO PARMELE	18'	NO	GOOD
GRIFFIT STREET	U.S. HWY 89 TO N. ROW OF	16'	NO	GOOD
COTTONWOOD	N. ROW OF COTTONWOOD TO	GRAVEL	NO	POOR
COTTONWOOD	COTTONWOOD TO GOLDEN	GRAVEL	NO	POOR
HACKBERRY ST.	PAVEMENT 12'	15-20'	NO	FAIR
HOUSTON STREET	CONNERY TO OKM	18'	NO	POOR
	OKM TO U.S. HWY 89	16-23'	NO	FAIR
HUNT STREET	R.K. TO ELM	20'	NO	POOR
	ELM TO MAIN	19-22'	NO	POOR
	MAIN TO SYCAMORE	16-19'	NO	FAIR
JACKSON STREET	WILLOW TO END	13'	NO	POOR
LOCUST STREET	OKM TO MAIN	GRAVEL	NO	POOR
MAIN STREET	CEADAR TO U.S. HWY 89	18-21'	NO	POOR
	HWY 89 TO COTTONWOOD	19-20'	YES/NO	GOOD
	COTTONWOOD TO HUNT	16-22'	NO	FAIR
	HUNT TO GRAYSON	20-22'	YES/NO	GOOD
	GRAYSON TO LOCUST	GRAVEL	NO	POOR
MULBERRY STREET	CONNETT TO POPLAR	22-25'	NO	GOOD
	POPULAR TO E. ROW OF	23'	NO	FAIR
	E. ROW OF WILLARD HALL	30'	NO	GOOD
	TO HWY 89	GRAVEL	NO	POOR
MUSTANG TRAIL	ALL	24-25'	NO	FAIR
N. OKM STREET	THOMAS TO N. ROW OF COLLINS	14-18'	NO	POOR
OKM STREET	N. ROW OF COLLINS TO COLLINS	GRAVEL	NO	POOR
	OKM & S. ROW OF LOCUST	16-19'	NO	POOR
	S. OF LOCUST TO S. CITY LIMITS	GRAVEL	NO	POOR
PALMBO DR.	U.S. HWY 89 TO APALOSA WAY	20'	NO	POOR
PARK STREET	APALOSA WAY TO E. END	GRAVEL	NO	POOR
PARKE STREET	ALL	17'	NO	POOR
PARMELE STREET	HWY 89 TO HACKBERRY	19-21'	NO	POOR
	HACKBERRY TO AUSTIN	16-21'	NO	FAIR
PECAN STREET	ALL	16-20'	NO	FAIR
POPULAR STREET	U.S. HWY 89 TO SHORT	22'	NO	POOR
	SHORT TO MULBERRY	20'	NO	GOOD
	MULBERRY TO COLLEGE	17-18'	NO	POOR
	COLLINS TO FANNIN	12'	NO	POOR
	FANNIN TO PARK	GRAVEL	NO	POOR
SHORT STREET	PARKE TO PARMELE	9-11'	YES/NO	GOOD
	PARMELE TO POPLAR	17'	NO	POOR
STANLEY STREET	ALL	13'	NO	POOR
STATE HWY 78	ALL	24-30'	NO	GOOD
SULPHUR STREET	ALL	16-20'	NO	POOR
SUNBOW BLVD	WILLARD HALL TO E. ROW OF	16'	NO	GOOD
WILLARD HALL	E. ROW OF WILLARD HALL TO	GRAVEL	YES/NO	POOR
	SOUTH END			
SYCAMORE STREET	HOUSTON TO FANNIN	18-21'	NO	FAIR
	LOCUST TO DEADEND	23'	NO	POOR
THOMAS STREET	GOLDEN TO CEDAR	16-21'	NO	FAIR
	CEADAR TO END	16'	NO	POOR
	WILLARD HALL TO PECAN	16'	NO	FAIR
TRAVIS STREET	WESTLAKE TO E. END	13'	NO	POOR
	OKM TO ELM	16'	NO	POOR
	ELM TO PARMELE	19'	NO	FAIR
	PARMELE TO N. END OF	15-20'	NO	POOR
	HOUSING AUTHORITY			
	W. END OF HOUSING AUTHORITY	16-37'	YES/NO	FAIR
	TO PECAN			
TRINITY STREET	ALL	19'	NO	FAIR
TUCKER STREET	ALL	17'	NO	POOR
U.S. HWY 89	ALL	42-53'	NO	GOOD
WESTLAKE DRIVE	ALL	18'	NO	FAIR
WILLARD HALL ST.	HACKBERRY TO MULBERRY	17-19'	NO	GOOD
	MULBERRY TO BOB D'ARC	17-21'	NO	FAIR
	BOB D'ARC TO COLLEGE	21'	NO	POOR
	COLLEGE TO HOUSTON	21'	NO	FAIR
WILLOW STREET	ALL	18-19'	NO	FAIR

## EXISTING STREET SYSTEM

- TYPE A ASPHALT SURFACE IN GOOD CONDITION WITH A MINIMUM RIGHT-OF-WAY OF 70 FEET AND A MINIMUM OF 24 FEET OF PAVEMENT.
- TYPE B ASPHALT SURFACE IN GOOD CONDITION WITH A MINIMUM RIGHT-OF-WAY OF 50 FEET AND A MINIMUM OF 18 FEET OF PAVEMENT.
- TYPE C ASPHALT SURFACE IN FAIR CONDITION WITH A MINIMUM RIGHT-OF-WAY OF 30 FEET AND A MINIMUM OF 12 FEET OF PAVEMENT.
- TYPE D ASPHALT SURFACE IN POOR CONDITION WITH A MINIMUM RIGHT-OF-WAY OF 30 FEET AND A MINIMUM OF 12 FEET OF PAVEMENT.
- TYPE E UNIMPROVED ROADWAY CONSISTING OF DIRT OR GRAVEL.
- CURB & GUTTERS



## CITY OF LEONARD



0 20 40 60

JULY, 2005

### LEGEND

- CITY PARK
- WATER TOWER
- CITY HALL
- SCHOOL
- FLOOD HAZARD AREA

FINANCED THROUGH THE OFFICE OF RURAL COMMUNITY AFFAIRS OF THE STATE OF TEXAS  
The preparation of this document was financed through provisions of a Texas Community Development Grant from the U.S. Department of Housing and Urban Development.

PREPARED THROUGH A JOINT VENTURE OF  
SOUTHWEST CONSULTANTS  
P.O. BOX 830634  
HOUSTON, TEXAS  
AND  
MAURICE SCHWAB & COMPANY  
1809 SOUTHMOOD BLVD.  
ARLINGTON, TEXAS



specific balance between movement and access. Various roadway categories have evolved over time. The categories range from a freeway, which places total emphasis on through traffic movement, to a local street whose primary function is access to adjacent property.

**TABLE 11**  
**CITY OF LEONARD**  
**STREET LIST**

STREET NAME	STREET SECTION	PAVEMENT	CURB AND	CONDITION
		WIDTH FEET)	GUTTER (YES/NO)*	
APPALOSA WAY	ALL	22'	NO	POOR
AUSTIN STREET	MAIN TO PARMELE	GRAVEL	NO	POOR
	PARMELE TO POPLAR	15'-18'	NO	FAIR
	OAK TO ELM	14'	NO	POOR
BARR STREET	ALL	16'	NO	POOR
BOIS D' ARC ST.	CONNETT TO POPLAR	16'-18'	NO	FAIR
	POPLAR TO WILLARD HALL	18'	NO	POOR
CEDAR STREET	COTTONWOOD TO HACKBERRY	19'-20'	NO	FAIR
	MULBERRY TO BOIS D' ARC	20'	NO	FAIR
	BOIS D' ARC TO FANNIN	18'-20'	NO	POOR
	FANNIN TO LOCUST	22'-23'	NO	FAIR
	LOCUST TO PARK	GRAVEL	NO	POOR

**TABLE 11 CONTINUED**  
**CITY OF LEONARD**  
**STREET LIST**

STREET NAME	STREET SECTION	PAVEMENT WIDTH FEET)	CURB AND GUTTER (YES/NO)*	CONDITION
COLLEGE STREET	ALL	17'-28'	YES/NO	FAIR
COLLINS STREET	OAK TO ELM	19'-23'	NO	FAIR
	ELM TO POPLAR	25'-62'	YES/NO	GOOD
CONNETT STREET	COTTONWOOD TO HUNT	20'-30'	NO	FAIR
	HUNT TO S. ROW OF FANNIN	33'-62'	YES/NO	GOOD
	S. ROW OF FANNIN TO GRAY.	GRAVEL	NO	POOR
COTTONWOOD ST.	GRIFFIT TO N. OAK	GRAVEL	NO	POOR
	N. OAK TO WILLARD HALL	18'-20'	NO	FAIR
ELM STREET	THOMAS TO FANNIN	19'-22'	NO	FAIR
	GRAYSON TO N. ROW OF LOCUST	14'	NO	POOR
	N. ROW OF LOCUS TO LOCUST	GRAVEL	NO	POOR
FANNIN STREET	WEST END TO MAIN	29'-62'	YES/NO	GOOD
	MAIN TO PARMELE	33'-35'	NO	FAIR
	PARMELE TO U.S. HWY 69	32'-38'	NO	GOOD

FM 272	ALL	25'	NO	GOOD
FM 896	ALL	23'	NO	GOOD
FM 1553	ALL	26'	NO	GOOD

**TABLE 11 CONTINUED**  
**CITY OF LEONARD**  
**STREET LIST**

STREET NAME	STREET SECTION	PAVEMENT	CURB AND	CONDITION
		WIDTH FEET)	GUTTER (YES/NO)*	
FRASER STREET	ALL	15'	NO	POOR
GOLDEN STREET	ALL	GRAVEL	NO	POOR
GRAYSON STREET	STATE HWY 78 TO OAK	19'-68'	NO	FAIR
	OAK TO ELM	15'	NO	POOR
	CONNETT TO MAIN	GRAVEL	NO	POOR
	MAIN TO PARMELE	18'	NO	GOOD
GRIFFITT STREET	U.S. HWY 69 TO N. ROW OF	16'	NO	POOR
COTTONWOOD	N. ROW OF COTTONWOOD TO	GRAVEL	NO	POOR
COTTONWOOD	COTTONWOOD TO GOLDEN	GRAVEL/	NO	POOR
		PAVEMENT 12'		
HACKBERRY ST.	ALL	15'-29'	NO	FAIR
HOUSTON STREET	CEMETERY TO OAK	18'	NO	POOR
	OAK TO U.S. HWY 69	19'-23'	NO	FAIR
HUNT STREET	R.R. TO ELM	20'	NO	FAIR

ELM TO MAIN	19'-22'	NO	POOR
MAIN TO SYCAMORE	16'-19'	NO	FAIR
WILLOW TO END	13'	NO	POOR

**TABLE 11 CONTINUED**  
**CITY OF LEONARD**  
**STREET LIST**

STREET NAME	STREET SECTION	PAVEMENT	CURB AND	CONDITION
		WIDTH FEET)	GUTTER (YES/NO)*	
JACKSON STREET	ALL	13'	NO	POOR
LOCUST STREET	OAK TO MAIN	GRAVEL	NO	POOR
	CEDAR TO U.S. HWY 69	18'-21'	NO	POOR
MAIN STREET	HWY 69 TO COTTONWOOD	19'-30'	YES/NO	GOOD
	COTTONWOOD TO HUNT	18'-22'	NO	FAIR
	HUNT TO GRAYSON	20'-62'	YES/NO	GOOD
	GRAYSON TO LOCUST	GRAVEL	NO	POOR
MULBERRY STREET	CONNETT TO POPLAR	22'-25'	NO	GOOD
	POPLAR TO E. ROW OF	25'	NO	FAIR
	E. ROW OF WILLARD HALL	30'	NO	GOOD
	TO HWY 69			
MUSTANG TRAIL	ALL	GRAVEL	NO	POOR
N. OAK STREET	ALL	24'-25'	NO	FAIR

**TABLE 11 CONTINUED**  
**CITY OF LEONARD**  
**STREET LIST**

STREET NAME	STREET SECTION	PAVEMENT	CURB AND	CONDITION
		WIDTH FEET)	GUTTER (YES/NO)*	
OAK STREET	THOMAS TO N. ROW OF COLLINS	14'-15'	NO	POOR
	N ROW OF COLLINS TO COLLINS	GRAVEL	NO	POOR
	OAK S. TO S. ROW OF LOCUST	18'-19'	NO	POOR
	S. OF LOCUST TO S. CITY LIMITS	GRAVEL	NO	POOR
PALIMINO DR.	U.S. HWY 69 TO APPALOSA WAY	20'	NO	POOR
	APPALOSA WAY TO E. END	GRAVEL	NO	POOR
PARK STREET	ALL	GRAVEL	NO	POOR
PARKS STREET	ALL	17'	NO	POOR
PARMELE STREET	HWY 69 TO HACKBERRY	19'-21'	NO	POOR
	HACKBERRY TO AUSTIN	16'-21'	NO	FAIR
PECAN STREET	ALL	16'-20'	NO	FAIR
POPLAR STREET	U.S. HWY 69 TO SHORT	23'	NO	POOR
	SHORT TO MULBERRY	20'	NO	GOOD
	MULBERRY TO COLLEGE	17'-18'	NO	POOR

COLLINS TO FANNIN	12'	NO	POOR
FANNIN TO PARK	GRAVEL	NO	POOR

**TABLE 11 CONTINUED**  
**CITY OF LEONARD**  
**STREET LIST**

STREET NAME	STREET SECTION	PAVEMENT	CURB AND	CONDITION
		WIDTH FEET)	GUTTER (YES/NO)*	
SHORT STREET	PARKS TO PARMELE	0'-31'	YES/NO	GOOD
	PARMELE TO POPLAR	17'	NO	POOR
STANLEY STREET	ALL	13'	NO	POOR
STATE HWY 78	ALL	24'-30'	NO	GOOD
SULPHUR STREET	ALL	16'-20'	NO	POOR
SUMROW BLVD	WILLARD HALL TO E. ROW OF	18'	NO	GOOD
WILLARD HALL	E. ROW OF WILLARD HALL TO	GRAVEL	YES/NO	POOR
	SOUTH END			
SYCAMORE STREET	HOUSTON TO FANNIN	18'-21'	NO	POOR
	LOCUST TO DEADEND	23'	NO	FAIR
THOMAS STREET	GOLDEN TO CEDAR	16'-21'	NO	FAIR
	CEDAR TO END	16'	NO	POOR
	WILLARD HALL TO PECAN	16'	NO	FAIR

**TABLE 11 CONTINUED**  
**CITY OF LEONARD**  
**STREET LIST**

STREET NAME	STREET SECTION	PAVEMENT	CURB AND	CONDITION
		WIDTH FEET)	GUTTER (YES/NO)*	
TRAVIS STREET	WESTLAKE TO E. END	13'	NO	POOR
	OAK TO ELM	16'	NO	POOR
	PARMELE TO W. END OF HOUSING AUTHORITY	15'-20'	NO	POOR
	W. END OF HOUSING AUTHORITY TO PECAN	18'-37'	YES/NO	FAIR
TRINITY STREET	ALL	19'	NO	FAIR
TUCKER STREET	ALL	17'	NO	POOR
U.S. HWY 69	ALL	45'-63'	NO	GOOD
WESTLAKE DRIVE	ALL	18'	NO	FAIR
WILLARD HALL ST.	HACKBERRY TO MULBERRY	17'-19'	NO	POOR
	MULBERRY TO BOIS D' ARC	17'-21'	NO	FAIR
	BOIS D' ARC TO COLLEGE	21'	NO	POOR
	COLLEGE TO HOUSTON	21'	NO	FAIR

WILLOW STREET

ALL

18'-19'

NO

FAIR

FIGURE 13

**CITY OF LEONARD**  
STREET PICTURES





The street classification used in this plan are defined by the National Committee on Urban Transportation. The following four categories are recommended:

Freeway or Expressway (Major Highway) -- This classification devotes total emphasis to the movement of traffic with little or no access to adjacent land. It is characterized by some degree of access control and normally is used for longer trip lengths at higher speeds. It serves the major centers of activity and high volume traffic corridors. The network formed is integrated and generally offers connections to areas outside the immediate study area.

No thoroughfares meet this criteria at this time. If the talked about Trans-Texas Corridor is established in this area then an impact will be felt as it appears it traverses the southwestern edge of Fannin County just west of the City of Leonard. The Trans Texas Corridor is an all-Texas superhighway that is planned to include tollways for passenger vehicles and trucks, passenger bullet trains, commuters trains, high-speed freight trains, pipelines of all types, and electrical transmission towers. Plans also include gas stations, garages, restaurants, hotels, stores, billboards, warehouses, freight interchange, intermodal transfer areas, passenger train stations, bus stations, parking facilities, dispatch control centers, maintenance facilities, pipeline pumping stations, and of course, toll booths.

The Trans Texas Corridor is the largest engineering project ever proposed for Texas. This statewide network of corridors will stretch 4,000 miles and measure up to 1,200 feet wide.

**Major Collector** -- Major Collector streets serve major movements of traffic within an urbanized area while still providing some degree of access to adjacent property. They generally move high volumes of traffic through the City and provide access to the freeway and expressway network.

**Minor Collector** -- The primary function of minor collector streets is to provide land access with secondary function of traffic movement. Basically it "collects" traffic from local areas and distributes it to the major collector network.

**Local Street** -- The primary function of local streets is property access. They are normally short in length and compose the highest percentage of total street miles within the City. Local streets are designed to serve low traffic volumes. Through traffic movement should be discouraged. Depending upon the type of area served, and the service demands placed upon them, local streets may be subcategorized as residential, industrial and business.

Criteria and guidelines for the designation of specific facility types within each street classification are shown in Table 12.

TABLE 12

**CITY OF LEONARD****CHARACTERISTICS OF STREET CLASSIFICATIONS**

<u>Characteristics</u>	<u>Major Highway</u>	Major	Minor	<u>Local</u>
		<u>Collector</u>	<u>Collector</u>	
Average Trip Length	>3 miles	>1 mile	<1 mile	<1/2 mile
Travel Speed	70 mph	25-45	20-30	25
Access Control	Partial	Partial	Partial	Minimum
Spacing	NA	1 mile	1/2 mile	300-500 ft.
Traffic Volumes (000's)	10-50	2-10	1-2	.1-2
Traffic Controls	Free Flow	Signals	Stop Signs	Yield Signs

Each street within the City assumes certain characteristics based on the way it is used.

This accommodates a classification hierarchy upon which an overall thoroughfare network may develop. An important point to realize is that some streets are not suitable for some classifications due to adjacent land uses, etc. The classification system, in conjunction with "sound" planning principles and methods will satisfy the demands of roadway users and will prevent a breakdown of the total thoroughfare

system, or parts thereof.

Many streets have become major traffic routes because of usage in their past history, their length, and their surface condition. As an example, a street may come to be used as a major route since it traverses a long distance and is continuous. Such streets tend to adopt a functional classification, which often becomes permanent. If that street is not suitable as a major route, or if there is resistance to expanding the facility to properly accommodate the demand, it is very difficult to revert its usage to a lesser classification. Such attempts tend to disrupt existing traffic flows, but do not necessarily discourage its use. Due to natural growth in the area, traffic usually increases which results in congestion. Therefore, it is important that the existing street network be carefully examined, a network classification be assigned and a planned program of implementation pursued.

## **ROUTE CONTINUITY**

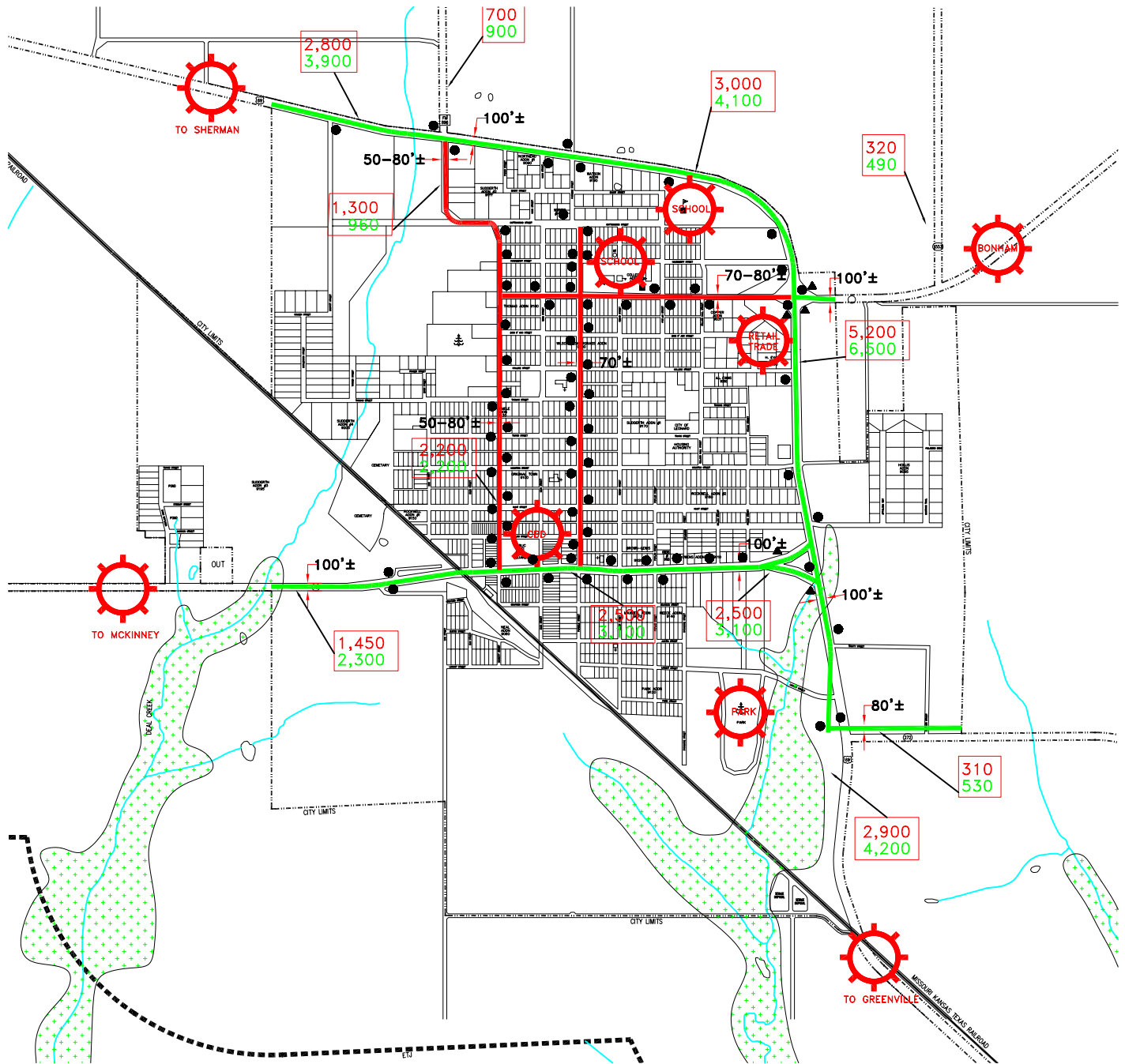
Many of the streets in Leonard lack the desired overall network continuity because of offsets or physical barriers such as the Railroad and U.S. 69. At other points, it is due to the original layout of the street network and the subsequent development, which has taken place within the City. The lack of system-wide continuity places limitations on

the traffic capacity and the function of the overall network.

## **LAND USES AND MAJOR TRAFFIC GENERATORS**

Leonard contains a well-rounded mix of land uses. The Future Land Use Plan that has been developed includes the Thoroughfare Plan. A Central Business District, recreational facilities, the school system all complement the residential areas of the community. No traffic control data or origin destination information was available. Vehicle trips within the City, resulting from population demand, and trips originating from outside the City for work, recreation and educational purposes, have placed relatively high traffic volumes on all of Leonard's major streets.

An analysis of the existing street network must consider the major traffic generators within the City, which influence the traffic volumes and flow patterns. The locations of major traffic generators within the City are shown in Figure 14. The major local traffic generators in Leonard include the schools, retail areas, and the central business district. Currently, the generators are adjacent to or are in close proximity to existing major and minor collector streets. This close proximity scheme should continue with the development of the thoroughfare plan. This will allow for the continued concentration of vehicular trips along major routes without negatively impacting local streets. Table 13 provides a listing of the current thoroughfares indicating Pavement



## EXISTING THOROUGHFARE INFORMATION

**EXISTING MAJOR COLLECTOR**  
**EXISTING MINOR COLLECTOR**

**18,400**  
**19,400**  
**1993 TRAFFIC COUNTS**  
**2003 TRAFFIC COUNTS**



**MAJOR TRAFFIC GENERATORS**

**80'±**

**RIGHTS-OF-WAY WIDTHS**



**STOP SIGNS**



**YIELD SIGNS**

## LEGEND

- CITY PARK
- WATER TOWER
- CITY HALL
- SCHOOL
- FLOOD HAZARD AREA

## CITY OF LEONARD



0 200 400 600

JULY, 2005

FINANCED  
 THROUGH THE  
 OFFICE OF RURAL COMMUNITY AFFAIRS  
 OF THE  
 STATE OF TEXAS

The preparation of this document was financed through provisions of a Texas Community Development Program Grant from the U.S. Department of Housing and Urban Development.

PREPARED THROUGH A JOINT VENTURE OF  
 SOUTHWEST CONSULTANTS  
 P.O. BOX 850634  
 RICHARDSON, TEXAS  
 AND  
 MAURICE SCHWANKE & COMPANY  
 1209 SOUTHWOOD BLVD.  
 ARLINGTON, TEXAS

widths and conditions.

**TABLE 13**  
**CITY OF LEONARD**  
**EXISTING THOROUGHFARES**

EXISTING THOROUGHFARE NAME	APPROXIMATE WIDTH OF R.O.W./PAVEMENT	SURFACE CONDITION
U.S. HIGHWAY 69	100'± 45-63'±	ASPHALT GOOD
STATE HIGHWAY 78 (FANNIN STREET)	100'± 29-62'±	ASPHALT GOOD
FARM TO MARKET HIGHWAY NUMBER 272	80'± 25'±	ASPHALT GOOD
SPUR 221 CONNETT STREET	50'-80'± 33-62'±	ASPHALT - BRICK GOOD
PARMELE STREET	70'± 16'-21'±	ASPHALT GOOD
MULBERRY STREET	70'-80'± 22-30'±	ASPHALT GOOD TO POOR
FARM TO MARKET HIGHWAY NUMBER 896	70'-80'± 23'±	ASPHALT GOOD
FARM TO MARKET HIGHWAY NUMBER 1533	70'-80'± 26'±	ASPHALT GOOD

Within Leonard no Truck routes have been designated. Trucks are allowed to traverse the City on all streets at this time. The City should consider adopting

ordinances that restrict the through travel of trucks and the parking of trucks on streets (especially residential streets) that are classified as local streets. Additionally, no parking restrictions along streets currently exist. The location of Traffic Control devices on existing identified thoroughfares are shown on Figure 14.

Table 14 provides a guideline for daily vehicle trips for the major land use categories.

Table 14  
**CITY OF LEONARD**  
TRIP GENERATION BY LAND USE

<b>LAND USE</b>	<b>TRIPS PER UNIT</b>
<u>Residential</u>	
Single Family Detached	10 each unit
Duplex/Townhouse	5.2 each unit
Multi-Family	6.1 each unit
<u>Commercial &amp; Office</u>	
Specialty Retail Center	40.7/1000 s.f.
Restaurant	82.0/1000 s.f.
Drive-in Restaurant	74.9/1000 s.f.
Service Station	748/station
Supermarket	125/1000 s.f.
24 hour Open Convenience	625.5/1000 s.f.
General Office	12.3/1000 s.f.
Medical Office	54.6/1000 s.f.
Post Office	139.7/1000 s.f.



Office Park	20.6/1000 s.f.
<u>Industrial</u>	
light Industrial	5.4/1000 s.f.
Heavy Industrial	1.5/1000 s.f.
Industrial Park	7.0/1000 s.f.
Manufacturing	3.8/1000 s.f.

\*Average Weekday Trip based on ITE Trip Generation Tables.

## EXISTING TRAFFIC VOLUMES

The ability of a street to satisfy traffic demands placed upon it is a measure of how well it operates. If a street is used as an arterial but is limited by its size, congestion is likely to occur. When congestion becomes severe enough, the users begin seeking alternative routes. Depending upon the alternate route's capacity, or traffic carrying ability, it too may become congested and function improperly.

Traffic volumes along an existing route provide an indication of how well the system is serving traffic demands. An understanding of the traffic volumes is necessary in evaluating street and intersection capacities and efficiencies.

## GEOMETRIC DESIGN STANDARDS

Roadway geometric design standards are composed of various elements, which affect the functional operation of street facilities. Each major element is discussed in detail and specific standards are presented.

Consideration for changes will be given when existing topographic features prohibit reasonable use of specified design requirements. A request for such changes must be made in accordance with requirements in the adopted Subdivision Rules and Regulations, which indicate the minimum acceptable design standards.

## **DESIGN ELEMENTS & THOROUGHFARE ANALYSIS**

The design elements set forth specific goals for thoroughfares within Leonard in comparison to existing thoroughfare conditions.

### **RIGHT-OF-WAY**

Right-of-way width is generally determined by the pavement section (roadway type) required to perform the function for which the thoroughfare is designed. Considerations may also include safety areas, sidewalks, utility locations and other functions. Right-of-way widths for each roadway classification are shown in Table 15.

## **LANE WIDTHS**

Driving lane widths are generally 11 feet to 13 feet. The standards shown in Table 15 for Minor and Major Collectors do not accommodate curb lane parking and are based upon the premise that full widths, as shown, should be totally usable for moving traffic.

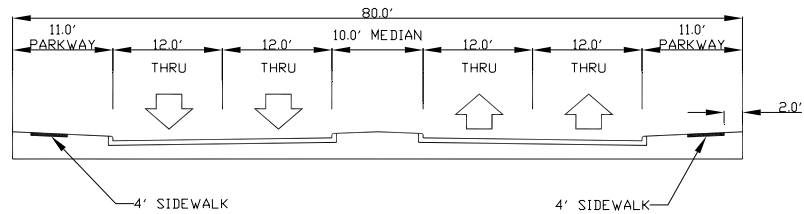
TABLE 15  
RIGHT-OF-WAY WIDTHS  
**CITY OF LEONARD**

Roadway	No.	Right-of-Way Width	
<u>Classification</u>	<u>Lanes</u>	<u>Normal</u>	<u>Minimum</u>
Major Collector Streets	4	90'	80'
Minor Collector Streets	2	60'	60'
Local (Residential)	2	50'	50'

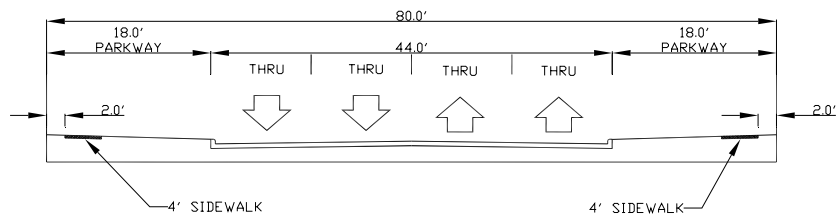
\*90' minimum will be required at major intersections.

FIGURE 15  
**CITY OF LEONARD**  
STREET SECTIONS

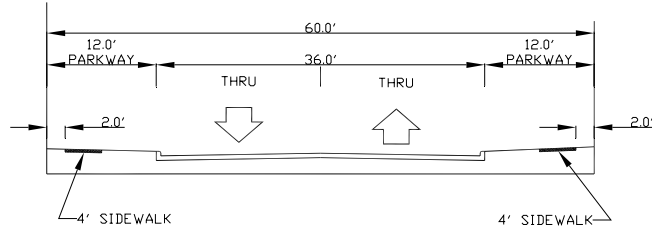
## MAJOR COLLECTOR DIVIDED



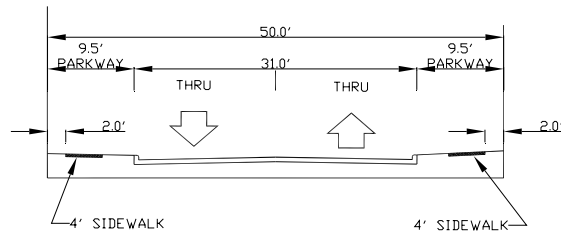
## MAJOR COLLECTOR UNDIVIDED



## MINOR COLLECTOR



## RESIDENTIAL STREET



Major Collectors are recommended to be divided or undivided streets with 2 - 24 feet wide from back of curb to back of curb sections. Minor Collectors are recommended to

be undivided streets with 36 feet wide from back of curb to back of curb sections. Local streets are 31 feet back of curb to back of curb with parking permitted.

### **DESIGN SPEED**

Design speed is that speed chosen for the design of a street and the related physical features of a roadway, which influence vehicle operation. These design features include such items as roadway curvature, sight distance and grades. Normally, design speeds are higher on higher-level functional classifications and are higher than the expected running speed of the traffic in order to provide a margin of safety in the design of facilities.

TABLE 16  
DESIGN SPEED

## CITY OF LEONARD

Roadway Classification	Range of Design Speed (MPH)	Average Running Speed (MPH)
Outlying Undeveloped Areas	40-55	40-45
Major Collector	35-40	30-40
Minor Collector	25-35	20-30
Local Street	25-35	20-30

### **Roadway Access Management**

The basic objective of access management is to protect the utility (functional ability) of a roadway. This general objective encompasses specific goals such as:

- \* To preserve or improve roadway capacity and expedite traffic flow.
- \* To reduce traffic hazards and potential accidents.
- \* To achieve the best possible balance of benefits among the property owner, the roadway user and the community at large.
- \* To protect public investment by preventing premature dysfunctioning.
- \* To improve the appearance of a roadway and its adjacent area.

The basic interrelationship between landowners and transportation facilities is

illustrated by a continuous cycle of activities. This cycle begins with land use and continues with: on site activities generating trips; trips connecting points of origin and destination and therefore, defining transportation needs; transportation facilities providing additional access to land; land values increasing; more development being placed on the land, and then the cycle begins anew.

It is important that thoroughfare facilities be protected from becoming obsolete and that they continue providing levels of service for which they were designed. Effective policies and standards managing access control contribute to their functional protection.

Intersection Spacing -- Theoretically, the ideal location and spacing of signalized intersections is at points which minimize impacts on major roadways and permit progressive through traffic movements.

Direct Access Driveway Design -- Driveway openings from major thoroughfares should be provided as part of the functional plan for off street parking and for access to parcels of land. Along arterial roadways, where volumes and speeds are higher, driveway designs should correspond with vehicular capabilities in order to facilitate a free flow both on and off the roadway. A curb return should allow a vehicle to follow a path outlined by the curb without jumping the curb. Vehicles entering a driveway

should be able to turn right, from the curb lane, without slowing suddenly or encroaching on other travel lanes to their left. Likewise, a vehicle exiting from a driveway should be able to turn into the right lane without encroaching on the adjacent lane.

Most non-residential driveways are intended to allow vehicles to enter and leave at the same time. Sufficient width must be provided to permit this to be done with ease.

In Leonard the Access management is extremely poor since most properties abutting a thoroughfare have direct access to the thoroughfare. This causes a significant reduction in the carrying capacity of the thoroughfares; however, because of the past rural nature of the City some of these conflicts will continue. It should be noted that future thoroughfares to be added to the system should be constructed to facilitate roadway access management as stated above.

### **INTERSECTION DESIGN CRITERIA**

In any thoroughfare network, a major intersection is a critical point of congestion and delay. While thoroughfare links can accommodate relatively high traffic volumes, the intersection of major arterial streets must serve twice the traffic volumes of any given street link. As a result, it is necessary to place major emphasis on this critical part of



the network. This may result in the need for fewer lane miles of city streets, and the need for more special use lanes at certain intersections. Special design considerations may be required to increase intersection capacity. There is a natural conflict, which exists between private needs and additional intersection capacity needs since commercial development traditionally locates at major intersections to gain maximum exposure. An intersection can be described as the actual crossing of two streets plus that portion of the streets within 150 feet of the crossing.

## **THOROUGHFARE PLAN**

**GOAL - THIS THOROUGHFARE DEVELOPMENT PLAN IS TO PROVIDE GUIDANCE IN THE SIZE, LOCATION, CLASSIFICATION, AND STANDARDIZATION OF THOROUGHFARE FACILITIES.**

Policies:

- \* Provide a framework for orderly development based on the Future Land Use Plan, projected population growth and anticipated economic development in order to be responsive to present and future traffic demands within the community.

Figure 16 illustrates the Thoroughfare Plan for the overall planning area. Completion

of the system will occur over a period of time as the facilities are warranted, either as the adjacent lands develop or as may be required to accommodate special traffic movements through undeveloped sections.

In areas where development is sparse, the alignments are shown as corridors. Street alignments are approximate and should be formalized as development takes place. The Thoroughfare Development Plan provides continuity of the roadway network within a street classification hierarchy and is based on the Comprehensive Land Use Plan. The Thoroughfare Development Plan also takes into account proposed land use development potential to the year 2025 and beyond. This has enabled the plan to address future needs of the community as they are presently envisioned. As the Land Use Plan changes, so must the Thoroughfare Development Plan change.

Some of the recommendations involve highway improvements by the Texas Department of Highways. For highway improvements within the City Limits, the City is normally obligated for the costs of right-of-way, utility relocations, and drainage systems, which may be necessary for construction. As these are improvements of major benefit to Leonard, the City should make every effort to assure that such funds are available at the time of construction.

It is desirable from the standpoint of both circulation and maintenance costs for the City

to develop all thoroughfares to adequate standards. However, it is not necessary to construct thoroughfares to their full-anticipated capacity if such capacity conditions will not occur for many years. Improvements should be made according to the proposed standard as the street approaches its anticipated capacity. However, all required rights-of-way should be designated and dedicated when platted or replatted as soon as possible.

Through use of the Thoroughfare Plan, the designation of rights-of-way for thoroughfares to be constructed in the future will aid the City of Leonard in acquiring adequate rights-of-way as streets are actually developed. The Thoroughfare Plan can put property owners on notice as to the City's intentions to develop the thoroughfare system, and prevent the development of conflicting uses, which might interfere with the system.

State Highways have been integrated into the Thoroughfare Plan. The City should fully utilize the capabilities of the Texas Department of Highways in the expansion of these facilities. As State funds are becoming more limited, the City should make every effort to cooperate in the expansion of highways and farm roads, in accordance with the Thoroughfare Plan, as funds are made available.

The City of Leonard needs to adopt Thoroughfare Impact to facilitate the development

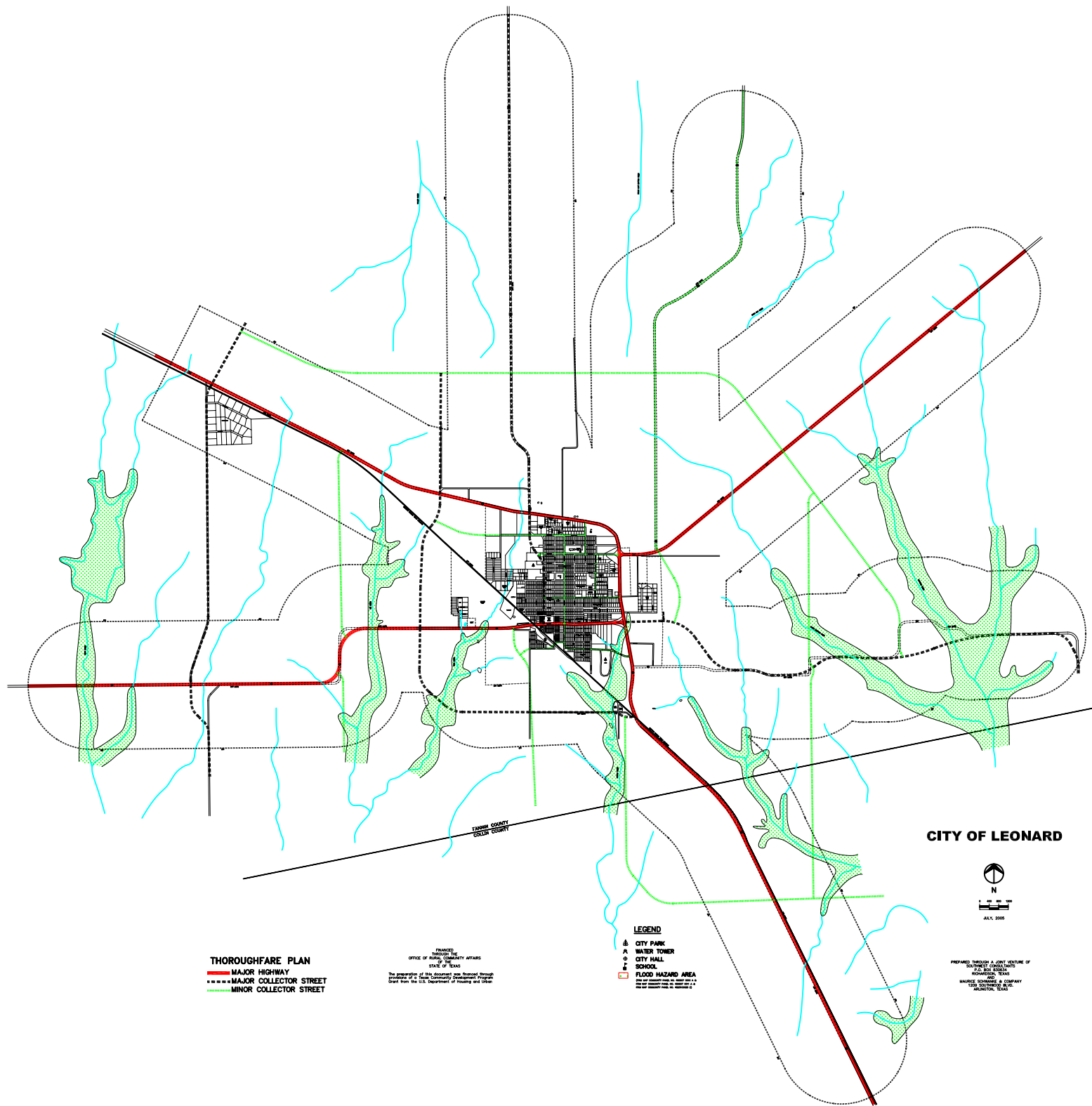
of many of the thoroughfares identified on the Plan other than State Highways. Additionally, perimeter streets should be addressed as adjacent property owner develop their land. As such the majority of the Thoroughfare Plan should rely heavily on developer construction of Thoroughfares and should not be included in a time frame or local budget unless development has already occurred on both sides of the planned improvements.

## **STREET PLAN**

The street plan are for existing streets that are not anticipated to be constructed as part of the development process.

**Street system GOAL: The City should insure sufficient access and efficient transportation to and from all properties within the Leonard,**

The purpose of the Street Plan is to assist the City in appropriating public funds in a manner, which maximizes benefit. The Plan identifies those street improvements, which are needed in order to provide an efficient transportation system in the City. In addition to identifying specific deficiencies, a phasing strategy has also been developed. Specific elements of the Street Plan include the following actions:



**THOROUGHFARE PLAN**  
— MAJOR HIGHWAY  
- - - MAJOR COLLECTOR STREET  
— MINOR COLLECTOR STREET

FRANCO  
THOROUGHFARE  
OFFICE OF PUBLIC COMMUNITY AFFAIRS  
OF THE  
STATE OF TEXAS  
The preparation of this document was funded through  
a grant from the U.S. Department of Housing and Urban  
Development.

**LEGEND**

- ▲ CITY PARK
- ▲ WATER TOWER
- CITY HALL
- SCHOOL
- FLOOD HAZARD AREA

**CITY OF LEONARD**

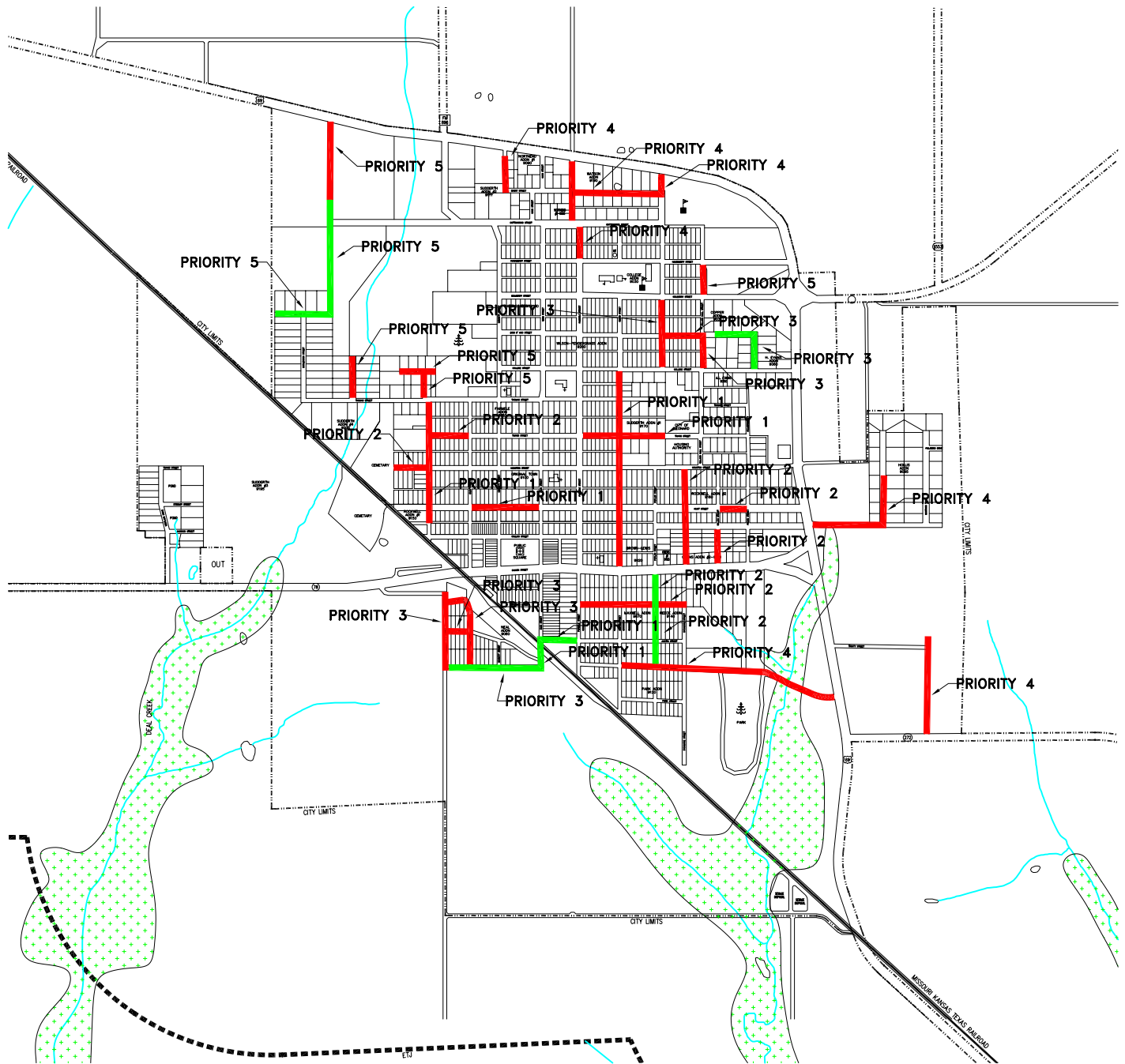


PREPARED THROUGH A JOINT VENTURE OF  
SOUTHERN CONSULTANTS  
P.O. BOX 1000  
HOUSTON, TEXAS  
MAURICE SCHWAB & COMPANY  
1000 SCHWAB BLVD.  
HOUSTON, TEXAS

1. Street Paving: Paving of existing streets, especially at intersections. Street maintenance should be a continuing program.
2. Street Drainage: As set forth in the Drainage element of this Plan existing bar ditches need to be addressed and cleaned to extend the life of Streets.
3. Street Signage: Street signs should be added, repaired, or replaced to prevent the potential for vehicle accidents. Some signs have been removed or were never installed, which causes traffic conflict. Street signs should be installed at all intersections to assist with emergency response and general navigation within the City.

Priorities for the next five years are outlined below, together with the estimated cost of each project. Phasing of improvements is designed to help minimize the financial impact on the community, while still realizing the need to make necessary improvements. The Street Plan, indicating the project location, is indicated on Figure 17. Listed below are the elements of the Street Plan, which need to be addressed during the first five years of the plan. The elements indicate estimated cost and year of implementation.

#### First Priority



## CITY OF LEONARD

### PROPOSED STREET SYSTEM IMPROVEMENTS

- STREET PAVING PROJECT
- FIRST TIME PAVING PROJECT

### LEGEND

- CITY PARK
- WATER TOWER
- CITY HALL
- SCHOOL
- FLOOD HAZARD AREA



JULY, 2005

FINANCED  
THROUGH THE  
OFFICE OF RURAL COMMUNITY AFFAIRS  
OF THE  
STATE OF TEXAS

The preparation of this document was financed through provisions of a Texas Community Development Program Grant from the U.S. Department of Housing and Urban Development.

PREPARED THROUGH A JOINT VENTURE OF  
SOUTHWEST CONSULTANTS  
P.O. BOX 850634  
RICHARDSON, TEXAS  
AND  
MAURICE SCHWANKE & COMPANY  
1209 SOUTHWOOD BLVD.  
ARLINGTON, TEXAS

Cedar Street	Fannin to College
Travis Street	Parmeale east to Housing Authority
Hunt Street	Elm to Main
Oak Street	Collins to Thomas
Main Street	Locust to Austin
Austin Street	Main to Parmele

First priority project is expected to cost \$170,000.

#### Second Priority

Houston Street	Cemetary to Oak
Travis Street	Oak to Elm
Sycamore Street	Houston to Fannin
Hunt Street	Willow to Pecan
Willow Street	Hunt to Fannin
Poplar Street	Fannin to Locust
Grayson Street	Sycamore to Parmele

Second priority project is expected to cost approximately \$137,700.

#### Third Priority



Oak Street	Grayson to Locust
Grayson Street	Oak to Elm
Austin Street	Oak to Elm
Locust Street	Oak to Main
Elm Street	Locust to Grayson
Poplar Street	College to Mulberry
Bois D' Arc Street	Poplar to Willow
Willow Street	Bois D' Arc to College
Bois D' Arc Street	Willow east and south to College

Third year project is expected to cost \$175,000.

#### Fourth priority

Parks Street	All
Parmelee Street	U.S. 69 to Hackberry
Short Street	Parmelee to Poplar
Poplar Street	U.S. 69 to Short
Palomino Street	U.S. 69 to Appaloosa
Appaloosa Street	Palomino to north terminus
Locust Street	Cedar to U.S. 69
Sulphur Street	F.M. 272 to Trinity

Fourth priority projects are estimated to cost \$220,000.

### Fifth Priority

Willow Street	Hackberry to Mulberry
Tucker Street	Thomas north
Barr Street	Thomas to Fraser
Fraser Street	All
Thomas Street	Golden to U.S. 69

Fifth priority projects are estimated to cost \$125,000.

## 2. Street Signage

Street signs should be added to all intersections. Cost for each sign is approximately \$75, which includes the cost of the sign and installation. On a city-wide basis, \$12,000 should be adequate to make all necessary repairs/replacements.

All of the proposed street improvement projects should be funded using the local general fund. These funds could be used to retire short-term loans obtained from local banks.

