

# Chapter 8

## Market Assessment

### Introduction

The following section assesses the market potential for future residential, commercial, and industrial uses within the Township based on nationally recognized planning and design standards. This information will be used to determine the amount of each land use that can reasonably be required in Kimball Township by 2020.

### Residential Needs Analysis

The characteristics of the existing structures will largely determine the type of housing that will likely be constructed during the planning period. Housing unit projections are based upon existing and projected demographic patterns, as well as existing housing characteristics. Demographic characteristics analyzed include projections of the total population and persons per household. Housing characteristics analyzed include the ratios of year round, seasonal housing, vacancy rates, and recent residential housing unit construction.

The Socioeconomic Profile chapter revealed that the population in Kimball Township is projected to reach 13,111 (average) by the end of the planning period (2020). At the same time, the average household size is expected to be 2.45 (SEMCOG).

After estimating for the impacts from population and household size it is also necessary to calculate how much of the total housing stock in the plan year will be vacant for sale or rent. Generally, five percent of a community’s habitable housing stock should remain vacant to provide diversity in housing selection, permit housing rehabilitation or replacement activities, and to ensure that asking prices for housing are indicative of actual market conditions, while at the same time protecting private investment. Vacancy rates below five percent demonstrate a restricted housing environment, affording little opportunity for potential households to be absorbed by available units. In calculating future housing needs, it is assumed that this vacancy rate will be five percent.

Data in **Table 8-1** summarizes the projected changes to population, persons per household and housing stock through 2020. Based on this analysis, it is anticipated that an additional 2,331 year-round dwelling units will be needed by 2020 in order to house the projected population.

Category	2000	2020	Change 2000-2020	
			Number	Percent
Total Population	8,628	13,111	4,483	52.0%
Persons per Household	2.74	2.45	(0.29)	(10.6%)
Total Occupied Units	3,120	5,351	2,231	71.5%
Vacancy Rate (%)	5.5	5.0	--	--
Vacant for Rent/Sale	91	282	191	209.9%
Total Housing Units	3,302	5,633	2,331	70.6%
<i>Data compiled by Wade-Trim Source: Tables 3-2, 3-4, 3-10 (see Socioeconomic Profile Chapter).</i>				

It is important to note that by the end of the planning period, 1,597 housing units in Kimball Township will be 50 years old or more. It is estimated that 50 percent of these homes, or 799 units, will be eliminated during the planning period due to their age, deteriorated condition, or the associated expense for repair. The housing unit projection of 2,331 year-round dwellings by year 2020 does not factor in replacements of these homes.

# Commercial Needs Analysis

Commercial development is an important part of a community's economy. Commercial establishments provide goods and services to consumers, promote economic stability, and generally enhance the quality of life for area residents. If commercial districts are not suitably located and carefully planned, they can be a disruptive element and ultimately detract from the community. The following analysis details the existing commercial base found in Kimball Township and projects the likely amount of commercial land that will be consumed by the end of the planning period according to commercial land use standards.

## Existing Commercial Base

Consistent with **Table 3-1** found in the Existing Land Use chapter, 422.2 acres in the Township are devoted to commercial development. Moreover, 9.6 acres are used for office purposes. Commercial and office land uses are principally concentrated in the northeast quadrant of the Township along Lapeer Road, west of the C&O railroad crossing, and around the I-69 Interchange at Wadhams Road. This quadrant is influenced greatly by its proximity to the City of Port Huron and Port Huron Township. Growth generators within the Port Huron area include the convergence of the I-94 and I-69 expressways, the new railroad tunnel, the second span of the Blue Water Bridge, the expansion of utilities, and the increase of urbanization pressures.<sup>1</sup>

The commercial development pattern found along Lapeer Road in Kimball Township extends east in a linear fashion into Port Huron Township, then culminating in the City of Port Huron.

Feeding into this commercial corridor, is the I-69 interchange with Wadhams Road. Wadhams Road is a north/south primary county road that runs the full length of the Township. Aside from the interchange area, Wadhams Road supports intermittent general commercial development primarily south of the G.T.W. railroad crossing.

There are two I-94 interchanges in Kimball Township; Gratiot Road and Range Road. Both interchanges contain commercial development. The largest development project is the 187,467 square foot retail outlet center (Horizon) at the I-94 interchange with Range Road. The Horizon Outlet Center offers comparison shopping for the surrounding region.

To a lesser extent than those areas mentioned above, commercial development has sprouted at mile intervals along Griswold road at county road intersections.

**Table 8-2** details major retail development projects in St. Clair County from 1990 to 1996. The Horizon Outlet Center represents the single major retail development to be constructed in Kimball Township during this time period. Recent estimates, however, indicate that only 12 of 45 retail spaces are currently occupied.

Community	Amount of Retail Space Constructed <sup>b</sup>		Number of Buildings	
	1990-1996	Total	1990-1996	Total
Algonac	0	58,760	0	1
Fort Gratiot Twp.	1,170,277	1,431,059	5	7
Kimball Twp.	187,467	187,467	1	1
Marine City	0	147,339	0	1
Marysville	0	239,786	0	3
Port Huron	158,200	363,200	1	3
Port Huron Twp.	342,000	580,330	1	3
St. Clair	0	136,020	0	1
<b>Total St. Clair County</b>	<b>1,857,944</b>	<b>3,143,961</b>	<b>8</b>	<b>20</b>

*Source: "Major Retail Centers Within Southeast Michigan, 1996", SEMCOG Memorandum, July 18, 1997.*

<sup>a</sup>Retail facilities 50,000 sq. ft. or more in gross retail space.  
<sup>b</sup>In square feet

Fort Gratiot Township, located to the northeast of Kimball Township, saw the greatest increase in retail development (1,170,277 square feet) between 1990 and 1996, and holds the largest total amount of major retail space (1,431,059 square feet) in the County. The City of Port Huron and Port Huron Township, west of Kimball Township, also saw tremendous growth. This is largely attributable to the regional access provided by I-69 and I-94 and Blue Water Bridge crossing into Canada.

<sup>1</sup>Comprehensive Development Plan, Charter Township of Port Huron, St. Clair County, Michigan, January 1994.

Since this period in the 1990's retail development has continued within Kimball Township; however, totals for new retail square footage have not matched this earlier trend. From 2001 to 2004, for example, Kimball Township added 85,170 sq. ft. of retail space. Again, the majority of this retail space stemmed from the Horizon Outlet Center (Phase II), 75,600 square feet in 2002.

## Commercial Land Use Standards

There are four primary types of planned shopping environments: neighborhood centers, community centers, hyper-centers and, regional centers. Data in **Table 8-3** present the market base standards for these four types of commercial centers.

Center Type	Site Size	Composition	Population Base	Service Area
<b>Neighborhood Center</b>	3-15 acres	Supermarket as the principal tenant with other stores providing convenience goods or personal services. Typically GLA of 30,000 to 150,000 square feet.	Trade area population of 3,000 to 40,000 people	Neighborhood, 5-10 minute drive time, 1.5 mile radius
<b>Community Center</b>	10-40 acres	Junior department store or variety store as the major tenant, in addition to the supermarket and several merchandise stores. Typically GLA of 100,000 to 450,000 square feet.	Trade area population of 40,000 to 150,000 people	10-20 minute drive time, 3-5 mile radius
<b>Regional Center</b>	30-100 acres	Built around a full-line department store with minimum GLA of 100,000 square feet. Typically GLA of 300,000 to 900,000 square feet.	150,000 or more people	20 minute drive time, 8 mile radius
<b>Hypercenter<sup>a</sup></b>	50-70 acres	Single store with multiple departments that offers large selections of fast moving general merchandise and food products and relies on its lower prices to draw customers from a wide reaching market area. Typically 175,000 to 330,000 square feet.	Trade area population figures not available.	25-30 miles

\*Urban Land Institute, *Shopping Center Development Handbook*, (Washington, D.C.), 1977, 1999.  
<sup>a</sup>Urban Land Institute, *Development Trends*, March 1989.  
 NOTE: GLA represents gross leasable area.

Neighborhood centers generally require a site between three and 15 acres in area. Such centers often have a supermarket as the principal tenant with other stores providing convenience goods or personal services. The typical gross leasable area is 30,000 to 150,000 square feet. The required trade area population ranges between 3,000 and 40,000 people living within a 1 to 1-1/2 mile radius or six-minute drive of the center.

Community centers generally require a site that is ten to 40 acres in area. Such centers often have a junior department store (K-Mart, WalMart, etc.) or variety store as the major tenant in addition to a supermarket and other retail stores. The typical gross leasable area is 100,000 to 300,000 square feet. The required trade area population ranges between 40,000 and 150,000 people living within a three to five-mile radius.

Regional centers are typically constructed on a site of 30 to 50 acres in area. Such centers are built around a full-line department store with a minimum gross leasable area of 100,000 square feet. Regional centers may have a total gross leasable area of 300,000 to 900,000 square feet. The required trade area population is 150,000 people or more living within an eight-mile radius.

Hypercenters range in size from 50 to 70 acres. They typically consist of a single store with multiple departments with large selections. They rely on low prices to draw customers from a wide reaching market area of 25 to 30 miles from the center. Store sizes typically range from 175,000 to 330,000 square feet.

Not every commercial use is sited within pre-planned shopping centers. Attention must also be given to uses which occupy freestanding structures or which are part of strip commercial areas. Most of these uses are considered highway-oriented businesses, since much of their trade results from exposure and accessibility to passing motorists.

## Estimated Commercial Land Use Needs

Based upon the available land area and the projected 2020 population, Kimball Township could support up to four neighborhood centers totaling approximately 66 acres.

Data in **Table 8-3** presents the market base standards for many of these types of uses. For land use planning purposes, it is recommended that ten acres per 1,000 people be allocated for such development. Thus, by 2020, approximately 131 acres of non-center commercial development may be required by Kimball Township residents for general business purposes.

Data in **Table 8-4** also documents the population base necessary to support different types of office development (doctors, real estate, accounting, travel agencies, legal offices, and banks). To provide for office development, three acres per 1,000 people is the recommended guide. Thus, by the end of the planning period, approximately 39 acres of office development will be needed to support the Township population.

Based upon these standards, the commercial needs analysis predicts that Kimball Township will require approximately 236 acres of commercial development (66 acres for neighborhood commercial centers, 131 acres for non-centers, and 39 acres for offices) by 2020 to serve its growing population. Currently, the existing land use analysis reveals that the Township has approximately 432 acres of commercial and office land use. Therefore, according to the planning standards, the supply of 432 acres

of commercial land uses in Kimball Township exceeds the predicted local demand by 196 additional acres. This supply surplus may be attributed to the high degree of regional access provided by I-69 and I-94 to serve a larger population base.

Store or Service Use	Population Base	Market Penetration	Rental Revenue Potential	Typical Building Size in Square Feet
Food Stores	4,000	low	low	20,000
Drug Stores	9,000	high	medium	5,400
Liquor Stores	3,100	high	high	2,000
Restaurants & Taverns	varies	low	high	3,300
Laundries (coin-operated)	12,400 <sup>a</sup>	high	low	1,600
Dry Cleaners	3,000	high	low	1,300
Beauty Shops	2,100	high	medium	1,200
Barber Shops	3,300	high	medium	750
Television Repair	5,300	medium	low	1,400
Real-Estate Offices	n/a	high	high	1,000
Branch Banks	4,500	low	high	4,000
Accounting Offices	n/a	n/a	n/a	n/a
Nurseries	16,200	high	medium	1,300
Travel Agencies	varies	high	high	800
Women's Apparel Stores	6,000	low	medium	2,500
Sporting-Goods Stores	18,000	medium	medium	n/a
Books & Stationery	6,500	low	medium	2,000
Furniture & Home Furnishings	6,200	low	medium	10,200
Camera Stores	55,100	medium	medium	2,000
Automotive Service Stations	2,800	low	high	varies
Hardware, Paint & Building Supply	8,700	medium	medium	5,700
Convention Hotels	b	varies	n/a	varies
Bowling Alleys & Billiard Parlors	c	c	c	c
Doctors Offices	1,000	low	high	1,000
Legal Offices	6,000	low	high	800
Stock-Brokerage Offices	15,000	low	high	800

Note: Population base refers to the number of actual customers each store or service requires for its support. Market penetration is each one's relative ability to withstand competition; a store with low penetration needs a greater number of residents in the area than one with the same population base and high penetration. Assume a 3:1 site to building size ratio to determine total land area need.  
Source: Darley/Gobar Associates, Economic, Real Estate, and Marketing Consultants, as published in House and Home Magazine, 1973.  
<sup>a</sup>Figure is approximate, depending on whether residents have their own machines.  
<sup>b</sup>Not applicable; does not depend on residential population.  
<sup>c</sup>Current figures not available. Popularity is declining.

# Industrial Needs Analysis

The quantity of developed industrial land a community will need in the future is dependent upon its current employment base, infrastructure capacity, local political philosophy, as well as a myriad of other factors industries consider when choosing a new facility location. Data in **Table 8-5**, Industrial Location Criteria, list some of the more important location criteria industries analyze when selecting a site.

This chapter assesses the current supply and location of industrial land within the Township and estimates the amount of industrial land that will likely be needed to support the local tax base. Further, recommendations are made on the type and location industrial development should occur based upon local objectives and need.

## Existing Industrial Base

Emerging global markets, heightened competition for market share, and customer demand for faster product delivery are all contributing to transportation as a key factor in site selection. According to a recent survey of executives, transportation is second only to labor availability and cost when selecting the right site for a new or expanded facility.<sup>2</sup> The emphasis on transportation, highway accessibility in particular, reinforces a continuing trend of executives seeking effective transportation links with both suppliers and customers. “Just-in-time” delivery requirements, reduced inventories, and reduced costs of materials on hand are driving this requirement.<sup>3</sup>

<sup>2</sup>Hess, Robert J., *Assessing Transportation Factors with Dispatch, Area Development*, July 1997.

<sup>3</sup>Canup, C.R. (Buzz), *Manufacturing Executives Evaluate the Key Factors of Site Selection, Area Development*, December, 1995.

### Air Industrial Park Tenants

- Dorzel Aviation Services Co.
- Classic Aviation LLC
- Marque Properties Inc.
- I T C Molding
- Kimball Plastics
- Marysville Propeller
- Greater Bay Capital
- S C C International Airport
- Jump Industries
- Corson Fabricating
- PRJ Investments LLC
- Allied Photo Chemical
- Pioneer Financial Funding
- Sage Capital Corp.
- AP Ventures LLC
- Evans Air Corp
- Williams Aviation
- St. Clair Airport Prop. LLC.
- Banking Forms Supply Co.
- St. Clair Flight Academy
- Triple J. Enterprises
- PNT Registered Importers U
- Port City Fulfillment
- Colien Enterprised
- Lawrence Fabricating
- PMR Industries

**Table 8-5  
Location Criteria Used by Industry**

Availability of Adequate Sites	The trend is to one-story plants with adequate space for parking, loading, a reserve for expansion, and, if the industry abuts a residential area, a landscaped buffer strip.
Reasonable Tax Rates	Two of the more frequently stated reasons for an industrial move are the lack of an adequate site or the lack of a reasonable tax rate.
Location of Production Material	Improved methods for moving bulk products are lessening the importance of this factor.
Power	Electric power is the type most often required today, and there should be no local problems in this respect.
Water	Many industries require large quantities of water, either raw or treated, in their manufacturing process, and some find it desirable to have water as a means of cheap transportation.
Waste Treatment Facilities	A prerequisite to industrial operations locating in a particular area is its ability to handle the disposal of wastewater. Either public utilities with readily available access to or on-site waste treatment facilities with sufficient capacity to meet operational requirements have become integral location criteria, requiring careful consideration.
Industrial Fuel	Industries requiring gas are limited as to their potential locations. If coal is required in large quantities, the industry should be located along railroads or waterways.
Transportation Facilities	The importance of rail sites has diminished for some industries. Many rely solely on major highways as the means of bringing in production materials and distributing the finished product.
Favorable Competitive Pattern	Certain industries are finding it worthwhile to establish branch plants and to decentralize in order to maintain competitive advantages.
Living Conditions	An industry will also investigate a community's resources in terms of educational and recreational facilities, housing, availability of professional services, nature of shopping facilities, and public attitudes.
Compatible Laws	Up-to-date industrial thinking recognizes the desirability of sound zoning, building, and other codes.
Site Characteristics	Such things as soil and topography, amount of grading required, drainage conditions, waste disposal service, etc., are important to certain industries.
Labor	The cost of labor as a factor of production is important to industries where added costs cannot be shifted to the consumer without sacrificing competitive advantage.

*Compiled by Wade-Trim.*

Kimball Township's transportation facilities play a major role in industrial development patterns. The Township's industrial base has capitalized on its highway interchanges, the airport, and rail line. Specifically, industrial uses are found at the I-94 interchange at Gratiot Road, and near the St. Clair County International Airport in the Air Industrial Park. Numerous other industrial uses are scattered throughout the Township along the major roadways.

Heavy industry in the Township is confined to Township Section 2 (north of the I-69/Wadhams interchange and just east of the Wadhams Road intersection with Lapeer Road).

## Industrial Land Use Planning Standards

For land use planning purposes, it is necessary to estimate the amount of land that can reasonably be expected to develop for industrial uses. This enables capital improvements to be planned and programmed in advance, and that an ample supply of land is available to support local employment opportunities.

Three methodologies commonly used for calculating future industrial land needs are employment/density ratio method, land use ratio method, and population ratio method. These are summarized in **Table 8-6**, Estimating Industrial Land Use Requirements.

<b>Employment Density Ratios</b>	
<i>Industry</i>	<i>Average Number of Employees Per Net Site Acre</i>
Intensive Industries <sup>a</sup>	30
Intermediate Extensive Industries <sup>b</sup>	14
Extensive Industries <sup>c</sup>	8
<b>Land Use Ratios</b>	
<i>Community Size</i>	<i>Percent Industrial Land Average</i>
Small Cities and Towns (under 42,000)	8%
<b>Population Ratios</b>	
<i>Category</i>	<i>Ratio</i>
Total gross land required for all industry	12 acres per 1,000 population
Land required for light industry	2 acres per 1,000 population
Land required for heavy industry	10 acres per 1,000 population
Source: Urban Land Institute, Industrial Development Handbook, 1975; American Planning Association, PAS Memo: Land Use Ratios, May 1983; Joseph DeChiara and Lee Koppleman, Planning Design Criteria, 1969.	
<sup>a</sup> Industries include electrical equipment and supply; printing and publishing; apparel and textile products; transportation equipment; and similar uses.	
<sup>b</sup> Industries include lumber and wood products; furniture and fixtures; food and kindred products; chemicals; and similar uses.	
<sup>c</sup> Industries include tobacco products; petroleum and coal products; wholesale trade; and similar uses.	

The employment/density ratio method is considered the most accurate predictor of industrial land use demand. If employment by industry can be projected, a worker density factor can be applied. This will result in a total acreage requirement for three distinct intensities of industrial land use. Intensive industries include electrical equipment and supply; printing and publishing; apparel and textile products; transportation equipment; and similar uses. Intermediate extensive industries include lumber and wood products; furniture and fixtures; food and kindred products; chemicals; and similar uses. Finally, extensive industries include tobacco products; petroleum and coal products wholesale trade; and similar uses.

Land use ratios can be used as a benchmark to estimate the future need for industrial land uses. By developing an inventory of the amount of land devoted to industrial uses in other communities, an average can be calculated and used as a standard for planning purposes. It is important to note that the percent of industrial land use is based on developed land area, not total land area (which includes vacant land and agricultural land area.) The third methodology is similar in that it uses a benchmark ratio as a standard, but the ratio uses population as the base for comparison.

### Employment Density Ratios

Initial future employment patterns were estimated using a 1994 SEMCOG Regional Development Forecast (RDF) for Kimball Township, as it was the best available information at the time. In order to account for new employment projections (detailed by SEMCOG in 2002), acreage totals were adjusted. According to SEMCOG in 2002, manufacturing employment in Kimball Township in 2020 will be 291 persons. Wholesale trade, which is considered an extensive industry is projected to be 214

<i>Employment Ratio Technique</i>			
<i>Category</i>	<i>Net Acres</i>	<i>Gross (4:1)</i>	<i>Gross (5:1)</i>
Intensive	3.0	12	15
Intermediate	13.4	53.6	67
Extensive	24.1	96.4	120.5
Total	40.5	162	202.5
Source: Calculations by Wade-Trim			

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persons. Using the employment density ratios, summarized in **Table 8-7**, the potential range of land area that may be required for industrial land uses would range between 3.0 net acres for intensive industries and 24.1 net acres for extensive industries. It should be noted, however, that these are estimates of net developed acres for industrial land uses. Taking this into account and adding additional space for setbacks, access, internal site circulation and parking would increase these estimates by four or five times. It is anticipated that the maximum amount of industrial land needed, using the employment ratio technique, will be 202.5 acres in year 2020.

### Industrial Land Use Ratio

According to the industrial land use ratio projection technique, eight percent of the Township's developed land area should be utilized for industrial development. Developed land area totals 9,326.5 acres when agricultural land, parks and recreation, rivers and bodies of water, and vacant, open space, rights-of-way, and other land uses are subtracted from the total land area of 23,968.1 (see **Table 3-1, Existing Land Use**). This yields an estimated 746 acres for future industrial land use. This is 3.4 times the existing amount of land used for industrial purposes. Considering the Township's residential character and large geographic area encompassed by its boundaries, a standard requiring the Township to have eight percent of its developed land area devoted to industrial uses is unwarranted.

### Population Ratio Technique

A third technique uses population ratios to determine acreage requirements. Data in **Table 8-6** indicate that 12 acres of industrial land are required for every 1,000 people. The 2020 Township population of approximately 13,111 people would, therefore, require approximately 157 acres of industrial land. The Existing Land Use analysis revealed that 217.3 acres of Township land area are currently utilized for industry. According to this model, Kimball Township currently has an excess of 60.3 acres of industrial acreage. Given the regional draw of Port Huron, however, additional acreage beyond the current inventory should be planned for industrial activity.