

VERGENNES TOWNSHIP

COMPREHENSIVE PLAN



Vergennes Township is committed to managed growth that actually enhances the community's natural features while preserving individual property rights. Therefore, the essential purpose of this Comprehensive Plan is:

To protect, encourage and retain the tradition of agricultural productivity and the integrity of the rural residential character in Vergennes Township.

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CHAPTER 1. INTRODUCTION

This Comprehensive Plan represents the culmination of over twenty-four months work by numerous local residents and local officials. It reflects the community's deep concern for the rural character of the Township and a strong commitment to retain and strengthen local quality of life. The plan outlines the preferred future for the community and a comprehensive plan to realize it. The Plan is appropriately general, recognizing that planning for the future is a delicate blend of art and science and that sufficient flexibility will be needed to respond to the challenges of the future.

This Plan reflects the community's deep concern for the rural character of the Township and a strong commitment to retain and strengthen local quality of life.

The fundamental purpose of the Comprehensive Plan is to enable the Township to establish a future direction for the Township's physical development. The Township Planning Act, Public Act 168 of 1959, as amended, specifically gives a Township Planning Commission the authority to prepare and officially adopt a plan. Once prepared, officially adopted and maintained, this Plan will serve as an advisory guide for the physical conservation of certain areas and for the development of other areas.

Because of constant change in our social and economic structure and activities, the Plan must be maintained through periodic review and revision so that it reflects contemporary trends while maintaining long range goals. The Plan will be effective to the degree that it:

- ◆ reflects the needs and desires of the citizens of Vergennes Township;
- ◆ realistically interprets and reflects the conditions, trends and the dynamic economic and social pressures that are brought about by change; and
- ◆ inspires consensus and cooperation among the various public agencies, developers, and the citizens of the Township toward achieving common goals.

THE PURPOSE OF THE COMPREHENSIVE PLAN

The planning process is an opportunity to build and strengthen a community consensus about the future land use patterns in the Township.

When Vergennes Township began the plan preparation process, it had several objectives. First, it was important to achieve an understanding of the scale and scope of growth and development and the likely future trends in the community. Secondly, the Township sought to clearly define community priorities with regard to growth, development and land use. Thirdly, the planning process was seen as an opportunity to build and strengthen a community consensus about the future land use patterns in the Township. Finally, the Township sought realistic and effective mechanisms to achieve the plan's objectives.

This Township Comprehensive Plan accomplishes all these objectives. More specifically, this Plan will serve the Township in the following ways:

1. It provides a comprehensive means of integrating proposals that look years ahead to meet future needs regarding general and major aspects of physical conservation and development throughout the Township;
2. It serves as the official, advisory policy statement for encouraging orderly and efficient use of the land for residences, businesses, industry, and agriculture, and for coordinating these uses of land with each other, with streets and highways, and with other necessary public facilities and services;
3. It creates a logical basis for zoning, subdivision design, public improvement plans, and for facilitating and guiding the work of the Township Planning Commission and the Township Board as well as other public and private endeavors dealing with the physical conservation and development;
4. It provides a means for private organizations and individuals to determine how they may relate their building and development projects and policies to official Township planning policies; and
5. It offers a means of relating the plans of Vergennes Township to the plans of other communities in the region.

PLAN METHODOLOGY

- ◆ Data Analysis – A Current Assessment.
- ◆ Goals and Objectives – Creating a Policy Foundation.
- ◆ Plan Preparation – Defining the Preferred Future, and
- ◆ Implementation Strategies – Getting There from Here

The first phase of the effort involved a summary review and analysis of available data gathered from local and regional sources. Its purpose was to develop a comprehensive impression of the patterns of growth and the challenges that will impact the Township. This phase culminated in the preparation of a current Assessment Report. That report served as a technical resource for the community and the consultant. It represents the Community Profile, which constitutes Section II of this Plan.

The objective of this second phase was to establish a policy basis for the Township's planning and land use regulations. A futuring workshop was held to gather public input through a nominal group process. This was followed by a Community Opinion Survey intended to test and broaden the output from the futuring workshop. From these activities, the team began the process of defining goals and objectives for the future of Vergennes Township. These are presented in Chapter 7 of this Plan.

The third phase involved drawing together the input from the previous two and preparing a revised Land Use Plan which is reflected in Section III of this Plan. The land use designations and map (Chapter 8) were developed in a series of interactive meetings, including a special public hearing to gather general community input. That process involved several iterations of the draft map and descriptions.

The final phase of the process involved the development of specific implementation strategies to carry out the plan. These are reflected in general terms in Chapter 9. At the conclusion of the fourth phase, a public hearing on the entire plan was held by the Township.

THE ORGANIZATION OF THE PLAN

This Plan is organized into three sections, each consisting of one or more chapters. Section I includes an introductory chapter which outlines the purpose of the plan, the process for its development, and acknowledgements to those involved. Section II, is the Community Profile, which presents an overview description of Vergennes Township from the perspective of:

- ◆ Natural Features, the Environment and Utilities (Chapter 2)
- ◆ Population (Chapter 3)
- ◆ Income, Housing and Economic Development (Chapter 4)
- ◆ Land Use and Development Patterns (Chapter 5), and
- ◆ Transportation (chapter 6)

Section III constitutes the Comprehensive Plan, which includes the Township's Goals and Objectives (Chapter 7), the Land Use Plan (Chapter 8) and the Implementation Strategies (Chapter 9). The following are the central conclusions of this report. Further detail on each conclusion is presented in the following chapters.

ACKNOWLEDGEMENTS

The process to prepare this Plan has involved numerous community residents as well as public officials. The following individuals have provided key input and their contributions are gratefully acknowledged.

SECTION II COMMUNITY PROFILE

In this section of the Comprehensive Plan, a general profile description of the Vergennes Township is presented. This section is not intended as an exhaustive inventory of all the numerous aspects of the community. Rather, its purpose is to give some general impression of the natural features, demographics, land use patterns and infrastructure that make up the Township.

This section presents a “snapshot” of current conditions within the Township and recent trends in population and housing.

The material in this section has been drawn from *Vergennes Township, A Current Assessment Report*, published by the Township as a part of this plan preparation process. That report presented a “snapshot” of current conditions within the Township and recent trends in population and housing. It set the stage for the finalization of plan goals and objectives, the land use plan and map, and implementation strategies. All of those materials form the actual Comprehensive Plan set forth in Section III of this document.

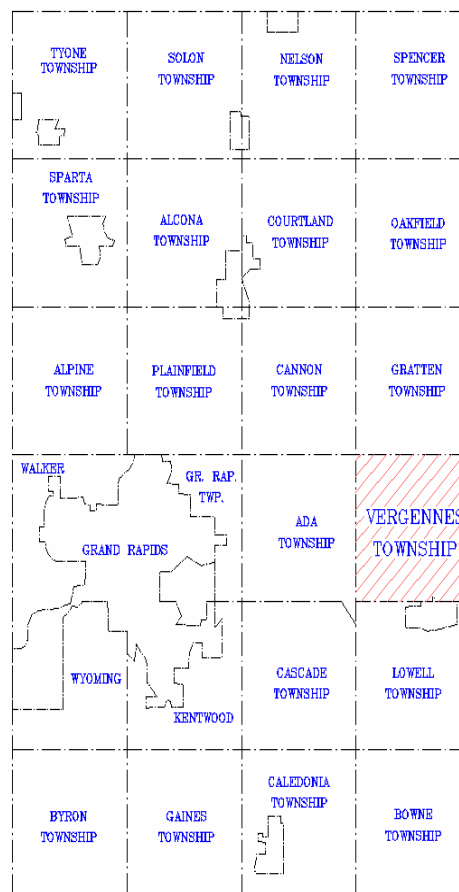
Each of the following chapters includes an overview of its subject matter along with a brief discussion of the planning trends that are relevant. The material presented in the Community Profile has been drawn from existing research and published texts. No original research was required or desired to prepare the general overview needed for this document. This approach provides an efficient use of the resources of the Township in the completion of the Plan. However, in a few instances, this approach may result in some unanswered questions. Further research or analytical work could be undertaken to find answers to those questions, but extensive refinement of the details at this stage of the process seldom results in large-scale shifts in policy. The Township and the consulting team have found that the limited resources available for the completion of the Plan are best directed at forming the general outlines of land use policy with the intent of refining the details of strategies as implementation proceeds.

CHAPTER 2. NATURAL FEATURES AND THE ENVIRONMENT

It is important to begin an assessment of the community with a description of its natural attributes. This chapter presents a description of the topography, soils, water resources and woodlands which provide the physical basis of the community. Also discussed are the utility systems that protect and utilize its groundwater. Much of the information has been obtained from Grand Valley State University, Water Resources Institute and other available resources such as the US Census, Kent County Soils Survey and research by Williams & Works. The sections on water and wastewater systems were developed for this Comprehensive Plan report to address the potential impact on groundwater from development.

Map 1. Locator Map

Vergennes Township is situated in the eastern third of Kent County, in the Grand Rapids metropolitan area of West Michigan



TOPOGRAPHY

Vergennes Township is situated in the eastern third of Kent County, in the Grand Rapids metropolitan area of West Michigan. The majority of the Township is rural in nature, as it is identified with scattered homes on large acre parcels with a balance of larger tracts of farmlands, fields open areas, and several inland lakes. The eastern third of the Township is traversed by the Flat River, which provides attractive valleys and recreation opportunities for area residents as well as important habitat for wildlife.

The eastern third of the Township is traversed by the Flat River, which provides attractive valleys and recreation opportunities for area residents as well as important habitat for wildlife.

The terrain of the Township is widely varied and comprised of hills, ravines, lowlands, and generally undulating land. Steeper slopes are found in the eastern half of the Township especially along the Flat River valley and its minor tributaries. Several of these areas contain numerous wetland depressions. The Slope map on the following pages illustrates the variation of the topography in the Township based on soil characteristics.

The topographic variation in the Township contributes visual appeal and privacy and by itself is an important natural feature. As a resource, the terrain relief, especially the gently rolling nature of the northern sections of the Township, promotes the air drainage necessary to support the numerous orchards found in the Township. The lower areas including the wetlands and rivers/streams serve to accommodate storm water runoff, maintain safe flood conditions by retaining and absorbing large volumes of water during storm periods and to recharge surface and sub-surface water tables.

SOILS

Soil information such as that found in soil surveys contain information that can be utilized for land use planning decisions. The soil surveys contain predictions of soil behavior for selected land uses. For example, the surveys highlight limitations and hazards inherent in the soil, improvements needed to overcome the limitations, and the impact of selected land uses on the environment. This allows community officials to plan land uses, identify sites best suited for construction, and identify special practices needed to ensure proper performance.

It is appropriate to note that the Soil Survey is general in scope and should not be used to determine the suitability of a specific site for septic purposes. There are many examples in Vergennes Township of approved systems in areas generally mapped as unsuitable for an on-site system.

According to the Kent County Soil Survey¹, in general, a majority of the soils in Vergennes Township present development challenges with regard to septic fields, yet some are well suited to a variety of agricultural activities. It is appropriate to note that the Soil Survey is general in scope and should not be used to determine the suitability of a specific site for septic purposes. There are many examples in Vergennes Township of approved systems in areas generally mapped as unsuitable for an on-site system.

Plainfield-Oshtemo-Spinks

The southeast corner of the Township dons Plainfield-Oshtemo-Spinks soils. This soil type surrounds the Flat River basin and can be described as nearly level to gently rolling, excessively drained and well drained, sandy and loamy soils formed in sand and loamy materials. In Kent County, this soil type is used mainly as pasture or woodland or is idle land. However, the major soils are well suited to most kinds of building development. Yet, as discussed earlier, they are only fair to poorly suited to septic tank absorption fields, and the poor filtering capacity may result in the pollution of ground water supplies.

Marlette-Chelsea-Boyer

This soil type exists in a band from the northeast corner of the Township to the southwest corner. This soil surrounds Murray Lake and covers most of the central regions of Vergennes Township. Typically these soils are gently rolling to very steep. Like the Plainfield soils, Marlette is well-drained, loamy and sandy soils formed in loamy and sandy deposits. Depending on the slope these types of soils vary widely in their suitability for cultivated crops and pasture. The less sloping soils are well suited to building site development and the steeper soils are fairly well to poorly suited for development. Again, this soil type is poorly suited for septic tank absorption because of slow permeability and slope. The inability of sandy soils to adequately filter contaminants from septic tank effluent may result in the pollution of ground water.

¹ The Kent County Soil Survey is a publication of the National Cooperative Soil Survey. Major field work for the survey was completed in 1983 through a cooperative effort by the Soil Conservation Service and the Michigan Department of Agriculture, Michigan Agricultural Experiment Station, and Michigan Technological University.

Map 2, Soils Map available for public inspection at the Township Offices, at 10381 Bailey Drive, Lowell, MI during normal business hours.

Marlette-Capac-Metamora

This soil forms a crescent shape from the northwest corner of the Township to the southwest corner. Like the Plainfield, the Marlette-Capac-Metamora is nearly level to gently rolling. This soil type is predominantly used for cultivated crops and orchards. It is poorly suited to building site development and are poorly suited to unsuited to septic tank absorption fields. The soils tend to be very wet, which demonstrates limited permeability .

In Vergennes Township, several acres considered to have prime farmland soils exist in the western half of the Township, especially in the northwest quarter.

The Prime Farmland Soils map on page 10 is based on information from the Kent County Soil Survey. According to the United States Department of Agriculture, “prime farmland is land that has the best combination of physical and chemical characteristics for producing food, feed, forage, fiber, and oilseed crops. The soil qualities, growing season, and moisture apply are those needed for well managed soil economically to produce a sustained high yield of crops. Prime farmland produces the highest yields with minimal inputs of energy and economic resources, and farming it results in the least damage to the environment.” It is important to note that these prime farmland soils relate only to local conditions. For example, prime farmland soils in the Saginaw Valley area, Ohio, Iowa, and Indiana are of much higher quality than those in Kent County.

In Vergennes Township, several acres considered to have prime farmland soils exist in the western half of the Township, especially in the northwest quarter. The eastern half has scattered yet significant pockets of prime farmland soils as well. As part of the land use planning effort of this project, it is important to use this map in combination with the existing land use map as aid to deciding how best to plan for these key areas.

The Septic System Limitations map on page 9, illustrates soils in Vergennes Township with characteristics that present limitations for on-site wastewater disposal (septic fields). According to the Kent County Soil Survey these soils shown on the map present limitations due to wetness, poor filter capabilities, flooding, slow percolation, ponding, and/or steep slopes. As shown on the map, a majority of the Township is within the “severe limitations” level for septic fields. Further, the Kent County Health Department reports problems with older on-site septic tank wastewater system failures.

It is also important to realize that some of the limitation factors can be mitigated or overcome.

The Septic Systems Limitations map is general in nature and is not, however, intended as a substitute for on-site investigation or detailed engineering studies. The map does generally define those areas in which intensive development without improved infrastructure can lead to environmental degradation.

WATER RESOURCES

In addition to the Flat River and numerous smaller streams there are several lakes, small ponds and wetlands located in the Township. The most significant water body in Vergennes Township is the Flat River impoundment location in Sections 25 and 26. The River is a significant natural feature in the Township and residents and builders have sought development sites along the riverbank to take advantage of its scenic beauty. This is not a unique trend in this portion of the County as the neighboring communities of Ada and Cascade Townships are experiencing similar patterns along the Grand and Thornapple Riversides.

Murray Lake, located in the extreme north in Section 4 is virtually ringed by residential development. Along with heavy boat traffic, the residential density has caused water quality problems. Bailey Lake located in Section 19, is surrounded by wetlands and has yet to see significant development.

Map 3, Wetlands: available for public inspection at the Township Offices, at 10381 Bailey Drive, Lowell, MI during normal business hours.

Numerous smaller lakes and wetland areas are scattered throughout the Township. Most are associated with the major drainage courses. Each of these water resources provides an important habitat for many forms of wildlife.

Wetlands are valuable natural resources that provide such important benefits as surface and ground water quality and storm water management....

Pockets of wetlands are found throughout the Township, with significant areas associated with the Honey Creek drainage area in Sections 7 and 18. In addition, significant perched and low-lying wetlands are found along the Flat River. The Wetland and Woodland Types map on the previous page shows the woodland and wetlands throughout the Township.

Wetlands include swamps, marshes, bogs and similar areas often found between open water and higher elevated areas. Wetlands are valuable natural resources that provide such important benefits as surface and ground water quality and storm water management as described earlier.

The wetlands shown on Map 5, reflect the National Wetlands Inventory (NWI) prepared by the United States Department of the Interior. These are generalized areas and accurate and reliable regional mapping of wetlands is limited. The most accurate delineation of wetlands is derived from on-site field inspection of a parcel.

The wetlands shown on the map are based on interpretation of high altitude aerial photographs and should only be utilized as an “indicator map.” In other words, if a development is proposed in an area where wetlands have been identified on the map, an on-site investigation is typically warranted. This on-site investigation is necessary to first confirm and delineate the boundary of the wetland(s), and second, to determine if the wetland is regulated.

According to the MDEQ, a permit to drain, fill or modify a wetland must be obtained if the wetland(s) is five acres or larger or if the wetland is located within five hundred feet of surface water (i.e. lake or stream).

In Kent County, certain wetlands are regulated by the Michigan Department of Environmental Quality (MDEQ). According to the MDEQ, a permit to drain, fill or modify a wetland must be obtained if the wetland(s) is five acres or larger or if the wetland is located within five hundred feet of surface water (i.e. lake or stream). Wetlands that are smaller than five acres may be regulated by a local community ordinance. Vergennes Township currently does not have a local wetlands ordinance.

WOODLANDS

Many areas of the Township, including those developed in residential land uses, are characterized by mature woodlands consisting of both hardwoods and conifers. Some areas originally cleared for agriculture have been allowed to return to fallow grasslands.

The portion of these areas that are wood lots consist primarily of deciduous trees occupying both the slopelands and depressional areas of the Township. As such, they provide ground cover, maintain water tables and retard water runoff. Furthermore, these sizeable stands of oak, maple and beech are important elements of the rural character of the Township providing wildlife habitat and aesthetics and recreational values for Township residents.

NATURAL PRESERVES

There are a handful of natural preservation areas surrounding the Lowell High School in sections 28 and 34 of the Township. The Wittenbach Agri-Science and the Wege Natural Area for the Study of Ecology are located north of the high school, and the Cooper Woodland Preserve is to the east. The Wege preserve features 70 year old red-pine plantations, a number of wetlands, and an internal trail system.

UTILITIES

Public sanitary sewers serve a small portion of the Township. The Vergennes Township has contracted with Lowell Township, which contracts with the City of Lowell wastewater system for sanitary sewage. Essentially, Vergennes Township purchases a portion of Lowell Township's capacity allowance. The service area runs north along Alden Nash, and west to the High School. There are a limited number of properties with access to sanitary sewers in this area, and the Township is in the process of considering an expansion of the service area.

The northern half of Section 4 is served with public sewer from the Grattan/Vergennes system. In the southern most portion of the Township, Cumberland Avenue to the west, Vergennes Road to the north, and the railroad line to the east create the boundaries of the current plan for future public sewer connections. The service area includes the Lowell High School trunk sewer as illustrated on map

4. The Township has very little available capacity, as the collection system has nearly been fully extended into the service area designated for the Township. A similar situation exists with respect to the public water system. Public water service from the City of Lowell is extended through Lowell Township to Vergennes Township. The Public Water Service Area map provides both existing and proposed service areas for public water. At the time of this project, the Township is in the process of analyzing the impact of public water in the south central portion of the Township.

The properties immediately west of the railroad tracks, south of Vergennes Road are planned to be served by a small, private collection system. There may be potential in the future to connect this system to a greater number of parcels.

Map 4, Utilities Map available for public inspection at the Township Offices, at 10381 Bailey Drive, Lowell, MI during normal business hours.

CHAPTER 3. POPULATION

Population is among the most important measures to express growth and its likely impact on land uses in the community. Therefore, it is vitally important to achieve an understanding of the Township's population and its growth trends in order to prepare a meaningful and realistic Comprehensive Plan. In this section, the population of Vergennes Township is analyzed and the current and likely future growth trends are discussed.

A snapshot of the historical population growth of the Vergennes community illustrates a trend similar to that found in neighboring communities, the Grand Rapids metropolitan area and West Michigan as a whole. This trend shows a consistent pattern of fairly significant population growth. Such a growth pattern is especially apparent in suburban communities like Vergennes, Ada, Cascade and Cannon Townships.

To begin, it is appropriate to compare the community with its neighbors. Table 1 compares the 35 -year population growth history in Vergennes Township to that of other communities along Kent County's eastern edge. This table also provides population data on Vergennes' neighbors to the east; Boston, Keene, and Otisco Townships in Ionia County. The table shows that some of the communities in southeast Kent County are growing at rates significantly greater than the county as a whole.

**Vergennes Township's
population grew by over
one-third from 1980 to 1990.**

Table 3.1 Comparative Regional Population Growth

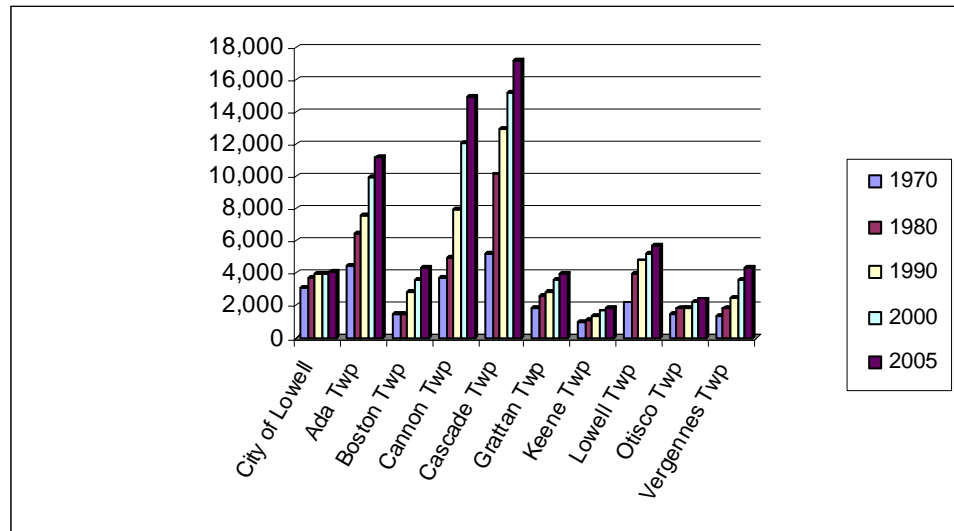
	1970	1980	Annual Increase	1990	Annual Increase	2000	Annual Increase	2005	Annual Increase
City of Lowell	3,068	3,707	2.1%	3,983	0.7%	4,013	0.1%	4,105	0.5%
Ada Twp	4,479	6,472	4.4%	7,578	1.7%	9,882	3.0%	11,165	2.6%
Boston Twp	1,528	1,421	-0.7%	2,852	10.1%	3,635	2.7%	4,309	1.9%
Cannon Twp	3,690	4,983	3.5%	7,928	5.9%	12,075	5.2%	14,954	4.8%
Cascade Twp	5,243	10,120	9.3%	12,869	2.7%	15,107	1.7%	17,094	2.6%
Grattan Twp	1,893	2,575	3.6%	2,876	1.2%	3,551	2.4%	3,906	2.0%
Ionia County	45,843	50,976	1.1%	57,024	1.2%	61,518	0.8%	65,993	1.5%
Keene Twp	947	1,085	1.5%	1,376	2.7%	1,660	2.1%	1,827	2.0%
Kent County	411,044	444,506	0.8%	500,631	1.3%	574,335	1.5%	616,222	1.5%
Lowell Twp	2,160	3,972	8.4%	4,774	2.0%	5,219	0.9%	5,707	1.9%
Otisco Twp	1,479	1,826	2.4%	1,863	0.2%	2,243	2.0%	2,405	1.4%
Vergennes Twp	1,400	1,819	3.0%	2,492	3.7%	3,611	4.5%	4,282	3.7%

Source: West Michigan Regional Planning Commission and U.S. Census Data

Specifically, Vergennes Township's population grew by almost 30% over a decade during the 1970's, representing an increase of over 400 persons by 1980. Further, according to the U.S. Census Bureau, the 1980s brought continued growth, at a higher rate of 37% over ten years. This amounted to over 670 additional persons in the township by 1990. Population increase continued to rise during the 1990s, averaging 45% and totaling an additional 1,119 additional persons. Over the past five years, the average rate of increase has declined only slightly, returning to levels averaging 3.7% annually (or 37% per decade).

Cannon Township has witnessed the most significant and consistent rates of population growth in the region since 1970, averaging 48% growth per decade. However, Ada and Cascade Townships have averaged approximately 30% and 40% growth rates per decade respectively. While the average growth rates of Boston, Keene, and Otisco Townships in Ionia County are not quite as significant as their neighbors to the west, all three have continued to grow at rates matching or exceeding that of Kent County as a whole.

Figure 3.1 Comparative Population Change 1970-2005



Between 1990 and 2000, the population growth of Kent County was 73,704 persons, for an overall 14.7% rate of increase. Vergennes Township and its neighboring communities represented about 15% of the County's 10-year growth during that period.

PROJECTIONS

For the purposes of this Plan, statistical averaging techniques were utilized to project Vergennes's population growth to the year 2030. These approaches are adequate to give a general sense of growth trends but they have limitations especially in areas of rapid growth or decline that may run counter to statistical trends. Nevertheless, they help to give a sense of scale to land use requirements as well as the demand for various public services and capital improvements. The following summarizes the projection techniques.

The Constant Proportion method of projecting population assumes that Vergennes Township will continue to represent the same percentage of Kent County's projected population in the years 2010, 2020, and 2030. Using the Woods & Poole forecasted population for Kent County, the following illustrates the results of the constant proportion method for Vergennes Township.

CONSTANT PROPORTION METHOD

	<u>2005</u> <u>Population</u>	<u>2010</u> <u>Projection</u>	<u>2020</u> <u>Projection</u>	<u>2030</u> <u>Projection</u>
Kent County	616,222	694,570	780,960	909,428
Vergennes Township	4,282	4,861	5,467	6,366

Percent of County's total 2005 estimated population residing in Vergennes Township = 0.7%.

Statistical averaging techniques are useful to give a sense of scale to population growth and land use requirements.

The Growth Rate method projects future population growth or decline based on the rate of growth in the Township in the past. Utilizing the growth rate method, the following assumes that growth in the future will occur at the same average rate as has occurred annually between 1980 and 2000. According to the Census data, Vergennes grew 4.9% annually between 1980 and 2000.

GROWTH RATE METHOD

	Average Annual Growth Rate <u>1980-2000</u>	<u>2005</u>	<u>2010</u>	<u>2020</u>	<u>2030</u>
Vergennes Township	4.9%	4,282	5,331	7,943	11,835

The Arithmetic Method is similar to the growth rate method in that population projections are based on growth that occurred in preceding decades. This method, however, bases population growth on the overall average increase in the number of persons per year, rather than on growth rates. The following projections are based on the average increase of 90 persons annually between 1980 and 2000 in Vergennes Township.

ARITHMETIC METHOD

	Average Annual Increase (Number of Persons)	<u>Population</u> <u>2005</u>	<u>2010</u>	<u>2020</u>	<u>2030</u>
Vergennes Township	90	4,282	4,732	5,632	6,532

The **Building Permit** method may be the most reliable projection method because it portrays the new housing trend based on current building permit data. It was determined that Vergennes Township has issued an average of 39 residential building permits annually over the last seventeen years (1988-2005). Assuming that building activity will continue at this rate, this method utilizes Vergennes’s average household size of 3.12 persons (2000 U.S. Census data), to calculate the growth in population. In other words, this method projects an additional 122 persons per year. Using this figure, the following projects Vergennes’s population using the building permit method.

BUILDING PERMIT METHOD

	Average No. of Permits/ <u>Year</u>	Persons Per <u>Household</u>	2005 <u>Population</u>	<u>2010</u>	<u>2020</u>	<u>2030</u>
Vergennes Township	39	3.12	4,282	4,890	6,107	7,324

⁽¹⁾Based on 1988-2005 building permit data provided by the Vergennes Township Building.

The anticipated population levels for the Township using each of the population techniques are summarized below. By averaging the results of these methods, it is reasonable to predict that the population will approach approximately 4,954 persons by the year 2010, 6,287 persons by the year 2020, and approximately 8,000 by 2030.

Each of the projection techniques illustrated here assumes the Township will continue historic patterns of growth. It is important to keep in mind that growth in housing and population in Vergennes will be impacted by many factors. These include the types and quality of housing permitted or encouraged within the Township, the image of the Township as a desirable place to live, the public school system, and the overall economic health of West Michigan. It is also important to review these trends every few years to monitor the growth that is taking place.

POPULATION PROJECTION SUMMARY

	2005	2010	2020	2030
Constant Prop.	4,282	4,861	5,467	6,366
Growth Rate	4,282	5,331	7,943	11,835
Arithmetic	4,282	4,732	5,632	6,532
Building Permits	4,282	4,890	6,107	7,324
Average	4,282	4,954	6,287	8,014

Calculating an average of the above described methodologies projects an approximate population projection of 8,014 residents in Vergennes Township by the year 2030. However, this projection is based on previously experienced models for growth. As illustrated in the 1999 Master Plan, the projected population for 2000 was 3,544 persons, whereas, according to the U.S. Census Bureau, the Township population reached 3,611, a 1.9% increase above the projection. Further, Vergennes Township has experienced an approximate 8% increase in the growth rate over the past thirty years. If one were to account for that increase as well, the 2030 population projection would approach 9,000 persons.

Age Characteristics

Comparing the age distribution of a community over time provides another opportunity to measure change. Also, an age breakdown of a community's residents helps to determine the type of housing demands and recreational facilities that may be needed. Table 2 compares the age distribution of Vergennes Township and Kent County in 1990 and 2000.

The median age represents the mid-point in the range of all ages within the Township with one-half the population younger and one-half the population older than the median. Typically the median age is viewed as an appropriate measure of the overall age of the population.

Paralleling national trends, the population of Vergennes Township is aging. In 1990, the median age of Vergennes was 31.0 years. By 2000, it had risen to 34.4 years. This places the median age of

Vergennes Township on “par” with other communities in the County. Overall, Kent County witnessed a modest increase in median age of almost three years, shifting from 30.7 years in 1990 to 32.5 in 2000

From 1990 to 2000 the percentage of the Township’s population of preschool age children (i.e. under 5 years) witnessed an increase of 14%. Whereas the following groups of “school aged kids” (i.e. 5 to 19 years) and the “college years” group (i.e. 20 to 24 years) dropped slightly in terms of the Township’s overall population. By contrast, the number of school-age children in Kent County as a percentage of total population has increased slightly over the past decade. The County’s “college years” age group also decreased by 40%. A general decline in the number of young adults in the Township is likely a result of the increasing necessity for higher education in the United States and the distance required for local students to commute to and from a regional college campus. Further, cross referencing this statistic with the median household income levels in the Township would indicate a greater ability of families in Vergennes to afford higher tuition rates at large universities elsewhere in the state and the country.

Figure 3.2 Age Comparison 1990-2000

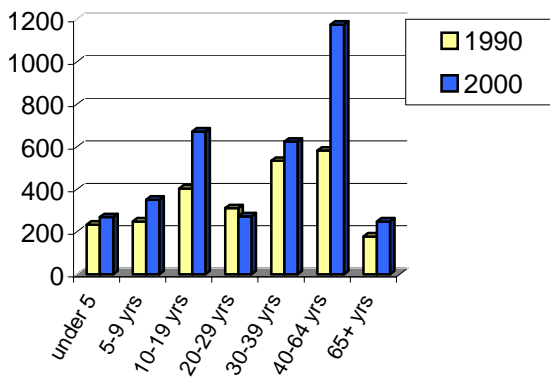


Figure 3.3 Population Increase by Age

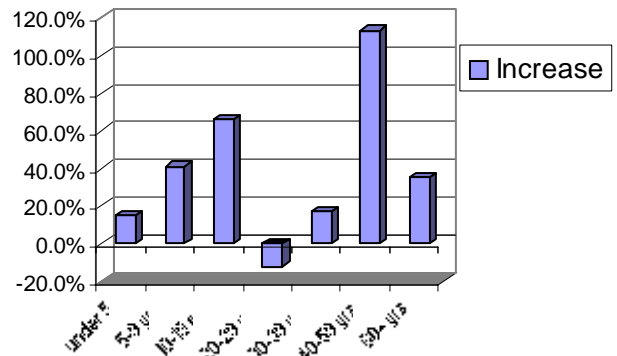


Table 3.2 Comparative Age-Group Populations

Age Group	Vergennes Township				Kent County			
	1990	% of Total	2000	% of Total	1990	2000	% of Total	% of Total
Under 5 years	234	9.4%	269	7.5%	43,731	8.7%	44,533	7.8%
5-19	653	26.2%	1,022	28.3%	112,498	22.5%	135,357	23.6%
20-29	311	12.5%	273	7.5%	87,121	17.4%	85,002	14.8%
30-39	534	21.4%	624	17.3%	87,881	17.6%	90,206	15.7%
40-54	416	16.7%	941	26.1%	78,305	15.6%	119,039	20.7%
55-64	166	6.7%	233	6.5%	37,088	7.4%	40,575	7.1%
<u>65 and older</u>	<u>178</u>	<u>7.1%</u>	<u>249</u>	<u>6.7%</u>	<u>54,007</u>	<u>10.8%</u>	<u>59,625</u>	<u>10.4%</u>
Total	2,492	100.0%	3,611	100.0%	500,631	100.0%	574,335	100.0%
Median Age			34.4				32.5	

The age groups comprised of people aged 30 to 54 are important as they represent the prime wage earning population as well as a large portion of the principal child-rearing population. In both the Township and the County, over 40% of the population falls within this age group.

A high percentage of the population in the 25 to 54 years range translates into family formations, the need for single-family housing stock, recreational facilities, future increases in the under 5, and 5 to 19 years age groups, and increases in retail trade.

The 40-54 year age group has increased by more than 55% since 1990, while the population of children between 5 and 19 has increased only 8% and the population of children under 5 has decreased by 20%. This represents a marked decline in the proportion of adults with children residing in the Township. The Township has also experienced a decline in the percentage of all other age groups.

While the overall numbers are increasing, the ratio of twenty and thirty year olds, as compared to the total population, is decreasing. This is a trend that is consistent with a large majority of communities in the nation. This age group more typically migrates toward urban centers, where economic and cultural activity is more prevalent.

The “empty nesters” group (55 to 64 years) comprises about 6.5% of the Township’s residents, only slightly lower than the County as a whole. Persons in this age group typically have reached their peak earning potential and have higher disposable incomes. Over the coming decade, this percentage will likely increase dramatically as

40-54 year olds currently make up the largest portion of Township residents.

The age group of 65 and older has decreased by less than one-half of a percent since 1990 . Approximately 10.4% of the County population is comprised of senior citizens, whereas only 6.7% of the total population in Vergennes is made up of this age group. However, over the coming decades, if current residents choose to remain in the Township into their retirement, this population segment will also increase dramatically.

School Districts

The quality of the local school system is generally an important consideration for families choosing a place to raise a family. In Vergennes Township, residents are served by one public school system, Lowell Area Schools, which continues to rank highly as compared to others in Kent County).

In 2005, the Lowell school system performed an enrollment projection study of the student population up to the 2008-'09 academic year. Significant increases in student enrollment are not projected over the next three to five years. A fairly moderate ebb and flow of students is predicted through 2009 with approximately half of the grade levels experiencing small annual declines in student populations during two of the four years projected. These projections are substantiated through an annual evaluation of housing starts within each of the communities located in the district. Further, these projections assist the school district in determining the building capacity needs at each grade level. Based on these projections it is not likely that new facilities will be required in the near future. However, it will continue to be important for the Township to inform the school district of the areas planned for future residential growth at the conclusion of this comprehensive planning process. Also, the Township should continue informing the school system of approved and proposed residential developments.

In Vergennes Township, residents are served by one public school system, Lowell Area Schools, which ranks among the top five in quality as compared to others in Kent County...

Educational Attainment

Table 3, below, compares the educational attainment of Vergennes Township and Kent County. As shown, the residents of Vergennes (25 years and older) rank markedly higher in the percentage of high school graduates, persons with Associates Degrees, and/or some college than the County. However, in terms of persons with a

bachelor’s degree or higher, the Township is only slightly higher. Regardless, this moderate level of persons with a bachelor’s degree or higher, typically indicates a community of professionals with increased ability to contribute to the local economy.

Table 3.3
Education Attainment
Vergennes Township, Kent County, and the State of Michigan
2000

	High School Graduate, Associates Degree, <u>and/or</u> <u>Some College</u>(%)	Bachelor’s Degree <u>or Higher</u> (%)
Vergennes Township	66.7%	27.4%
Kent County	58.8%	25.8%

Source: U.S. Census Bureau

CHAPTER 4. INCOME, HOUSING & ECONOMIC DEVELOPMENT

This chapter reviews current indicators of growth in the Township relating to housing values, income and economic development. Housing growth generally parallels the expansion of the local population, however housing values continue to increase more rapidly than incomes. Since Vergennes Township is characterized as a “bedroom community,” a primary challenge to the Township will be the impact of current residential growth on infrastructure, roads and the local quality of life.

Incomes

As shown in Table 4.1, the median household income in the Township in 2000 was \$61,500, placing Vergennes Township higher, in terms of family income, than many of its neighboring communities with the exception of Ada , Cannon, and Cascade Townships. For perspective, these figures should also be compared to Kent County as a whole. In 2000, the median household income in the County was \$43,074. Vergennes’ median household income was more than \$18,000 (\$11,000 greater than the County’s), placing Vergennes in the top one-third of all communities in Kent County.

Interestingly, Vergennes’ per capita income (\$21,339) was slightly lower than the median of the County as a whole (\$21,629). This is likely indicative of larger family sizes and an increase in the number of stay-at-home parents in Vergennes Township.

In Kent County only 1% of the workforce is in the farming profession as compared to 5% in Vergennes Township itself.

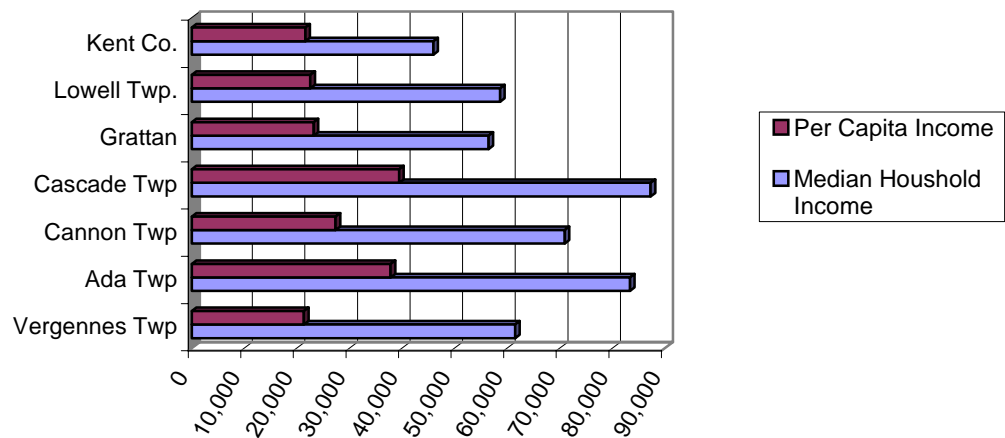
Employment

Table 4.2 compares the professions of the residents of Vergennes Township to that of Kent County as a whole in 2000. According to the U.S. Census, the largest category of the Township’s workforce (34.7%) is employed in a professional or managerial occupation. Other significant professions of Vergennes Township residents include sales and office positions (28.5%) and production and transportation positions (18.7%). Overall, Vergennes Township has a well-diversified workforce consisting of high to moderate paying jobs. Comparing the occupational employment of residents in Vergennes to those in the remainder of the County illustrates that Vergennes is highly representative of countywide trends in employment.

Table 4.1
Income Characteristics
Vergennes Township and Surrounding Communities

	2000 Per Capita Income	Median Household Income
Ada Township	\$37,840	\$83,357
Boston Twp	\$18,836	\$43,172
Cannon Twp	\$27,383	\$70,925
Cascade Twp.	\$39,470	\$87,290
Grattan Twp.	\$23,213	\$56,467
Keene Twp	\$18,017	\$50,114
Lowell Twp	\$22,560	\$58,639
City of Lowell	\$17,843	\$42,326
Otisco Twp	\$21,674	\$45,042
Vergennes Twp	\$21,339	\$61,500
Ionia County	\$17,451	\$45,980
Kent County	\$21,629	\$43,074

Figure 4.1 Comparative Income Characteristics (Kent Co. 2000)



Source: U.S. Census Bureau

Table 4.2 Occupational Comparison, 2000

Occupation	Vergennes	Kent
Management/Professional	34.7%	31.1%
Service	8.8%	13.3%
Sales & Office	28.5%	26.8%
Farm & Forestry	0.7%	0.4%
Construction/ Maintenance	8.7%	7.7%
Production & Transportation	18.7%	20.7%

Source: U.S. Census Bureau, 2000: Employed persons 16 years of age and older.

Single Family Construction Activity

Table 4.3, on the following page, shows the building permit activity for new housing starts since 1999.

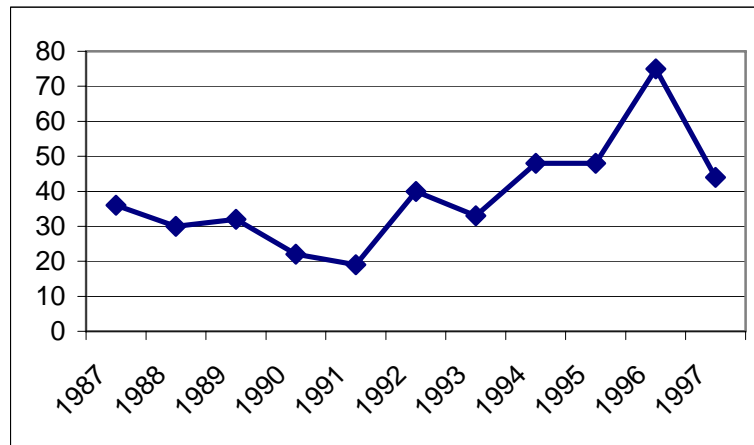
Residential building permit activity in the Township has fluctuated for the past eight years, although has generally decreased since approaching the historic high of 75 permits in 1996. Table 4.3 reflects the trends of the past eight years, indicating a total of 262 new residential building permits, for an annual average of about 33 permits per year. However, it should be noted, the number of permits per year has varied by more than 20 permits from one year to the next..

Since 1987, Vergennes Township issued a total of 427 new residential building permits, or 39 new homes per year, on average.

According to the U.S. Census Bureau, in 2000, about 95.6% of the Township’s housing stock was owner-occupied, with 4.4% renter-occupied. Further, in 2000, 96% of the housing stock was considered single-family units, 1.3% (16 units) were attached condominiums, 0.6% (8 units) were duplexes, with the remaining 2% being mobile homes or other.

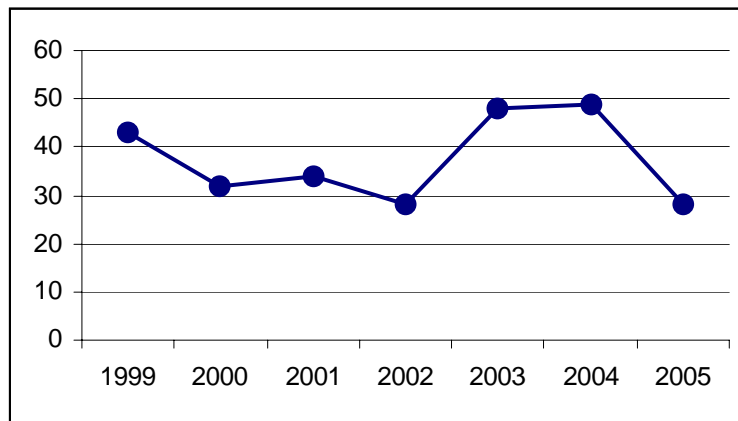
In 2000 (as per U.S. Census Bureau), the Township had 1,145 single-family units. Based on the building permit information provided in Table 4.3, the Township had about 1,364 single-family units by 2005 .

Figure 4.2 Residential Building Permits 1987-1997



It is helpful to compare the most recent trends to the growth pattern that has occurred over the previous decade. Figure 4.3 depicts the residential building permits issued for new housing starts from 1989 to 1999, while Figure 4.4 depicts the residential building permits issued from 1999 to 2005.

Figure 4.3 Residential Building Permits 1999-2005



In order to place both of the patterns in perspective, figure 4.5 depicts all of the residential permits issued for new housing starts between 1987 and 2006.

Figure 4.4 Residential Building Permits 1987-2005

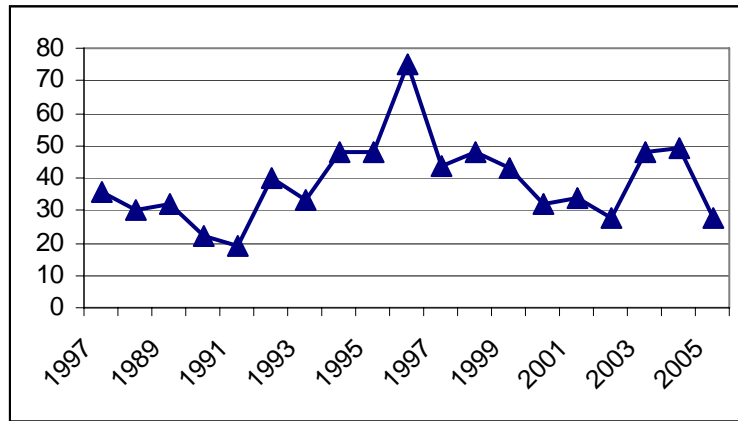


Table 4.3. Building Permits 1999-2005

	Residential	Commercial	Industrial
1999	43	1	0
2000	32	0	1
2001	34	1	1
2002	28	1	0
2003	48	0	0
2004	49	0	0
2005	29	1	0

Comparing this 4.4% annual rate of population growth to the 4.8% annual rate of growth in the housing stock indicates that the demand for new housing has kept up with the supply

In terms of housing values, the overall housing stock in the Township has risen sharply in standard equalized valuation (SEV) over the past eight years. In 1999, the combined total equalized value (i.e., about 50% of market value) of all housing in the Township was just over \$91 million. By 2006, this figure had increased by 80% to \$163.7 million, for an average annual rate of increase of about 10% since 1999 (Vergennes Township Assessor’s Office). While it is not possible to determine a long-term trend from this data, it does suggest that the value of new construction is increasing at a rate somewhat higher than is the value of the entire housing stock.

Finally, it is appropriate to compare the growth in housing values with overall income growth in the Township. From 1980 to 1990, median family income in the Township increased from \$22,435 to \$43,164, for an average annual growth rate of 8.4%. From 1990 to 2000 (the most recent year for which income information is available), median family income increased from \$43,164 to \$62,313, for an average annual growth rate of 4.4%.

A very limited share of the land in Vergennes Township is dedicated to industrial and commercial land uses. These growth of these non-residential uses has taken place in neighboring communities such as Cascade, Ada, and the City of Lowell

Although the population increase has continued to parallel the housing supply, family incomes have not kept pace with housing costs. In 1990, the median home mortgage annual payment was \$8,856, or 20% of median annual mortgage payments in the Township. By 2000, the median home mortgage annual payment had risen to \$14,820, now 24% of median income. Although the local housing supply was more affordable for Vergennes residents in 1998 than it is today, the current ratio of mortgage to income remains much lower than the national standard for affordable housing (28%).

Commercial and Industrial permit activity. As shown in Table 4.3, new commercial and industrial development in the Township has been slow. The majority of these uses are located along Lincoln Lake Avenue, within close proximity to the City of Lowell. Presently less than one percent (1%) of the Township’s land cover is commercial or industrial uses.

Economic Development

A very limited share of the land in Vergennes Township is dedicated to industrial and commercial land uses. The growth of these non-residential uses has taken place in neighboring communities such as Cascade, Ada, and the City of Lowell. The existing land use map (Map 6) illustrates the extent and location of commercial and industrial uses.

However, since 1999 industrial property values in the Township have increased from \$2.5 million state equalized value (SEV) to more than \$5.7 million in mid 2006, an average annual rate of increase of nearly 16.2%. At the same time, the value of commercial properties has grown more moderately, from \$1.8 million to \$3.2 million, an average annual rate of increase of 10%. It should also be noted that commercial state equalized value has fallen slightly between 2005 and 2006. In mid 2006, commercial and industrial properties constitute a combined 4.7% of total property values in the Township, whereas residential properties account for 87% of total property valuation.

Agricultural property has consistently represented just over 8% of total property valuation in the Township over the past eight years.

Also important to the Township is the value of agricultural property. In 1999, the SEV was \$8.9 million, and in mid-2006 it is \$16.4 million, representing an annual growth rate of 10.5%. Agricultural property has consistently represented just over 8% of total property valuation in the Township over the past eight years.

Regionally, the economic growth and overall strength of the local economy is fairly strong. A report published by the U.S. Department of Labor and the Bureau of Labor Statistics found that labor growth in the Grand Rapids area² is currently on track for a 10.86% annual growth rate across eleven industries in 2006. The medical and construction industries are slated to experience the largest growth rates over the current year, with monthly growth rates for the first half of the year equaling 2.3% and 1.8% respectively. Further, the Seidman School of Business of Grand Valley State University³ reports that the Grand Rapids Metropolitan Statistical Area has seen increases in new residential building permits well above the remainder of the State of Michigan.

² Data extracted July 28th, 2006. www.bls.gov U.S. Dept of Labor: Bureau of Labor Statistics

³ Seidman College of Business. 2005. *Demographic Profile for Grand Rapids and Lakeshore Areas 2005*

CHAPTER 5. LAND USE AND DEVELOPMENT PATTERNS

The total land area of Vergennes Township is about 36 square miles or 23,050 acres. Vergennes is located in the southeast quarter of Kent County surrounded by the Townships of Grattan, Lowell, Keene (Ionia County) and Ada and the City of Lowell.

The Township continues to experience “large lot” residential growth pressures in its rural areas....

The land uses in Vergennes Township are reflected in the Existing Land Use map. The Land Use map is based on a 2006 windshield survey and inventory by Williams & Works. The land uses in the Township have been consolidated into categories as follows:

LAND USE CATEGORY

<u>CLASSIFICATION</u>	<u>LAND USE DESCRIPTION</u>
Country Residential	One-family dwellings on large parcels of land (2.5 acres+)
Low Density Residential	One-family dwellings (2.5 acres or less)
Commercial	Primary/central business district, shopping center/mall, offices, secondary/strip mall, retail
Industrial	Industrial, utilities, assembly manufacturing
Public/Semi-public	Public buildings, parks, golf courses, and facilities
Institutional	Schools, churches, etc.
Agricultural	Cropland, orchards, permanent pasture, other agriculture
Vacant/Open land	Vacant and/or unused land

The following provides a brief description of the existing land uses in Vergennes Township. This chapter is one of the most important in terms of understanding the conditions of the Township.

The Township is experiencing strong growth pressures and the effects of growth and development are impacting its natural features.

The most predominate current land uses are wooded forests, open fields, and agricultural lands, making up approximately two-thirds of the Township’s land cover. Commercial and Industrial activities utilize only about one percent of the Township’s land, although residential activities

are occupying an increasingly large portion of land area, now comprising almost a third of total land area.

The frontage along most arterial roads in the Township has been developed into larger acreage single-family home sites, typically ranging from 5 to 20 acres. Housing development in Vergennes Township tends to be directed toward middle and upper income home buyers. Mobile and modular homes and apartment developments have, for the most part, not occurred in the Township.

ADJOINING LAND USES

It is important to consider existing and future land uses in Vergennes Township in the larger context of the eastern Kent County region. This is true since patterns of growth and development frequently “spill over” from one jurisdiction to the next. This section briefly describes the land uses in Grattan Township to the north, the Keene Township to the east and Lowell Township and the City of Lowell to the south, and Ada Township to the west.

Vergennes’ neighboring Townships don very similar uses to those within Vergennes itself. The eastern third of Ada Township is predominantly large lot home sites and agricultural land, similar to Vergennes. Grattan Township is much the same. Keene Township, is almost entirely farm, forest and open land. Keene, which is in Ionia County, is one of the few Townships in Ionia County that maintains a zoning ordinance. Lowell, is the area’s largest growth center. The City of Lowell has begun to spill its growth into Vergennes Township. Lowell’s development patterns are more dense and serviced by public sewer and water. The growth area in Vergennes Township at the perimeter of the City of Lowell lends itself well to future development. This creates a natural growth area around the city to be targeted for residential housing and to prevent the larger dispersal of new residents.

Map 5, Existing Land Use Map available for public inspection at the Township Offices, at 10381 Bailey Drive, Lowell, MI during normal business hours.

CHAPTER 6. TRANSPORTATION

An assessment of past, current, and future transportation conditions within the Township was completed in 1997. The purpose of this examination was to determine the current state of the transportation system, identify existing and potential future transportation deficiencies.

The bulk of this project involved the collection of existing data from the Michigan Department of Transportation (MDOT), the Kent County Road Commission (KCRC), the Grand Rapids and Environs Transportation Study (GRETS), and from the files of ESA Traffic Consultants. The following describes the material that was obtained

CONNECTIONS

All of the Township's major arterials are paved yet most other connections in the Township remain unpaved and unimproved.

Transportation linkages between Vergennes Township and the remainder of the community are fairly good. The arterial road network is laid out in a traditional grid pattern on section and half-section line intervals, with collector and local streets adjoining as appropriate. Internal circulation within subdivisions and residential neighborhoods is generally accomplished on either paved or gravel streets. All of the Township's major arterials are paved yet most other connections in the Township remain unpaved and unimproved.

Vergennes Township is characterized as a bedroom community in which most people who live in the Township travel outside of its boundaries to reach an employment sector. Residents of Vergennes Township as well as nearby communities are "bottle necked" into a few main arterial roads, which serve a substantial volume of traffic. The community lies immediately south of M-44 and north of M-21. Both are regional east-west connectors.

TRAFFIC

Traffic volumes are an important indicator of growth and development. These are reported as two-way average daily traffic (ADT) counts as recorded by ESA Traffic Consultants Inc. These counts were taken in 2004 and are felt to reflect current traffic volumes. Of course, as development increases in the Township, these volumes are likely to be somewhat greater.

Over 9,200 additional car trips per day will be generated in the Township.

The most heavily traveled street segments are Lincoln Lake Avenue north of Bailey (8,703, ADT 2002) and Lincoln Lake Ave. south of Bailey (9,165, ADT 2002), as well as Vergennes Street west of Alden Nash (4,682, ADT 2003) and Vergennes Street east of Alden Nash

(5,190, ADT 2004). Higher volumes are found along Bailey and along much of Alden Nash, as well.

Increased volumes of traffic along arterials may be anticipated with further expansion of the housing stock. A typical single-family residence generates about 9.57 trips per day.⁴ The population of the Township will increase by about 3,616 persons by 2030, and if the average household size remains at 3.13 persons, increased traffic flow will be inevitable. With these simple “rule-of-thumb” standards, it is likely that over 24,000 car trips per day will be generated within the Township. These estimates do not take into account additional trips emanating from outside the Township and either passing through to destinations elsewhere or destined for local facilities.

MASS TRANSIT

The Vergennes Township currently is not serviced regularly by any transit provider. Some quasi-public providers such as Hope Network make personalized trips upon request.

Air transportation is available through Kent County International Airport located on Patterson in Cascade. Commercial air service is provided by seventy-five arrivals and departures on seven commercial air carriers. Kent County provides turbo-prop and jet service to regional hubs in Detroit, Chicago, Pittsburgh, Cincinnati, Cleveland and Minneapolis.

Lowell has a small airport for general aviation only. With a runway of about 2,500 feet, this facility is limited to small propeller-driven general aviation aircraft. It is important that the land uses surrounding the airport are planned as fairly intensive and compatible uses to the traffic patterns generated by the airport. Commercial and Industrial land uses will likely be most compatible, and where utilities can be extended from the City of Lowell, these land uses should be highly encouraged by the Comprehensive Plan and Zoning Ordinance along Lincoln Lake Ave.

⁴ Institute of Traffic Engineers, *Trip Generation*, 5th Edition, 1991.

CHAPTER 7. IMPLICATIONS

The preceding discussion described existing conditions relative to the physical, demographic, and economic aspects of Vergennes Township. As the Planning Commission proceeds with the preparation of an updated Comprehensive Plan, it is appropriate to outline the implications of this information. The following paragraphs summarize some of the key implications inherent in the existing situation in the Township.

1. **Soils and Groundwater.** According to the Soil Survey information, most of the soils in the Township present on-site wastewater disposal and structural engineering challenges for development. It is appropriate to note that the Soil Survey is general in scope and should not be used to determine the suitability of a specific site for septic purposes. There are many examples of approved systems in areas generally mapped as unsuitable for an on-site system.

Furthermore, the Kent County Health Department reports increasing problems with older on-site septic tank wastewater system failures in many areas. In Vergennes Township the most common pattern of land use has been large lot residential. However, today's market, to the liking of many communities, has promoted open space or "clustered" housing subdivisions, which allow houses closer together while preserving significant open space. Given the limited public sewer available throughout the Township, the soils in Vergennes Township may create difficulties for these types of clustering developments.

2. The Township of Vergennes is located in a highly desirable country setting and within acceptable commuting distances to major employment centers. It is expected that the township will continue to witness development pressures. Population growth in the Township has increased and is still relatively strong when compared to most area communities. This growth implies continued change in the physical characteristics of the Township. An estimated 1,119 additional residents moved into the Township from 1990 to 2000 and by the year 2010, an additional 1,343 persons are anticipated. While the rate of growth is expected to decline slightly between 2010 and 2030, an average of 1,000 more residents per decade is likely. This equates to a need for an additional 1,200 housing units by the

This equates to a need for an additional 800 housing units by the year 2020, assuming about 2.8 persons per household, on average.

year 2030, assuming about 3.13 persons per household, on average.

3. As the population of the Township ages, the local government may be faced with increasing demands for zoning of new types of services. These may include alternative recreational facilities, improved access to shopping and, eventually, assisted living facilities.
4. The land uses in the Township are disproportionately weighted to residential as opposed to commercial or industrial uses. Residential development currently comprises 87% of total property value in the Township. Typically residential uses require between \$1.10 and \$1.30 in municipal services (i.e., schools, police, fire, roads, parks, etc.) for every \$1.00 contributed in tax base.⁵ On the other hand, agricultural, commercial and industrial land uses tend to be revenue producers. The implication of the disproportionate reliance on residential tax base is that as more services are demanded, residential tax payers must be prepared to shoulder a larger share of the revenue burden than their neighbors in communities with a more balanced tax base.
5. The areas within the Township likely to experience more rapid growth in the near term will be those with attractive natural features, availability of “percable” soils or public water and wastewater services. Most of those parts of the Township that meet these criteria are already experiencing significant development. However, as this trend continues the Township will likely witness the bulk of its growth in the next twenty years. This is likely to require the Township to provide a good deal of additional services in the short term. These services might require a number of things including additional police and fire protection, re-zonings, or wastewater alternatives.
6. The significant percentage of 10-20 acre parcels already in existence in the developed, but un-platted portions of the Township are likely to lead to further requests for land divisions. Each parcel of 10 acres or more may be divided a minimum of four times. As the market demands more development sites, homeowners may seek to maximize their investment in land by splitting off additional sites. This pressure for growth and

⁵ Thomas, Holly L. *The Economic Benefits of Land Conservation*, Planning & Zoning News, January, 1993.

development within the Township will also likely impact owners of larger parcels, potentially decreasing the amount of agriculturally viable farmland.

It is appropriate for the Township to create opportunities for a variety of housing to assure that there is some degree of parity between the rate of housing and population growth.

7. The Zoning Ordinance is the primary implementation mechanism for this Plan. However, the Zoning Ordinance is intended to regulate current land uses while this Plan addresses future land uses. It may be necessary to update the Ordinance to conform to the objectives in this Plan. These updates will identify regulatory mechanisms that may be implemented to further the goals, objectives and strategies of this Plan. The implementation of a Purchase of Development Rights program requires a small addition to the zoning ordinance, although often holds the potential to preserve significant portions of land. This will require the designation of specific land areas which will be considered high priority for preservation.

Other updates may include a revision of the Zoning Map to support the land use map or a revision of some zoning classifications to better conform to the land use designations in this Comprehensive Plan. In other areas, it may only be necessary to evaluate the zoning districts against the land use plan and determine what future events may trigger re-zonings. In addition, the Ordinance should be evaluated for flexibility to address innovative development techniques and for measures to control inefficient development patterns.

8. As the Township begins to consider more options for commercial uses, the preferred uses should be well delineated in the Zoning Ordinance. The Township should decide what types of commercial businesses suite their vision and how those businesses serve the community.
9. Significant portions of the township are covered with dense woodlands. These areas, together with the wetlands, lakes and the Flat River, provide important wildlife refuge and scenic amenities for the community. The Flat River area in particular provides attractive valleys and recreation opportunities for area residents. As the Township continues to grow, a network of greenway corridors may be encouraged throughout the Township to provide pedestrian and non-motorized pathways to connect important open lands, nodes of green areas and activity centers.

10. The majority of the Township has a rural flavor as it is identified with scattered homes on large acre parcels with a balance of larger tracts of farmlands, fields, and open areas. A major challenge facing the Township is to find a balance and harmony in protecting the farmer who still wants to farm and directing growth in appropriate areas while still maintaining the rural character of the Township. The community will need to continue to seek methods of preservation and protection, allowing landowners a desirable amount of flexibility.

SECTION III. COMPREHENSIVE PLAN

This section of the Plan is the culmination of the entire planning process. It includes the overall goals and objectives of the Township as development through the futuring process and the Community Opinion Survey and ultimately as expanded in the preparation of this plan. It also sets forth in Chapter 9 the Land Use Plan and map for Vergennes Township. Finally, in Chapter 10, the Comprehensive Plan offers a framework for the implementation of the Plan.

CHAPTER 8. GOALS AND OBJECTIVES

The residents of Vergennes Township place a high value on individual property rights, the natural features of the community, and the access to nature afforded by the Township's rural residential character. While the Planning Commission and the Township Board recognize that growth of the Township's population is expected, that growth should be managed to minimize its impact on the essential character of the community. Furthermore, to the extent feasible, the Township is committed to managed growth, which enhances the community's natural features as well as agricultural productivity while preserving individual property rights. Therefore, the essential purpose of this Comprehensive Plan is:

To protect, encourage and retain the tradition of agricultural productivity and the integrity of the rural residential character in Vergennes Township.

Planning goals and objectives must be founded on the fundamental values of the citizens of Vergennes Township. They advance those values and shape the Comprehensive Plan. An effective goal statement must describe a desired condition or end state the community seeks to achieve and it must enjoy broad-based support within the community. Generally, a goal statement should look twenty to twenty-five years into the future and be stated in positive terms. An objective statement is often described as a milestone or sub-element of the goal. Objectives are more specific than goals and should have some measurable aspect so that progress toward the objective may be noted.

The result is a series of seven broad goal statements each supported by more specific objectives. This plan is founded on the policies outlined in the following statements. The goals are intended to describe a desirable end state or the condition of the Township about twenty-five years into the future. They are intentionally general but all are felt to be attainable through concerted effort. The objective statements tend to be more specific and may be regarded as milestones in the journey to achieve the larger goal.

1. AGRICULTURE/ FARMLAND PRESERVATION.

Vergennes Township will be recognized as a community of viable agricultural operations located on prime soils and protected by encroachment from more intense development.

Objectives

- A. The Township will identify the highest quality and most productive agricultural areas, and work with landowners to develop feasible mechanisms to preserve those areas for farming purposes.
 - 1) Participate in State and County Purchase of Development Rights (PDR) programs.
 - 2) Explore the possibilities of Transfer Development Rights (TDR), and implement this process via a non-contiguous PUD or other mechanisms where possible.
- B. Review and adjust the zoning ordinance to enhance flexibility and adaptation to traditional and modern agriculture related activities.
- C. Land division regulations in the Township will be implemented to discourage the fragmentation of viable agricultural lands.
- D. To enable viable farming operations to remain active, regulatory mechanisms will be maintained or improved, if necessary, to address potential off-site impacts from such intensive agricultural operations as concentrated feeding and animal waste management.

2. GENERAL DEVELOPMENT.

Land uses in Vergennes Township should attempt to protect and preserve the natural features of the area.

Objectives

- A. The key natural features, including lakes, the Flat River, wetlands, and woodlands, of the Township will be identified and specific strategies to protect endangered areas will be developed.
- B. The Township will utilize land use regulatory measures that promote the protection of natural features.
- C. Smaller lots could be permitted in areas served with public sewer and water utilities, if applicable.
- D. Development techniques that retain large, un-fragmented parcels will be encouraged.
- E. Within developed areas, the Township will implement programs to eliminate or reduce the effects of incompatible land uses.

3. RESIDENTIAL DEVELOPMENT.

A variety of development options will be available, which preserve and enhance the area's natural beauty, to serve a broad spectrum of preferences and income levels.

Objectives

- A. Development options will be carefully and thoughtfully located in respect to natural features, suitability of soils for on-site utility systems or availability of public sewer and water, and area needs.
- B. Residential densities will continue to reflect the rural character of the community.
- C. Development techniques that promote the rational use of land and the preservation of natural features will be encouraged.

4. COMMERCIAL/INDUSTRIAL DEVELOPMENT.

Where allowed, commercial/industrial development in Vergennes Township will be attractively arranged to serve the local community and its visitors.

Objectives

- A. Low intensity neighborhood convenience commercial uses are anticipated in portions of the Township to serve nearby population concentrations.
- B. Site development standards will be implemented to improve and promote the aesthetic appeal and efficiency of commercial/industrial areas to be in harmony with the natural features of the area.
- C. Commercial/industrial land uses will be arranged to provide safe and efficient pedestrian and automobile circulation and linkages to residential areas.

5. RECREATION, OPEN SPACE AND NATURAL AREAS.

The sensitive natural areas will be carefully preserved and the open lands and recreational amenities of the community will be expanded and improved to serve the needs of residents and visitors alike, while preserving individual property rights.

Objectives

- A. Continue and strengthen measures to protect such sensitive natural features as the Township's lakes, wetlands, woodlands, the Flat River and its tributaries and other streams.
- B. Coordinate improvements to public and private sector recreation facilities and services to meet the needs of residents and visitors to the area.
- C. Township plans and procedures will seek to minimize land use conflicts between recreation facilities and residential areas.

6. TRANSPORTATION.

The transportation system of Vergennes Township will be designed to effectively serve the community's land use and growth objectives, providing residents with safe and efficient linkages within the community and to the broader region.

Objectives

- A. Road improvement decisions will be made in accord with the Township's Master Land Use Plan.
- B. Optimize the transport functions of major arteries within the community and encourage effective access management procedures to maintain efficient traffic flow along arterials.
- C. Permit land uses and encourage site design configurations that provide efficient on-site circulation for both pedestrian and vehicular traffic.

7. UTILITIES.

The public utilities of Vergennes Township will be located and designed in accord with local development plans, and system improvements will be coordinated on a rational and efficient service-area basis. Greater intensity of land use will be concentrated in areas where public utilities are readily available.

Objectives

- A. Make water and wastewater improvement decisions in accord with the Township's Master Land Use Plan.
- B. Assure adequate water and wastewater capacity to efficiently meet the residential and commercial land use needs of the Township.
- C. Restrict the use of public water and sewer facilities in areas planned for agricultural land uses.
- D. Manage storm water runoff to minimize impacts on streams and wildlife habitat and work with the Drain Commissioner to establish consistent guidance for storm water management.

CHAPTER 9. LAND USE PLAN

The Land Use Plan is a compilation of descriptions and justification for land use in Vergennes Township.

The Vergennes Township Comprehensive Plan establishes general patterns of land use to guide growth and development for the next twenty to twenty-five years. The over-arching intent is to foster efficient patterns of development that preserve the community's agricultural economy, rural character and important natural features, as identified in the 2005 Natural Features Inventory, while accommodating growth anticipated to reach about 1,100 additional housing units by the year 2030. To this end, this Plan attempts to concentrate growth in a target area of the Township. This Land Use Plan seeks to promote efficient and aesthetic growth within this area while promoting the preservation of farmlands, open lands, and the rural character of the community outside of this area.

The Land Use Plan is a compilation of descriptions and justification for future land use in Vergennes Township. It serves as an overall framework for the management and regulation of future development and also serves as the basis for evaluating rezoning requests. Because of the constant change in our social and economic structure and activities, the Plan must be maintained through periodic review and revision so that it continues to reflect contemporary trends while maintaining long-range goals.

The Land Use Plan is general in scope by design. It is not, in most cases, intended to establish precise boundaries of land use or exact locations of future uses. It is also important to note that there is no schedule to implement the recommendations contained here. The timing of a particular land use is dependent upon a number of factors such as availability of public utilities, provisions for adequate roadways and pedestrian ways, effect on public services and the demand for a particular land use versus the lands available and zoned use. Those and other factors, must be considered when reviewing a request for rezoning a particular parcel of land.

By encouraging development within the growth area, it should be possible for the Township to continue to protect and preserve significant tracts of important natural features and to promote high quality residential development in a form that complements those features. The following describes each of the future land use designations as illustrated on Map 7.

PLAN ASSUMPTIONS

The goals and policies previously outlined and analysis of the Township's physical, social and economic makeup have allowed the formulation of seven broad assumptions that were used in the development of a long-range development plan. These include:

1. The majority of the Township has a rural flavor as it is identified with scattered homes on large acre parcels with a balance of larger tracts of farmlands, fields, and open areas.
2. The Township is characterized as a bedroom community where most residents travel outside of its boundaries to reach an employment sector.
3. Major access to the Township is via Lincoln Lake Avenue which traverses the community from north to south and intersects with M-21 just south of the Township in the City of Lowell. Vergennes Street is the major east/west route and to a lesser degree 2 Mile Road. Interstate I-96 is located approximately four and one-half miles further south.
4. While active farmlands exist throughout the Township, the largest acreage concentration of agriculture is present in the northwest quadrant of the Township (north of Vergennes Street and west of Alden Nash Avenue).
5. The eastern third of the Township is traversed by the Flat River which provides attractive valleys and recreation opportunities for area residents as well as important habitat for wildlife.
6. Significant portions of the Township are covered with dense woodlands. These areas, together with the wetlands associated with the Township's lakes and the Flat River, provide important wildlife refuge and scenic amenities for the community.
7. The topographic variation in the Township contributes visual interest and privacy and by itself is an important natural feature.
8. According to the to Kent County Soil Survey, several acres considered to have "prime farmland soils" exist in the western half of the Township, especially in the northwest

corner. (It is important to note that these prime farmland soils relate only to local conditions)

9. Growth. The Township of Vergennes is located in a highly desirable country setting and within acceptable commuting distances to major employment centers. It is expected that the Township will continue to witness residential development pressure.
10. Soils. According to the Kent County Soils Survey, in general, a majority of the soils in Vergennes Township present development challenges with regard to septic systems but each site needs to be evaluated on its own merit since there are many examples of approved on-site systems in the Township.
11. Balanced Character. In Vergennes Township, a major challenge is to find balance and harmony in protecting the farmer who still wants to farm and directing growth in appropriate areas while still maintaining the rural character of the Township.
12. Land Uses. Residential development is the predominate land use in the Township, comprising 87% of total property value. A disproportionate reliance on residential land uses may ultimately result in a need for a greater local tax effort to meet service demands.
13. The majority of Township residents prefer living in a rural or a rural residential setting.
14. The population is expected to increase over the next two decades at a fairly significant rate.
15. Non-farm development should be discouraged from infringing on those portions of the Township characterized by productive farmlands.
16. As the Township continues to grow, a network of greenway corridors may be considered.
17. Ground and surface water is a valuable Township resource and provides the majority of residents with their drinking water source. These resources need to be protected.

FUTURE LAND USE DESIGNATIONS

AGRICULTURE/ FARMLAND PRESERVATION

There is an established tradition of agricultural productivity in Vergennes Township, dating back more than a century. Much of the land in the northwestern quarter of the Township has remained high quality agricultural soil as designated by the USDA (see Map 3, Soils Map). Maintaining the tradition of agriculture is of high priority, and preserving large and contiguous tracts of productive land is essential to that goal.

The land designated as Agriculture amounts to 12,620 acres, or approximately 55% of total land area within the Township. This land use is intended to preserve agricultural productivity and viability within the Township by allowing for enough land to support industry services and economies of scale. As seen on the Future Land Use Map (map 6), the area designated as Agricultural Preservation covers a large portion of the western and northern sections of the Township.

The most important factors informing the decision to designate particular parcels of land as Agriculture are (1) the United States Department of Agriculture's classification as prime agricultural soils. These are soils that are considered to "produce the highest yields with minimal inputs of energy and economic resources, and farming it results in the least damage to the environment."⁶ (2) The relative size and contiguity of highly productive soil classifications within the designated land area creates the opportunity for greater economies of scale in agricultural production, as well as for the suppliers of agricultural goods and services. (3) A Township Hall meeting in which local landowners were invited to contribute their opinions about farmland preservation, and the best locations in the community to preserve.

One very important step toward the preservation of this land use designation as a strictly Agricultural area is for the Township to participate in the County purchase of development rights program to receive State and Federal funding. This will allow the purchase of the development rights of private property owners via funds collected through grants, donations, bonds, special assessments, or general appropriations. Likewise, landowners will have the option to sell their development rights (calculated as the difference between the agricultural value of the land and the fair market value) to a public entity. Under part 362 of PA 451 (1994), this ensures the land will be preserved for

⁶ Soil Survey of Kent County, Michigan. P. 90

agricultural use and open space, while, in exchange, landowners may continue to farm their own land, rent the land to another farmer, or sell the land for the remaining agricultural value.

In addition to the Purchase of Development Rights (PDR) program, the zoning standards must reflect the Township's desire to protect local farmland from excessive development. There are a number of techniques available to the Township that will help to preserve the character and productivity of the Agriculture/Farmland Preservation land use designation while still providing property owners with options for some development.

AGRICULTURE/ RURAL CHARACTER PRESERVATION

Vergennes Township is blessed with large tracts of land offering important wetlands, wildlife habitat, forest lands and lakes. These lands are a vital part of the community's identity and, with careful planning, they may be preserved and protected so that future generations may continue to enjoy an unspoiled natural environment. The primary purpose of this land use classification is to preserve rural character. The majority of citizens, as indicated in the citizen survey and community futuring session, felt it was important to protect and preserve the rural character of Vergennes Township. This land use designation consumes the majority of land in the Township.

To accommodate this increasing demand within the Township, the Planning Commission will need to develop regulations which preserve natural features such as wetlands, woodlots and steep slopes but also permit dwellings to occur without hampering the rural character. The overall density in this area should be one dwelling on three acres of land.

An option that can be used to accomplish rural character is to permit only single-family, planned or clustered dwellings on land designed to preserve natural features and limit infrastructure costs. The use of this technique will reduce the number of curb cuts on county roads and maximize their efficiency to move traffic. This technique can also include effective buffer areas between these residences which can protect active farming operation to minimize the ordinary impacts of a farm operation on a non-farm dwelling. These buffer or green space areas can also be used as wildlife trails assisting to minimize the impact of development on animal travel patterns. The density in this area could exceed one dwelling per three acres depending on the amount of open space provided in the project.

Public sewer and water service is not anticipated in these areas of the Township during the planning period or beyond. Private roads are permitted to encourage a rural character and maximize the rural or natural view adjacent to existing public roads. Natural vegetation strips are encouraged adjacent to public roads.

The open lands preserved through this technique may be made available for either passive or active recreational use or farm land. In addition, the Agriculture/Rural Character Preservation land use classification and implementation techniques may be used to preserve some limited agriculture.

Where conservation cluster developments are proposed by the property owner, the Township will utilize its PUD mechanism to implement a development that is consistent with this Land Use Plan. The first step would be to conduct a site analysis to identify those features on the site that should be preserved and those portions that may be developed without impact. A set of performance measures will be developed to measure possible impacts. These may include buffer/filter strips from stream or wildlife corridors, tree protection and other appropriate techniques. To the extent development can be accommodated within a portion of the site without impact on the important features, additional density could be permitted. Conservation easements should be strongly encouraged as a part of such a development to assure that the undeveloped portions of the site remain in a natural state.

A further mechanism the Township may consider will be transferable development rights undertaken through non-contiguous planned unit developments formed in conjunction with other attractive development options. The Natural Feature Preservation designation is a sub-set of the Agriculture/Rural Character Preservation future land use designation, but would be a sending zone for transferable development rights. The formula for units to be transferred shall not result in densities in any receiving zone significantly in excess of planned standards, but may be used to achieve innovative designs that could otherwise not be possible.

LOW DENSITY RESIDENTIAL

This land use classification is intended to be developed at a density of approximately one to two dwelling units per acre and is typified by conventional single family homes. However, conservation cluster developments and PUDs will be the preferred form of development, in which large portions of land are preserved as open space, while developed portions are developed at greater densities. Overall density

will remain at one to two units per acre. A major objective of the Plan is to promote the development of such single family homes on a rational and sequential neighborhood basis.

LDR areas are expected to develop with or without public water and sanitary sewer service. Soil conditions and the location of services will determine the need to extend utility lines.

Certain non-residential uses compatible with single family residences (i.e., parks, churches and schools) are also permitted within the Low Density Residential classification. Innovative and non-traditional forms of housing may be incorporated in the LDR area within the density limits of up to two units per acre. These may include clustered housing with open lands, greenways and water features in conservation easements. New developments will be encouraged to utilize extensive landscaping and vegetation to create an aesthetic sense of entry and to further the rural character of the community. However, the bulk, scale and positioning of buildings must be carefully managed to preserve the aesthetics of a neighborhood and any viewsheds within the area. Street lighting or parking lot lighting needs to be designed to provide a safe environment but not intrude on adjacent or future residential areas. Clustering will be an option only when important environmental features and sewer services are present on the parcel.

MEDIUM DENSITY RESIDENTIAL

This type of land use can accommodate both single family and two family owner occupied dwelling units. Dwellings can be developed at approximately three units per acre where appropriate sewer services are available.

Medium Density Residential land uses which are adjacent to Low Density Residential areas should provide for a transition zone to insure compatibility in housing style, ownership and appearance between these two different residential densities. Medium Density Residential uses may be located along or near major arterial streets and may also serve as a buffer or transition zone between non-residential uses and low density residential uses. The ability of local soil conditions to accommodate on-site utility systems needs to be carefully evaluated when considering projects in this area. Public water and sanitary sewer will be necessary to serve this type of land use at maximum densities, especially for multi-family projects.

Certain innovative and non-traditional forms of housing may be incorporated in the MDR area within the density limits of up to three units per acre. These may include owner occupied clustered housing or condominiums with open lands, greenways and water features in conservation easements. However, the bulk, scale and positioning of buildings must be carefully managed to preserve the aesthetics of a neighborhood and any natural features within the area. New developments will be encouraged to utilize extensive landscaping and vegetation to create an aesthetic sense of entry and to further the rural character of the community.

Both low and medium density residential should be directed toward the sections adjacent to the City of Lowell or in the immediate vicinity of Murray Lake. Limited low-intensity and locally oriented commercial uses may also be permitted as special exception uses in the MDR area surrounding Murray Lake only where the Township determines these uses to be of minimal impact upon the surrounding residential character. Such commercial uses may also be permitted within 300 feet to the east of Alden Nash Road or within 50 feet south of Lally Road, adjacent to parcels within the MDR designation.

HIGH DENSITY RESIDENTIAL

A primary goal of this Comprehensive Plan is the preservation of the Township's natural features and rural character by promoting high quality and aesthetic forms of development while creating a very attractive living environment for residents. The high density residential designation has been provided to accommodate the segment of the population desiring a non-rural living environment. In all cases, public or properly licensed private utilities will be required in all developments in the high density land use designation.

The primary land use within this area will be single-family attached homes developed in cluster, multi-unit buildings, or possibly a manufactured housing community, if public utilities are available. Conservation design techniques will be encouraged where appropriate, to establish small pockets of natural lands within this relatively intense development form. Innovative design techniques will be considered to accommodate mixed uses that complement one another. Overall residential densities of up to 6 dwelling units per acre will be achieved.

Criteria considered in the selection of the areas designated on the Plan map were All Weather County Roads, proximity to public utilities,

natural screening of potential project, limited visibility from public roads to maintain the rural character, reasonability level to minimize mass earth changes, size of parcel, and existing land use pattern.

In an effort to provide maximum flexibility in the location of a future High Density Residential area, a portion of the area in Section 33 and 34, which are currently designated Medium Density Residential, could be used for High Density Residential purposes.

NON-RESIDENTIAL USES IN RESIDENTIAL AREAS

It is recognized that it is necessary to provide for the establishment of certain non-residential land uses within residential areas subject to the implementation of measures which are designed to insure compatibility. Such non-residential uses commonly include religious and educational institutions, recreational uses such as parks, golf courses and playfields, and public utility facilities. Regulations should be adopted addressing such items as traffic generation, noise, lighting and trespass in order to mitigate the possibility of negative impacts on residential neighborhoods.

COMMERCIAL

There are limited commercial land uses within the Township due primarily to the close proximity to commercial services in the City of Lowell. Neighborhood shopping uses are primarily envisioned in the designated areas to serve the needs of local residents. The types of uses include dry cleaners, drug stores, gas stations, restaurants, banquet facilities, and other similar uses. Since public utilities may not be available in many areas, consideration of soil types and septic suitability will be a primary consideration.

Design features for new developments include the generous use of landscaping or the preservation of existing natural features, minimal curb-cuts, low level lighting, minimal signage and maintaining a rural character. Citizen input during the planning process indicated the need for limited commercial uses with primary emphasis on maintaining the rural character of the community.

INDUSTRIAL

The industrial areas illustrated on the Land Use Plan are limited to the existing industrial area plus permitting some expansion. Road access is

a primary consideration coupled with the impact on adjacent residential uses. Industrial uses permitted should have a minimal impact on natural resources and have limited water demands. The lack of public utilities will influence the type of industries permitted within these areas. Industries that are high water users should not be permitted due to the lack of public utilities.

Design considerations for industrial sites include landscaping, signage, lighting, buffering and curb-cuts. Reasonable regulations and rules implemented during the site plan process will help to ensure quality development with minimal impact on adjacent uses.

UTILITIES AND SERVICES

WASTEWATER MANAGEMENT

Understanding that new growth will require the Township to provide additional services and support to future development, the Township is considering the development of a waste water system within the Township. While it is expected that this system will only serve a small portion of the Township, it is important for the Township to create a plan for the management of utilities in order to direct the location and expansion of public sanitary sewer and water. Additionally, the increased capacity of some portions of the Township to cater to greater intensity of development will in turn relieve some pressures for growth in other areas of the Township which have been Master Planned for rural preservation. The sewer management plan should include a location for the initial plant installment and service area, a suggested pattern for expansion of services, a timetable for expansion, “triggering” criteria, and a financial plan.

At the time of this writing, the Township is considering the installation of a waste water system in (or adjacent to) Section 34. As there is a fairly sizable area of the Township north of the City of Lowell which is planned for Medium Density Residential, and is adjacent to the industrial/ commercial corridor along Lincoln Lake Rd., this area makes the most sense for the provision of municipal utilities. This would be considered phase 1 of the utility expansion area. Phase 2 would likely include the southern half of Section 27, west of Lincoln Lake Rd. As this area is also adjacent to the commercial uses along Lincoln Lake Rd, and is planned for Low Density Residential, it should serve as a fairly smooth transition area from phase 1. The peak elevation of the hill on Lincoln Lake Rd. will serve as an excellent natural boundary for the service area. As the topography changes, extending sewer beyond this

point would be difficult and costly. Phase 3 would likely be the southeastern portion of Section 27, to the east of Lincoln Lake Rd. and possible extending as far east as the Flat River. This area is also planned for Medium Density Residential, and will serve commercial properties.

Each of the three phases would be “triggered” when the previous phase has reached about 80% build-out across its land area. The “triggering” criteria should create an orderly and sequential pattern of growth within the Township. Further, if the Township receives an application to extend sewer services as a part of a site plan that includes attractive clustering, amenities and density/ open space ratios, the phasing may be moved ahead. However, in order for this to occur the site plan should be proposed within the area that is currently active or is in the next sequential area for incorporation. In addition, the Township should determine what circumstances could warrant a divergence from the Management Plan. This is important because there will always be initiatives that may imply a use for sewer. However, if the intent of the plan is to encourage organized and efficient growth patterns, each time the extensions are made that are not contemplated by the Plan, sprawling development may result. Guidelines for exceptions will allow the Township to adhere to the Plan and allow for extensions in special cases that are specifically delineated within the plan.

Finally, the Township should create a financial plan. The Sewer Management Plan itself will cost little to prepare and will allow the Township to plan for funding of its implementation on a section by section basis. Further, due triggering factors such as developer interest or citizen petitions, private investment and special assessments will likely contribute to many expansion projects. However, some expansions of the public system may require initial capital investment by the Township, depending on the extent to which the expansion supports the Management Plan.

SERVICES

In addition, the Township may require an additional fire station in order to maintain a reasonable level of service. It may be appropriate to locate the station in the northwest to north-central portion of Vergennes Township. A station is also proposed in the vicinity of Lincoln Lake Road and Burroughs Road. Given the expense of these facilities, Township officials should continue to explore alternative arrangements such as joint use of facilities or joint efforts with adjacent communities to provide fire protection services.

A more extensive system of bike paths and pedestrian connections may be desirable between recreation areas and pockets of housing. The Planning Commission may desire to develop a plan designating desirable routes for these non-motorized systems. This plan should be coordinated with the efforts of the Kent County Parks and Recreation group to avoid duplication and enhance existing or proposed systems. Proposed routes should recognize the existing natural features adjacent to the routes and plan to save and maintain the natural character of the area.

The Lowell Area Recreational Authority is currently in the process of acquiring easements for recreational trailways within and surrounding Vergennes Township. These will be in addition to the North Country Trail, which is a national trail system extending from New York to North Dakota, a portion of which extends through Vergennes Township.

Map 6, Future Land Use Map available for public inspection at the Township Offices, at 10381 Bailey Drive, Lowell, MI during normal business hours.

Map 7, Utility Management Plan Map available for public inspection at the Township Offices, at 10381 Bailey Drive, Lowell, MI during normal business hours.

CHAPTER 10. IMPLEMENTATION

In order for the Comprehensive Plan to serve as an effective guide to the continued development of Vergennes Township it must be implemented.

In order for the Comprehensive Plan to serve as an effective guide to the continued development of Vergennes Township it must be implemented. Primary responsibility for implementing the Plan rests with the Vergennes Township Board, and the Planning Commission. This is done through a number of methods. These include ordinances, programs and administrative procedures, which are described in this chapter.

It is important to note that the Comprehensive Plan itself has no legal authority to regulate development in order to implement the recommendations of the Plan. This implementation must come from the decisions of the Board and Planning Commission to provide needed public improvements and to administer and establish regulatory measures relative to the use of the land.

The private sector is also involved in fulfilling the recommendations of the Comprehensive Plan by the actual physical development of land uses. The authority for this, however, comes from the Township. Cooperation between the public and private sectors is therefore important in successful implementation of the Comprehensive Plan.

ZONING

Zoning represents a legal means for the Township to regulate private property to achieve orderly land use relationships. It is the process most commonly used to implement community Master Plans. The zoning process consists of an official zoning map and zoning ordinance text.

The official zoning map divides the community into different zones or districts within which certain uses are permitted and others are not. The zoning ordinance text notes the uses permitted, and establishes regulations to control densities, height, bulk, setbacks, lot sizes and accessory uses.

The zoning ordinance also sets forth procedures for such items as site plan review, special approval regulations and controls over signs. These measures permit the Township to control the quality as well as the type of development.

The present zoning ordinance and map should be reviewed and updated, as necessary, to reflect the proposals and recommendations contained in

this Plan. In addition, the Ordinance should be evaluated for flexibility to address innovative development techniques, including Purchase of Development Rights, and for its ability to control inefficient development patterns. This strategy must be executed carefully, and may be a long-term assignment. Evaluating and revising the Zoning ordinance should be achieved with broad community support, and developing consensus on certain matters may be a challenge for the Township. The following paragraphs describe many of the changes that will be needed in the Zoning Ordinance. Since a zoning ordinance is the primary implementation tool for carrying out the Plan, it is mandatory that it be relevant and strictly enforced.

- A. **Purchase of Development Rights (PDR):** Language should be included in the Zoning Ordinance, which encourages purchase of development rights in Vergennes Township. This language should target agricultural areas, rural preserve, and country residential areas for preservation. These are areas where the preservation of farmland is critical, with the following criteria: 1) The parcel must be greater than 50% prime or unique soils as defined by the USDA NRCS, and 2) The parcel must be greater than 20 acres in size.
- B. **Non-Contiguous PUD.** The Ordinance should be updated to include provisions for innovative practices such as the non-contiguous PUD, which allows for the preservation of open space on parcels which are not contiguous with the parcel being developed. This allows for a greater intensity of development in areas surrounding the City of Lowell, while guaranteeing the preservation of land in other portions of the Township.
- C. **Interconnectivity.** The Zoning Ordinance should be revised to include stipulations for the connectivity of individually developed subdivisions. These regulations would oblige new developments to take adjacent property into consideration, and where possible, would require new developments to connect to existing developments or provide for future expansion or connection with future development. These regulations, which would primarily apply to development in residential districts, would better achieve pedestrian friendly transportation networks, and would augment the sense of community in the Township. In addition, connectivity of preserved open space and preserved agricultural property will be extremely important to achieving the long-term goals of the Township. In areas of agricultural productivity, contiguous parcels of preserved farmland can help to both enhance economies of scale for the industry and mitigate suburban encroachment. In areas of preserved open space,

parcels connected by natural corridors or long borders will provide connections for wildlife and/or recreational trails for township residents.

Responsibilities. The Planning staff and the Planning Commission may implement this strategy. This is an extensive task with multiple elements - each with unique challenges that may require each activity to be addressed independently - and it is likely that outside support will be needed. Any resulting amendments to the Ordinance will require the review of the Township's attorney and ultimately adoption by the Township Board.

REVISIONS TO THE COMPREHENSIVE PLAN

The Comprehensive Plan should be updated periodically (minor review every three to four years, major review every ten years) or as needed, in order to be responsive to new growth trends and current Township attitudes. As growth occurs over the years the Comprehensive Plan goals, land use information, population projections and other pertinent data should be reviewed and revised as necessary so the Plan can continue to serve as a valid guide to the growth of the Township.

ADOPTING THE COMPREHENSIVE PLAN

This Comprehensive Plan report has been prepared to present the background information of the planning study to the citizens so that they may review its proposals and the reasons behind these proposals. The maps included will be references or working tools of the Planning Commission each time advice is requested on a specific problem.

After the citizens have been given an opportunity to read the Comprehensive Plan report, the Planning Commission will schedule a public hearing. The purpose of this hearing will be to obtain additional viewpoints, new ideas, points of disagreement, and any important factors which may have been overlooked during the course of the planning study. Following the hearing, the Planning Commission will hold additional meetings to consider the comments and information presented at the hearing. After arriving at final conclusions, the Planning Commission will make final changes to the Comprehensive Plan. Then, the Planning Commission will officially adopt the

Comprehensive Plan for the Township of Vergennes. The Planning Commission will then send copies of the Comprehensive Plan and the adoption resolution to the West Michigan Regional Planning Commission for their information

EFFECT OF ADOPTION

State law provides that the Township Board must refer matters dealing with the construction, location or character of public streets, public structures, public utilities or public land to the Planning Commission for advice and recommendation before taking final action. If the Township Board does not concur with the recommendation of the Planning Commission, it must obtain a vote of not less than a majority of its membership in order to override that recommendation.

POLICY IMPLEMENTATION OF THE COMPREHENSIVE PLAN

After the Comprehensive Plan has been adopted, the Planning Commission must use its persuasion to bring about the adoption of ordinances, which will carry out the policies of the plan. These laws can only be adopted by the elected officials. After the adoption of the Comprehensive Plan, copies of amended zoning ordinances should be sent to the Township Board for consideration. The Planning Commission should meet with the Township Board to review the policies and the provisions within them. After an agreement has been reached between the Township Board and the Planning Commission, the Planning Commission will introduce the ordinances and schedule a public hearing to obtain additional comments, points of disagreement, or additional ideas. The Planning Commission will then make the final corrections to the ordinances and/or maps, which are part of the ordinances, and vote to recommend their adoption by the Township Board.

The Township Board will place the ordinances on its agenda and consider them at its regular public meeting. The Township Board will hear any further comments or suggestions from the public prior to taking final action. If it desires, the Township Board may refer the ordinances back to the Planning Commission for final advice upon any questions raised by the public at the Township Board meeting prior to final adoption.

ADMINISTRATIVE IMPLEMENTATION

The Zoning Ordinance will be the most important tool in carrying out the concepts of the Comprehensive Plan. It will directly control all future land usage and the development of the future street and utility systems of the community. It is important to realize that only a small portion of the streets and buildings of the future community exists today. Forty years from now many of the streets and buildings in the community will have been developed under these proposed regulations. This points out the importance of having a highly qualified and conscientious Planning Commission and Zoning Administrator, for these individuals will be directly responsible for enforcing these regulations.

Along with its administrative review duties, the Planning Commission should take the initiative to work closely with the Planning Commissions of surrounding communities and the County. It will take many years of effort to bring these ideas to reality. Experience has shown that the difference between Comprehensive Plan ideas being carried out or being lost and forgotten is a direct consequence of the activity and enthusiasm of the Planning Commission.

CONCLUSION

**Vergennes Township
can be, and of
necessity, must be a
desirable, attractive
and convenient
community in which to
live, play and work.**

This Plan culminates 24 months of intensive study by the Planning Commission, Board members, the study team and its planning consultant. It represents many hours of discussion and investigation of problems, statistics and ideas. Yet this Plan is only the beginning of a program of action for the next twenty years. Because the future well-being of Vergennes Township depends upon sound, coordinated action, the Planning Commission stands ready at all times to meet with any person or group in the Vergennes Township area. The Planning Commission will always be available to help and guide any person or group that needs advice or who wishes to have a part of the Comprehensive Plan acted upon.

Carrying out a continuing planning program will not be an easy task. There will be times when community action is not forthcoming. However, if a proposal of the plan is sound and presents a solution to a problem which must eventually be solved, it will be realized some day. Carrying out this Comprehensive Plan is not a task which depends upon any one group for its success or failure. It depends upon every responsible citizen of Vergennes Township, for even the most devoted

Planning Commission will be rendered ineffectual by citizen apathy. Vergennes Township can be, and of necessity, must be a desirable, attractive and convenient community in which to live, play and work.