

**Marengo  
Township  
Master Plan**

**December 2019**

Prepared through the Efforts of the:

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## INTRODUCTION

### What is a Master Plan?

This Master Plan has been adopted by Marengo Township to ensure that the decisions made regarding the use of land are based on a sound vision for the township that will enhance the quality of life for its residents. This Master Plan is a guide to ensure that the Township's desires regarding future development are translated into action. Deliberative actions and day-to-day decisions by the Township Board, Planning Commission, and other Township officials, guided by the Master Plan, create the future for Marengo Township. Public input is an essential component to the Master Plan process, as it is important to understand what township residents think of the issues and what they want. The Master Plan consists of several elements, including an overview of existing conditions, goals, and future land use.

- Existing conditions portray the full extent of land uses, physical characteristics, social characteristics and public improvements.
- Goals define how the Township will deal with identified concerns and protect community character.
- The Future Land Use plan describes what types of new development the Township believes would be most appropriate and suitable locations for such development. The Future Land Use Map is an illustration of the long-range land use pattern of the Township.

This 5-Year Update to the Marengo Township Master Plan is presented as a stand-alone document for purposes of outlining future areas for development. It was based upon the latest information available for planning purposes. This information includes floodplain and wetland data and up-to-date socio-economic and demographic data merged into the Demographic Profile. A Future Land Use Map and Zoning Plan is added to provide support for and coordination with the Marengo Township Zoning Ordinance.

The basis for this "development" plan is to more easily explain and present areas that should be preserved from development (designated Open Space), further support these areas by allowance for more open space and reduced residential development (designated Agricultural), identify areas for residential development based upon existing patterns or where public utilities could possibly be extended (designated Low, Medium and High Density Residential), provide sufficient areas for business development (designated Commercial),

with limited areas for industrial development (designated Industrial) based upon the lack of public utilities in the area and support for the economic development efforts within the City of Marshall.

This plan includes all elements of a master plan pursuant to P.A. 33 of 2008, the Michigan Planning Enabling Act. It is based upon public input received during Planning Commission and Township Board meetings over the last several years. It allows for residents and developers to obtain needed information related to planning and zoning and possible support for future development in these designated areas. It provides enough capacity for all types of development, apart from industrial development that may require connection to public utilities. Except for coordination with the City of Marshall and Calhoun County, it does not impact adjoining communities through more intensive planned development than what exists in those general locations.

### **Public Input/Process**

The public participation process has included circulation of a community-wide questionnaire. The questionnaire was sent to every real property taxpayer in the Township. Questionnaires were mailed out requesting that the responses be received by February 11, 2019. Of the 913 questionnaires mailed out, 285 were returned. The Planning Commission also held numerous public meetings and invited a variety of resource persons to attend meetings for open discussions. The process for review and approval included notice of intent/draft plan update and distribution to all surrounding units, followed by a public hearing before the Planning Commission, their adoption and approval by the Township Board.

### **What Might the Future Hold?**

A Master Plan does not “predict” the future. As new residents, new Planning Commissioners and Township Board members arrive on the scene, attitudes about growth, township character, and other Plan elements may change. Even one new major development could alter the Township’s future. The Master Plan is intended to set a direction for the Township to follow in the foreseeable future. That direction can have many alternatives and possibilities. The Plan, used properly, will guide the Township through decisions about land use, public services, and a host of other issues. But the Plan must remain flexible, to consider those changing circumstances that no one can predict.

## **SECTION 1 OUR PEOPLE**

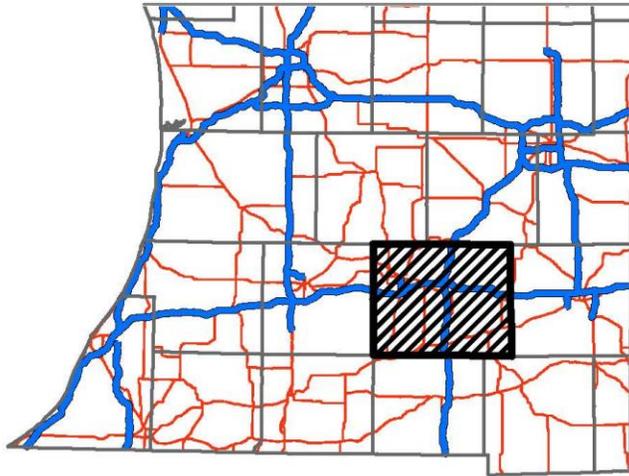
### **Who Are We?**

Marengo Township holds the distinction of being the second oldest settled community in Calhoun County, after the City of Marshall. On the 16th day of June 1831, four entries of land were made in the township, six years before Michigan obtained statehood. Settlers to the area were attracted to the possibility of utilizing waterpower along the Kalamazoo River. A water-powered flour/grist mill was erected in 1839 and a village soon sprang up there which took the same name as the township. The village of Marengo is just south of Michigan Ave. along 23 Mile Road (State St.). The Marengo Village Cemetery was organized, and the first interment was in 1837.

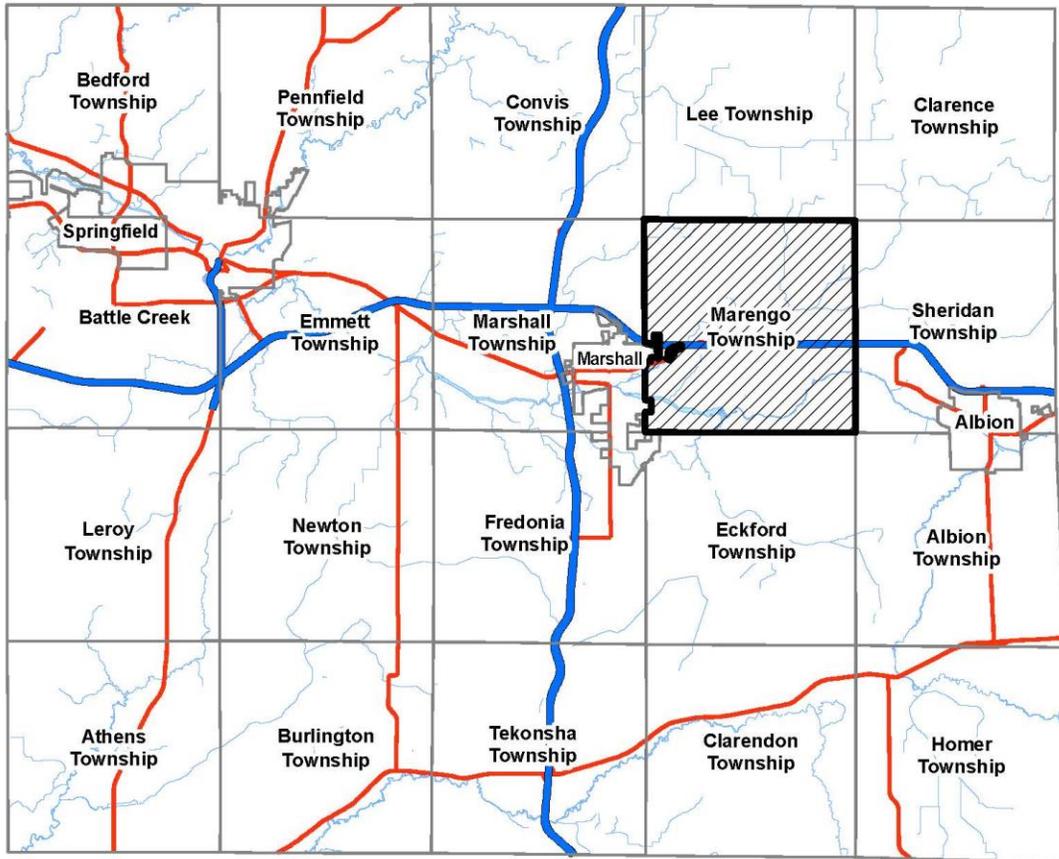
The original mill burned in 1844 but was rebuilt in 1847 by Miller Evans who owned and operated the Marengo Mills for the next three decades. It was one of the leading flour mills in Southern Michigan and flour was shipped as far as New York City. The mill was serviced by a side railroad track. A log building served as the mill warehouse. Evans also operated a sawmill south of the flour mill on the river dam. There was an abundance of white oak trees in the area which supplied the wood for the sawmill, from which many buildings in Marengo were constructed. Further downstream was the Marengo distillery off "B" Drive North.

19th century plat maps show large village boundaries stretching from Alcott St. on the north, to a proposed Washington St. on the south, which is two lots south of the Marengo "South Brick" schoolhouse south of B Drive North. Over 80 blocks were proposed containing 10 lots each with over 29 named streets. It didn't make it. College St. was once the "business section" of town. A Union Church was erected there in 1854, which today is known as the Marengo Methodist Church. The village once had its own hotel on the southeast corner of Elizabeth and College Streets. It was built in 1855 by Winn Gardiner and contained a bar room, a store, a dining room, and a dance hall where monthly dances and parties were held. The hotel was extremely popular and attracted scores of people from throughout Calhoun County. The counter of its basement bar room was 30 feet long, and during the Civil War, the hotel employed four bartenders to keep up with the demand. This structure unfortunately burned in March 1889. There was a cooper shop on

Figure 1 - Location map



# Marengo Township Calhoun County, MI



Winter St. where barrels were made. Marengo also had a buggy shop, a shoe and boot store, a butcher shop, a distillery, two general stores, two blacksmiths, two physicians, and an insurance agent. The Township experienced slow but steady growth throughout the 20th Century. Now, this Plan will focus primarily on characteristics and changes between the years 2000 and 2018.

### Population Change

Examining population growth within the township and surrounding communities can help paint a picture both of development trends occurring and those likely to occur in the future. Table 1 presents a chart of population in surrounding townships from 2000 to 2017. Figure 2 Adjacent Township Growth Rates illustrates growth in surrounding townships between 2010 and 2017.

<b>Table 1 Population</b>				
<b>Municipality</b>	<b>2000-2010</b>	<b>2000</b>	<b>2010</b>	<b>2017</b>
<b>Convis Township</b>	-3.7%	1,680	1,618	1,605
<b>Lee Township</b>	-3.5%	1,257	1,213	1,213
<b>Clarence Township</b>	-3.7%	2,071	1,995	1,988
<b>Marshall Township</b>	4.8%	2,909	3,049	3,047
<b>City of Marshall</b>	-3.6%	7,373	7,109	7,037
<b>City of Albion</b>	-5.8%	9,141	8,615	8,453
<b>Sheridan Township</b>	-2.6%	1,419	1,381	1,394
<b>Fredonia Township</b>	-4.7%	1,720	1,640	1,615
<b>Eckford Township</b>	-1.6%	1,315	1,295	1,258
<b>Albion Township</b>	14.4%	1,061	1,213	1,213
<b>Marengo Township</b>	2.1%	2,228	2,274	2,269

Source: Michigan eLibrary Demographics Now

Overall, population growth between 2000 and 2010 occurred only in Albion, Marshall and Marengo Townships. Marengo was one of only three immediately adjacent townships to see any growth. All other adjacent townships and cities declined in population. Between 2010 and 2017 Marengo Township’s population declined only slightly (see Table 1 and Figure 2).

**Figure 2**

**2017 Population**

**Adjacent Township Growth Rates (2010-2017)**

	<i>North</i>			
	Convis	Lee	Clarence	
	1,605	1,213	1,988	
	-0.8%	0.0%	-0.4%	
<i>West</i>	Marshall	<b>MARENGO</b>	Sheridan	<i>East</i>
	3,047	2,269	1,394	
	-0.1%	-0.2%	0.9%	
	Fredonia	Eckford	Albion	
	1,615	1,258	1,213	
	-1.5%	-2.9%	0.0%	
		<i>South</i>		

% = Change from 2010 to 2017

During the time frame between 2010 and 2017, Sheridan Township was the only adjacent community whose population increased. Rather, populations in this part of the county for the most part are either stable or declining slightly. Marshall Township, located directly to the west of Marengo Township, declined by 1.0 percent; and Sheridan Township, located directly to the east of Marengo Township increased by 0.9 percent. (see table 1 and figure 2). However, Marengo Township had the lowest rate of decline among its neighbors. The surrounding townships that

declined by the greatest percentage between 2010 and 2017 were Convis, Fredonia and Eckford Townships.

**Economic Characteristics** - A comparison of income statistics is found in Table 2. In 2017, the average household income, median household income and the per capita income were all significantly higher than Calhoun County and the State of Michigan.

<b>TABLE 2 INCOME 2017</b>				
<b>Category</b>	<b>Marengo Township</b>	<b>Calhoun County</b>	<b>State of Michigan</b>	<b>United States</b>
<b>Average Household Income</b>	\$78,112	\$62,746	\$72,651	\$81,217
<b>Median Household Income</b>	\$65,301	\$50,149	\$53,199	\$56,286
<b>Per Capital Income</b>	\$29,348	\$25,027	\$28,654	\$30,968
Source: Michigan eLibrary Demographics Now				

**Incomes** - According to Michigan eLibrary Demographics Now, the largest percentage (19.2%) of Marengo Township households had incomes within the \$75,000 to \$99,999 range. The next highest grouping was the household income range between \$60,000 and \$74,999 per year, representing 12.6% of Marengo Township households. Next were households within the Township earning between \$100,000 and \$124,999 (10.2%).

In 2017, the median household income in Marengo Township was \$65,301, compared to the Entire US median which was \$56,286. The Census revealed median household incomes of \$51,993 in 2010. It is projected the median household income in this area will be \$77,338 in 2022, which would represent a change of 18.4% from the current year.

In 2017, the per capita income in the Township was \$29,348, compared to the Entire US per capita, which was \$30,968. The 2017 average household income for this area was \$78,112, compared to the Entire US average which was \$81,217.

At \$65,301, Marengo Township’s median household income was higher than the State (\$53,199) and Calhoun County’s (\$50,149). Factors that can affect these numbers include the types of housing available, land values, parcel sizes and the locations of communities. For instance, a community with a higher percentage of apartments will often have younger people that generally have lower incomes than people who are more established in their careers, who tend to have higher incomes. Alternately, communities with a higher percentage of newer single-family housing on large lots will generally attract more established families, who generally have higher incomes than younger, unmarried people. Residents in Marengo Township fall generally into four categories described as “Mosaic Types”.

Table 3 Household Types		
Mosaic Type	Number of Households	Percent of Township
Family Fun-tastic	156	18.4%
Unspoiled Splendor	46	5.4%
Stockcars and State Parks	586	69.2%
Town Elders	59	6.9%

“Family Fun-tastic” are upscale households middle-aged families with older children pursuing busy kid-centered lives in satellite cities. “Unspoiled Splendor” households are comfortably established baby-boomer couples in town and country communities. “Stockcars and State Parks” households are middle-aged, middle-income couples living in suburbia working to enjoy their active lifestyles. “Town Elders” households are stable minimalist seniors living in older homes and leading sedentary lifestyles.

**Education** - Within Marengo Township, 94.3% of residents have graduated from high school and 27.0% have attained a bachelor’s degree or higher. The number of persons graduating from high school is higher in the township than both the County (88.9%) and State (89.3%). Similarly, the

township’s percentage of individuals who had graduated with a bachelor’s degree or higher was higher than both the County (19.1%) and the State (26.5%).

**Employment** – In 2017, there were 1,837 people over the age of 16 in the labor force. Of these, 97.4% were employed, 2.6% were unemployed. There were 748 employees (daytime population) and there were 50 establishments. Establishment counts include Dunn & Bradstreet (D&B) business location records that have a valid telephone, known SIC code and D&B rating, excluding cottage industry businesses that operate from a residence. For 2017, service workers made up 39.17% of the population, and those employed in retail trade occupations made up 27.01%. Manufacturing workers made up 16.98% of the population.

<b>Table 4 Employment 2017</b>		
	<b>Number of Employees</b>	<b>Percent</b>
<b>Total Employees</b>	748	
<b>Total Establishments</b>	50	
<b>Employees by Major SIC Division</b>		
<b>Agriculture, Forestry, &amp; Fishing</b>	7	0.94
<b>Construction</b>	15	2.01
<b>Finance, Insurance, &amp; Real Estate</b>	4	0.53
<b>Manufacturing</b>	127	16.98
<b>Mining</b>	3	0.40
<b>Public Administration</b>	31	4.14
<b>Retail Trade</b>	202	27.01
<b>Services</b>	293	39.17
<b>Transportation, Communications, Electric, Gas, &amp; Sanitary Services</b>	43	5.75
<b>Wholesale Trade</b>	23	3.07

Employment of people who live within Marengo Township is heavily focused on services and retail trade, representing 495 jobs in the year 2017 or 66.2% of the working population within the township.

Agricultural employment has declined in Marengo Township along with the State and Nation. In 2017, just 0.94 percent of township residents were employed in agriculture. "... today, only two percent of the U.S. population produces food for the world to consume. That's a substantial change in the amount of people associated with producing food and making sure that everyone has enough to eat. Farmers use technology to make advances in producing more food for a growing world. Through the use of technology, each farmer is able to feed 155 people today, compared to 1940, when one farmer could feed only 19 people."\*

\*AnimalSmart.org, PO Box 7410, Champaign, IL

### Housing

While population statistics reflect the total increase or decrease occurring in a community, the analysis of housing statistics is often the key to land use planning for new residential development. Table 5 provides a breakdown between housing units and households (defined as "occupied" housing units).

<b>Table 5</b>					
<b>Housing units and Households</b>					
	<b>Housing Units</b>	<b>Households</b>	<b>Persons per household</b>	<b>Vacant Units</b>	<b>% Vacant</b>
<b>2017</b>	926	847	2.57	82	8.9%
<b>2010</b>	926	853	2.55	73	7.9%
<b>2000</b>	838	793	2.76	45	5.4%

The nature of housing, in relation to population change, is often the reflection of cultural changes in the community, with most of these linked to national trends, such as the aging of the population. Economic conditions also play a significant role, with increased vacancy-rates and declining "owner-occupied" status. It is clear from Table 5 that the vacancy rate was likely impacted from economic conditions at the time the census was taken. It also shows that while there was an increase in total housing units by 77, the population increase was

only 82 persons, reflecting this vacancy rate and the decline in the number of persons per household (from 2.76 in 2000 to 2.57 in 2017).

Since the year 2000, 60.8% of the township’s residents have moved into their current home. Only 17.7% of residents have lived in the same housing since the 1990’s and only 9.9% of township residents have lived in the same housing since the 1980’s. In 2017, there were 926 total housing units with an 8.9% vacancy rate. Of the 847 occupied housing units 83.9% were owner occupied and 16.1% were rental units. Between 2000 and 2017, the number of housing units increased by 88 units or 10.5%. Currently, 88.7% of Township residents live in single-family homes, 6.8% live in multi-family structures, and 4.5% of residents live in mobile homes.

Housing values ranged from less than \$25,000 to over \$1,000,000. Approximately 28.3% of the housing was valued at less than \$99,999, and 58.8% was between \$100,000 and \$249,999. By comparison, the State of Michigan had 40.7% and 20.1% of its housing within the same categories and Calhoun County’s percentages were 29.3% and 27.2%. The median home price in the United States overall rose from \$237,387 in 2016 to \$238,800 in 2017, according to Harvard’s Joint Center for Housing Studies (JCHS). Table 3 shows the general housing characteristics in the township.

<b>Table 6 Building Permits</b>			
	<b>New Homes</b>	<b>Mobile Homes</b>	<b>Total</b>
<b>2008</b>	2	0	2
<b>2009</b>	1	1	2
<b>2010</b>	4	1	5
<b>2011</b>	5	0	5
<b>2012</b>	3	0	3
<b>2013</b>	3	0	3
<b>2014</b>	1	1	2
<b>2015</b>	4	0	4
<b>2016</b>	6	1	7
<b>2017</b>	4	0	4
<b>Avg.</b>	3.3	0.4	3.7

## **Building Permits**

The Township has maintained a relatively level number of single-family building permits each year for the past several years. Table 6 contains the building permits issued for single-family homes over the last ten years. Building permit trends can be used to predict future growth.

## SECTION 2 NATURAL FEATURES

The Kalamazoo River along with its many tributaries is the most significant water feature in the Township. Rice Creek is the primary tributary draining a large part of the Township. The Kalamazoo River Watershed transports water westerly to Lake Michigan.

**Lakes and Streams** - Water features, including lakes, streams and interconnecting wetlands are notable and attractive features of the township. These surface water features are all connected and function as part of a larger “Water Cycle”.

Table 7 Lake Acreages in Marengo Township	
Lake Name	Size in Acres
Chapin Lake	26.7
Rothrick Lake	10.7
Buckhorn Lake	6.8
Williams Lake	12.3

At any point through the water cycle, pollutants may be picked up and passed on to township residents, people in other communities, plants and/or animals by consumption of these waters. Knowing the characteristics of each type of water feature can allow a community to plan for their best use and preservation. Soil erosion, impermeable surfaces (such as parking lots and roofs), soil contamination, and recreational pressures can affect the water quality of the township’s lakes and streams. Any number of factors can affect water quality from accidental spills, industrial operations, poor soils unsuitable for septic systems, a high-water table, excessive development, etc., and could threaten the quality of the area’s water supplies. Specific regulations pertaining to soil erosion and sedimentation control practices, protection of wetland areas, increased water body setbacks, the use of greenbelts or buffers and density reductions can assist in protecting water quality. Currently, sections 6.03A Water-Building Relationship, 6.13 Shoreline Excavation and Dredging, and Article 17 Open Space Waterbody Conservation District of the Township Zoning Ordinance are intended to protect water quality.

Frequently, minimum setbacks of one hundred (100) feet (as measured from the shoreline or ordinary high-water mark) are used to protect water quality in zoning ordinances. In addition, some communities require vegetative strips of perhaps twenty-five (25) feet bordering the banks of lakes and streams, as measured from the shoreline or ordinary high-water mark, must be maintained in a natural vegetative state, except for the permitted clearing of dead or obnoxious plants.

Another element to surface water protection is the need to moderate the effects that recreational activities have on surface waters. Overuse of inland and lakeshore areas can, over time, degrade water quality through small gasoline and oil spills, stirring of lake bottom sediments, and other effects. These activities also influence shoreline erosion, which further contributes to a decline in water quality.

**Groundwater** - Nearly all the township relies on groundwater for drinking and household activities. With increased housing densities and commercial and industrial uses within the township the potential for contaminating groundwater increases. Old abandoned water wells provide direct access for contaminants to enter the drinking water, faulty septic systems can provide gradual contamination and generally increased surface activity can provide miscellaneous contamination (motor oil, antifreeze, pesticides etc.). Maintaining appropriate densities of development and proper disposal of potential contaminants are critical factors in ensuring the adequacy and quality of domestic water sources.

The State of Michigan Comprehensive Groundwater Protection Program, published by the Michigan Department of Environmental Quality reports that "Cleanup of groundwater contamination sites is expensive and slow, and often creates hardships for the persons affected". Land use regulations, land acquisition, and education programs can play a key role in protecting groundwater. Examples of land use control activities include:

- Land use plans which consider groundwater vulnerability.
- Zoning ordinance and site plan review standards related to aboveground secondary containment, interior floor drains, and other topics.
- Public education through public meetings, school-based classroom programs, library displays, cable television videos, public information flyers, and municipal newsletters.

When a community relies on individual wells and not public water, groundwater quality is a major factor influencing development. The aquifer nearest to the surface (15-40 feet) is typically unprotected from contamination by surface sources of pollution due to the porosity of surface soils. It is not known whether there have been cases of well water contamination by septic tank/drain field contamination (nitrates and detergents). It is probable that only the historically rural, low-density nature of development has prevented the widespread contamination of this aquifer.

**Floodplain** - Those lands which hold a one percent chance of being flooded because of overflow from an adjacent body of water within any given year during a 100-year period are in a floodplain. Coordination of local regulations with those of the state are an important first step towards achieving appropriate and effective floodplain regulations. Part 3108 of Act 451 of 1994 defines the unlawful floodplain activities, as regulated by MDEQ.

*“A person shall not occupy or permit the occupation of land for residential, commercial, or industrial purposes or fill or grade or permit the filling or grading for a purpose other than agricultural of land in a floodplain, stream bed, or channel of a stream, as ascertained and determined for the record by the department, or undertake or engage in an activity on or with respect to land that is determined by the department to interfere harmfully with the discharge or stage characteristics of a stream, unless the occupation, filling, grading, or other activity is permitted under this part.”*

Local governments can regulate floodplains using building codes, zoning ordinances, subdivision regulations, health regulations, and/or use of police powers. Implementation of protective measures should be used with soil and sedimentation, stormwater, and wetland regulations. Currently, areas in Marengo Township designated floodplain areas are being mapped by Calhoun County GIS.

**Wetlands** - Much of the undeveloped non-agricultural areas in the Township either are heavily wooded or wet. Part 303 of the Natural Resources and Environmental Protection Act defines a wetland as:

*“land characterized by the presence of water at a frequency and duration sufficient to support, and that under normal circumstances does support, wetland vegetation or aquatic life and is commonly referred to as a bog, swamp, or marsh.”*

Wetlands contribute to the quality of other natural resources, such as inland lakes, ground water, fisheries, wildlife and Lake Michigan. Wetlands serve as storage areas for excess water and nutrients; controlling floods and the aging of rivers, lakes and streams. In addition, acre for acre, wetlands produce more wildlife and plants than any other Michigan land cover type.

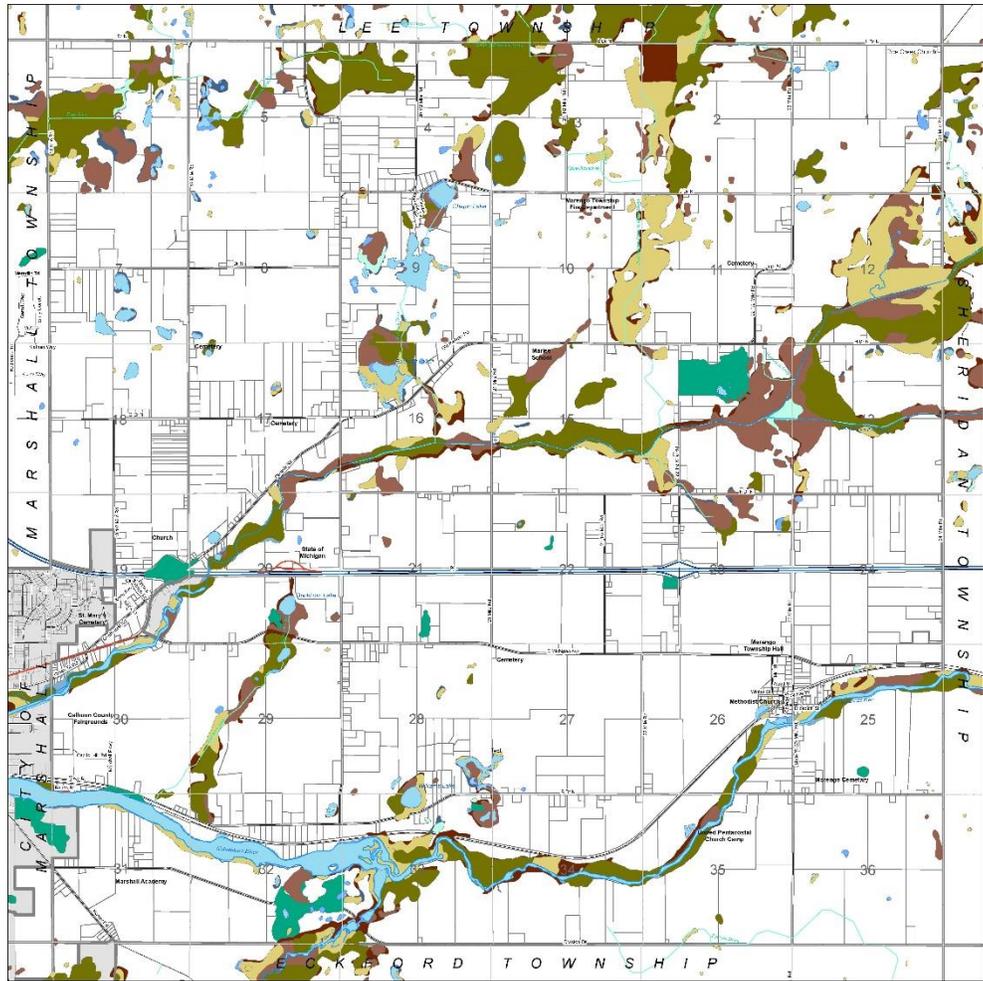
Part 303 seeks to protect wetland resources through regulating land which meets the statutory definition of a wetland, based on vegetation, water table, and soil type. Certain activities on a site which satisfies the wetland definition will require a permit from the MDEQ including:

- Filling or placing of material in a wetland.
- Draining of water from a wetland.
- Removal of vegetation, including trees, if such removal would adversely affect the wetland.
- Constructing or maintaining a use or development in a wetland.
- Dredging or removing soil from a wetland.

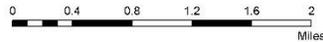
Certain activities are exempt from permit requirements. In general, exempt activities include: fishing, trapping or hunting, hiking and similar activities; established farm activities; and harvesting of forest products. Wetland areas subject to regulation by the MDEQ include wetlands, regardless of size, which are contiguous to, or are within 500 feet of the ordinary high-water mark of any lake, stream, or pond; wetlands which are larger than five acres and not contiguous to any lake, stream, or pond, but are essential to the preservation of natural resources.

Generally, wetlands must be identified through individual site determinations. Accordingly, the low-lying areas or wetlands shown on the Environmental Features map are for planning purposes and represent only indications of where some of these areas may be located. (See Figure 3 Water Features, Lakes, Creeks, and Wetlands)

Figure 3 Lakes Creeks and Wetlands



## Marengo Township Calhoun County, Michigan



### Water Features

#### Wetlands Classification

- Aquatic Bed
- Emergent
- Forested
- Open Water/Unknown Bottom
- Scrub-Shrub

#### Soil Class

- Histosols & Aquents
- Histosols & Fluvaquents
- Muck
- Udipsamments & Udorthents
- Water

- Drains
- Rivers
- Lakes



Source: Calhoun County GIS & Marengo Township, 2019

**Woodlands** – Currently, those parts of the Township covered with woodlands and forests are small isolated woodlots owned by individual property owners, with some woodlands being divided up among multiple property owners. Woodlands provide a multitude of benefits to the Township including:

- Creating rural character
- Providing wildlife habitat
- Providing a wind barrier
- Providing a noise barrier to uses such as roadways
- Providing a visual barrier to unattractive uses or activities
- Serving as areas for water runoff and filtration
- Providing areas for recreation
- Improving aesthetics and creating outdoor “sense of place”

Woodlands can be preserved through different zoning techniques including site plan, planned unit development and special land use reviews, creation of tree ordinances, creation of buffer requirements from water features and creation of open space developments.

**Topography and Drainage** - The topography of the Township is generally rolling and hilly with a local relief of greater than 150 feet from its highest point – 1,050 feet above sea level near the center of section 24 north of I-94, adjacent to Sheridan Township, to a low of 892 feet above sea level in the northwest corner of section 30, along Rice Creek adjacent to the City of Marshall. The most pronounced variations in landform and most obvious drainage features are the numerous creeks that drain to the Kalamazoo River. The township is drained entirely by the Kalamazoo River and its tributaries. There are portions of the township within the designated 100-year Floodplain of the Kalamazoo River and its tributaries.

**Soils** – Much of the Township contains soils that are classified as “prime agricultural soils” by the USDA. The USDA uses three soils classifications consisting of “Prime Farmland” “Prime Farmland if Drained” and “Farmland of Unique Importance”. Because these soils are conducive to farming, these areas often contain most the Township’s active farms. Figure 4 illustrates the combination of Prime Farmland soils and currently active farmland.

### **SECTION 3**

#### **LAND USE CHARACTERISTICS AND COMMUNITY SERVICES**

The reasons that land has developed in certain ways over time vary widely. Many of the land uses we see today are the result of development before there was zoning. Some land uses were approved by previous planning commissions and township boards with or without the benefit of a Master Plan. Many of these existing areas have stable, active uses that are thriving economically and socially. Others sometimes conflict with one another.

This Section provides a descriptive overview of current land uses within the community and will serve as part of the foundation for decisions to be made about the future of Marengo Township. The generalized land use categories evaluated include:

- Agriculture
- Residential (Primarily Single Family)
- Manufactured Home Park
- Commercial
- Industrial
- Public/Quasi-Public
- Lakes
- Vacant undeveloped land

#### **Existing Land Use**

Mapping existing land uses allows for the evaluation of generalized land use patterns that exist in the area. Knowing these land uses is essential in making recommendations that best serve the needs of current and future residents and meet the goals of the Township. Existing Land Use - Table 4 lists the acreage of various land uses in the township. A current view of existing land uses in Marengo Township for 2018 is shown in Figure 4.

The categories of existing land use include:

## Agriculture

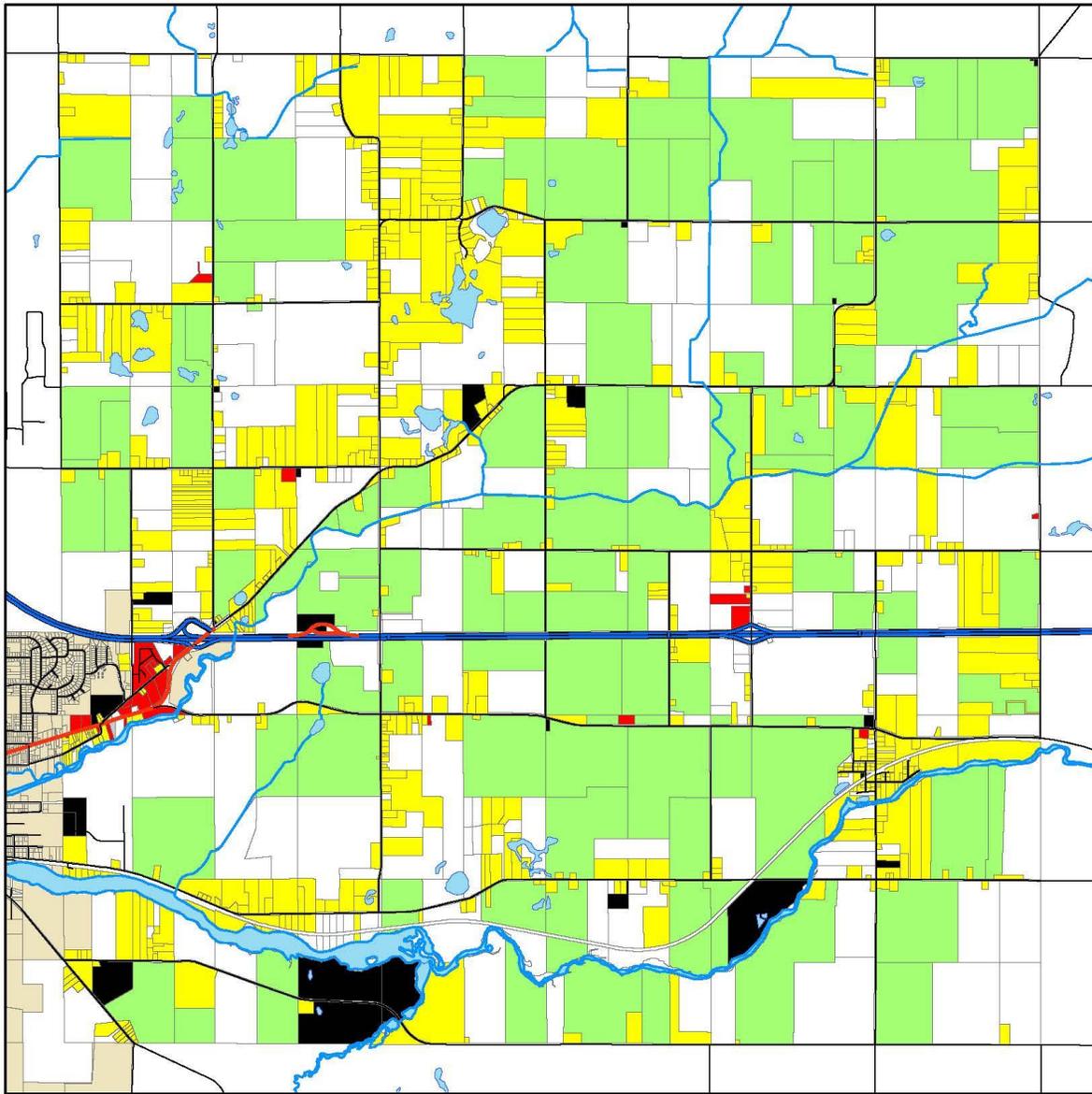
It is a recognized trend within this state and nationwide that agriculture as an occupation has been dwindling and that agriculture land is being consumed as new development opportunities arise. Marengo Township fits right in this trend with various other uses gradually replacing agricultural lands. Several market forces have played a role in the gradual loss of farmland, including convenient access to jobs via I-94, availability of land with willing sellers and existence of zoning regulations that allow for residential uses.

<b>Table 8 Land Use Acreages 2018</b>				
<b>Land Use</b>	<b>Number of Parcels</b>	<b>of Acreage</b>	<b>Percent</b>	<b>Average Parcel Size</b>
<b>Vacant / unused</b>	168	1,871	8.63	11
<b>Agricultural</b>	228	15,085	69.59	66
<b>Residential</b>	758	4,212	19.43	6
<b>Commercial</b>	27	106	0.49	4
<b>Industrial</b>	1	2	0.01	2
<b>Public &amp; Institutional</b>	24	401	1.85	17
<b>TOTAL</b>	1,206	21,676*	100.00	18
<b>Source: Calhoun County GIS</b>				

(\*The Township has a total land area of 23,040 acres. The remaining 1,364 acres would be roadways and bodies of water not accounted for in the tax parcel layer)

It is no longer necessarily expected that agriculture will eventually give way to development. Agricultural activity and development can coexist if there is proper planning and an acknowledgement of mutually beneficial community and societal goals. However, there is no specific formula or method for achieving this. Within Marengo Township, there are several farming operations. Collectively these farms cover about 15,085 acres of total land. This

**Figure 4 Existing Land Use**



## Marengo Township Calhoun County, Michigan

### Existing Land Use



Source: Calhoun County GIS & Marengo Township, 2018

equates to roughly 70% of the Township's total land area. The major cash crops grown in the Township are corn, hay, soybeans, wheat, asparagus, potatoes, sunflowers, blueberries, and seed corn. Apples are the principal fruit. Figure 6 Prime Farmland classifies the soils of the Township that are considered "prime" based on their favorable characteristics for crop production. Prime farmland Soils are soils that have the best combination of physical and chemical characteristics for producing food, feed, forage, fiber, and oilseed crops. Prime farmland has the quality, growing season, and moisture supply needed to produce economically sustained high yields of crops when treated and managed according to acceptable farming methods, including water management. In general, prime farmlands have an adequate and dependable water supply from precipitation or irrigation, a favorable temperature and growing season, acceptable acidity or alkalinity, acceptable salt and sodium content, and few or no rocks. They are permeable to water and air. Prime farmlands are not excessively erodible or saturated with water for a long period of time, and they either do not flood frequently or are protected from flooding.

### **Residential**

Older established single-family residential uses are typically located on large lots along the existing county road network of the township (roads spaced at one-mile intervals). There are relatively few housing developments served by private streets. These residential developments typically contain only a few homes. Residences are dispersed throughout the Township such that consolidation of residential development as a focal point of activity would be difficult. At only 18% of the Township, residential land is not the largest land use category. It does not appear to be necessary currently to plan for parks or other public amenities to serve residential neighborhoods.

Areas and structures for single-family, duplex, multi-family, and mobile home residency are included in this category. Approximately 4,212 acres are devoted to residential use. Residential land uses are found in a scattered fashion in every section of the Township.

### **Manufactured Home Park**

A Manufactured home park of approximately 80 units exists in one location in the township. It is an older facility on Centennial Road and 18 ½ Mile Road surrounded largely by rural land. For land use planning purposes, manufactured home communities are considered high density developments and as such consideration should be given to what types of uses would be

appropriate near them. For example, commercial development and institutional land uses in key locations near the manufactured home community may promote convenience and walkability for its residents.

Similarly, other higher density, or more intense uses may also be appropriate to complement the larger available population. It would be necessary to determine how these uses relate to or impact one another. Screening between uses, using berms and evergreen trees, and pedestrian and automobile connections could be provided between sites. Finally, it may be logical to place other high-density residential uses in the same vicinity.

### **Commercial**

Areas used predominately for the sale of products and services are included in this category. Such uses consume roughly 106 acres. Most commercial uses are concentrated directly east of the City of Marshall adjacent to the I-94 corridor, with other small areas located near a few key road intersections. In both cases, commercial uses have developed because of transportation corridors that have evolved over time. The I-94 corridor is attractive to businesses that have a highway service and community focus such as fast food restaurants and gas stations. Highway access has also brought larger regional uses such as larger scale equipment supplies dealers and truck stops. Effort should be given to evaluating the core commercial area of the township as it relates to the City of Marshall.

A very small area of commercial exists at the I-94 and 22 ½ Mile Road Intersection. Commercial uses within this area in the future are not likely to obtain public water and sewer within the time frame of this Plan due to the cost to extend these services. Furthermore, this area is not planned to be served by an expanded City/Township 425 Agreement.

### **Industrial**

There is only a single industrial use located in the Township. It is Marshall Metal Products, located at 1006 E Michigan Avenue. The parcel size is 1.7 Acres. Consideration should be given to how new and/or expanded industrial operations might affect the township. Questions to consider are whether the operations should be allowed to expand and what to do with them if they were to shut down. In other residential communities, when industrial operations have been allowed to expand, they can have a negative effect on new residential development. Consideration should be given to allowing manufacturing/industrial facilities in a very limited area

presumably close to where the industrial use is already located. New industrial uses should be carefully controlled to avoid truck traffic conflicts with adjacent uses and through traffic. Consideration must be given to the fact that industrial uses may not be appropriate in Marengo Township.

### **Public/Institutional**

Public/Institutional uses include such things as churches, governmental offices, cemeteries and public parks. There are several parcels owned by the Township and Calhoun County. The parcels owned by the Township include 5 cemeteries, the Township Office/Fire Barn and the Fire Station #2 site. The County owns 3 parcels, the largest of which is on the south side of the Kalamazoo River at the confluence of Wilder Creek that flows north from Eckford Township. The 146-acre parcel (in section 32) and the 47-acre parcel (in section 33) that are contiguous and are split west to east by Division Drive.

There are a few exempt parcels in the township owned by religious organizations. There is one parcel in the township, along Partello Road adjacent to Rice Creek, owned by the State of Michigan, but managed by the Calhoun County Soil Conservation District, some of which is leased for farmland.

There are no Township park facilities, and the Township owns no vacant land. There is no state or county park within the Township, but there are several city and county parks surrounding the Township that are accessible to Township residents. The Kalamazoo River offers some recreational benefits; however, there is no public access to the river in Marengo Township

### **Lakes, Streams, Wetlands and Rivers**

There are four named lakes within the township. Two of the lakes, Chapin and Rothrick, are connected by the Rothrick Drain in the north of the Township. The lakes in the southern part of the township include Buckhorn and Williams Lakes. They are all small lakes with the largest being 26.7 acres. There is no real concentration of residential development. Water quality is not currently an issue like it would be if there were many housing units with individual septic systems around the lakes. Septic systems will often leak water and human contaminants, such as bacteria, into lakes. Human contaminants will also contribute to the growth of weeds within lakes.

Both Rice Creek and the Kalamazoo River systems are significant water features in the Township. There are numerous residences with water frontage. In addition to flooding, there is another potential issue with waterfront development. Funnel or keyhole development occurs when a waterfront lot is used to provide lake access to a larger development located away from the water. Funneling allows many individuals to gain access to a water through a small corridor of property. Unregulated funnel development has the potential to create many problems including land use conflicts; unsafe and inadequate access; excessive noise; lake and shoreline congestion; multi-use conflicts; degradation of the environment; and decreased property values.

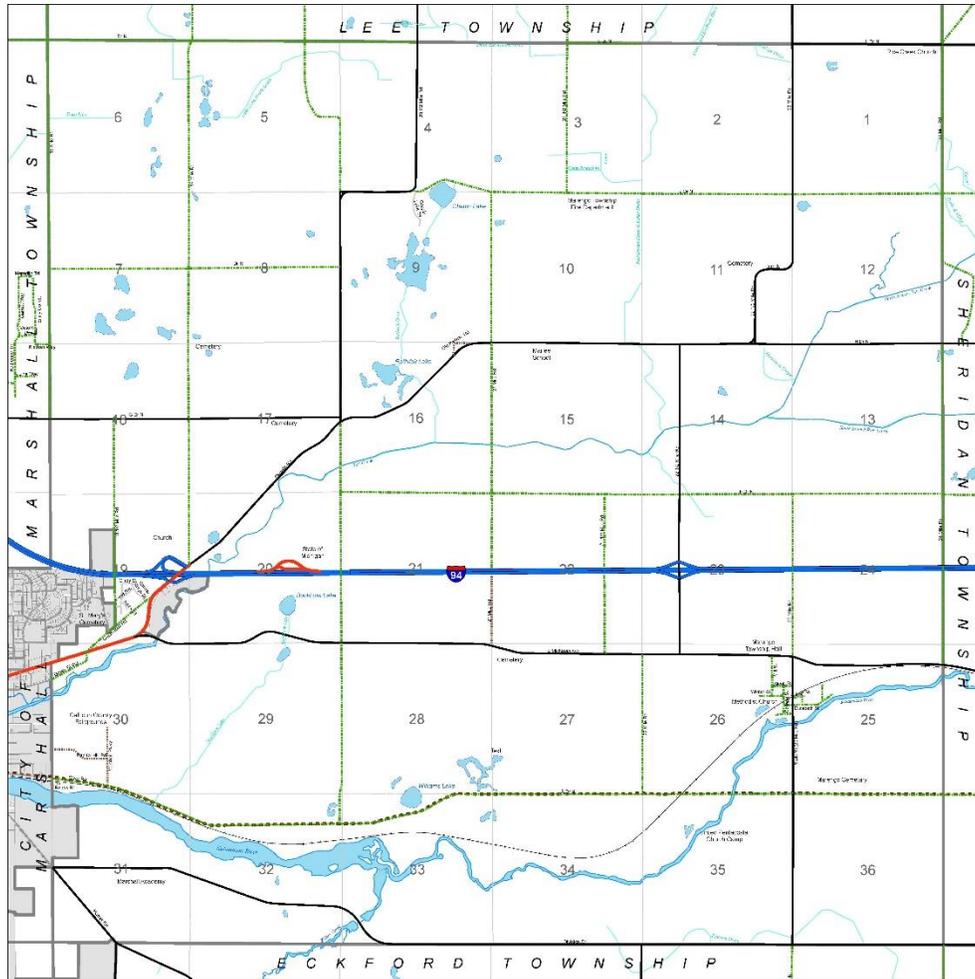
### **Vacant Land**

Vacant land includes fallow agricultural land, forest, and wetland areas. There is a relatively low percentage of vacant land in the Township. Vacant land can be looked upon from a preservation standpoint and/or a development standpoint. From the development standpoint, the vacant land could signify an area ripe for the development of new housing. From a preservation standpoint, vacant land could be viewed as something to be protected from development.

Undeveloped woodlands cover approximately 8.63 percent of the Township. Apart from an extensive wooded area in the west central part of the Township, most wooded areas are in conjunction with the wet soils and slopes associated with the drainage network. Open space includes scattered stands of undergrowth, saplings and isolated wetland areas adjacent to streams and creeks. The largest expanses of open space are found in the south central and southeast areas of the Township. Taken collectively these features give the Township the rural flavor that most residents enjoy.

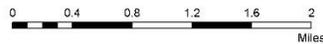
**Transportation System** – Marengo Township has direct, convenient, access to I-94, which traverses the Township and is maintained by the Michigan Department of Transportation (MDOT). The average daily traffic volume in 2017 on this highway within the Township was estimated at approximately 36,673 vehicles at exit 115, 22 ½ Mile Road. In addition to the attraction for commercial uses, convenient highway access also allows commuters to continue to move to the Township. As growth continues, increased demands will be placed on the road system. Residents in these areas are particularly sensitive to traffic increases; even small jumps in traffic volumes become noticeable. Residents will often voice concerns about the “heavy traffic” on their road, even though the roadway is easily capable of handling the traffic.

**Figure 5 Street and Road Classifications**



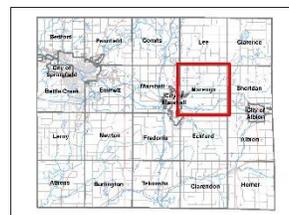
# Marengo Township

## Calhoun County, Michigan



### Transportation

- Interstate Highway
- State Highway
- Primary Road
- Local Road - Paved
- - - Local Road - Gravel
- City of Marshall Road
- Private Road
- - - - - North Country Trail



Sources: Calhoun County GIS & Marengo Township, 2019

A street hierarchy of State Highway, County Primary, Local Paved, and Local Gravel roads exists within the township. Each road in the Township can be classified into one of these categories based upon its use. Highways are designed for high volumes of traffic at high speeds, generally over long distances. In the case of Marengo Township there is one Interstate Highway, I-94, that traverses the Township east and west. As highlighted in other parts of this document, I-94 serves as a driving force for future growth and development within Marengo Township and surrounding communities by allowing convenient access to employment within the region.

Arterial roads, which are in many cases State Highways, provide direct access between cities, villages and other urban areas. Their main function is to collect and distribute traffic to and from collector streets and local streets to carry traffic to destinations and highways. Access management is important along these roadways in developed and developing areas.

Collector roads, which are often country primary roads are smaller than arterial roads and carry less traffic. They are intended to help distribute traffic from highways and arterials to local streets and individual properties along the roadway. In addition, they can perform similarly to arterial streets in that they can carry traffic to adjacent communities and beyond, but in smaller traffic volumes and often in disjointed travel patterns (i.e. some country roads may terminate and require travelers to take another nearby roadway to continue a directional trip).

Local streets are designed primarily for access to individual lots and generally discourage through-traffic. In rural areas, some local roads may be dirt or gravel roads and others may be paved cul-de-sac subdivision streets as a community begins to develop. Private Streets must be distinguished from public streets for purposes of maintenance, but all roads serve a network function according to their classification.

**Tax Base** – In 2018, there were 1,164 real property parcels in the township. The 2018 Assessed Value of real and personal property in Marengo Township was \$ 138,200,500. The total market value of residential property is \$115,888,562 and the average value per parcel is \$126,103. In the past year values have increased 5%. This ranks the township fifth among the 19 townships in Calhoun County. In 2018, there were 37 parcels classified commercial; 919 parcels classified residential, 204 parcels classified agricultural and 4 parcels classified industrial. There were 24 exempt parcels classified as institutional and public. As represented in Table 9, valuations are increasing at an average rate of 8.81% per year.

Table 9 State Equalized Values				
Year	Total	Real Property	Personal Property	Annualized % Change
1999	\$48,258,010	\$44,413,980	\$3,844,030	—
2002	\$72,627,343	\$65,200,063	\$7,427,280	16.83
2010	\$92,153,965	\$82,134,355	\$10,134,355	3.36
2018	\$138,200,500	\$100,094,000	\$38,106,500	6.24

Source: Calhoun County Equalization/Marengo Township Treasurer

In 2018, the assessed valuation of agricultural land was \$ 36,696,100, representing 36.7% of the total township value. Commercial property was valued at \$ 5,546,600 (5.5%), industrial at \$ 109,300 (0.1%) and residential was valued at \$57,742,000 (57.7%).

**425 Agreements and Map** – The Township and the City of Marshall have entered into several contracts for “Conditional Transfer of Property”. Public Act 425 of 1984, as amended (PA 425), is the conditional land use transfer statute that allows two or more municipalities the option of conditionally transferring land to one another. PA 425 came into being because annexation is legally difficult, tends to pit neighbor against neighbor, and because important economic development projects for regions became victims of a lack of annexation cooperation. A conditional land use agreement allows municipalities involved in land negotiation great flexibility. Land transfer is sometimes needed for properties that lack infrastructure necessary to support economic development projects. The agreement should provide the least expensive infrastructure possible to the proposed site.

1. Agreement Dated June 3, 1991 was rescinded by the City and did not become effective.
2. Agreement Dated December 28, 2004 (Love’s Truck Stop and Country Stores) – Provision of municipal services to two parcels on the south side of the intersection of Partello Road and I-94. The Township receives the equivalent of 3.00 mills of the City’s real and personal property tax operating levy. (expires December 30, 2054)

3. Agreement Dated April 18, 2005 (Love's Truck Stop and Country Stores) – Provision of municipal services to parcels on the south side of the intersection of Partello Road and I-94. The Township receives the equivalent of 3.00 mills of the City's property tax operating levy. (expires December 30, 2054)
  
4. Agreement Dated June 27, 2017 (The Hi Lite Cruz Inn) – Provision of municipal services to parcel no. 13-16-308-015-00 at the intersection of Centennial Road and East Michigan Avenue. The Township receives the equivalent of 3.00 mills of the City's property tax operating levy. (expires December 30, 2066)

The existing 425 agreements are shown in **Figure 6**.

## **COMMUNITY FACILITIES AND PUBLIC UTILITIES**

**Public Schools** – Marengo Township lies within both the Marshall and MarLee school districts. The Marshall school district encompasses 11.88 square miles which is 32.97% of the township and the MarLee school district encompasses 24.15 square miles (67.03% of the township). The Marshall school district has an enrollment of approximately 1,800 students located at several locations throughout this extensive district. The MarLee school district through 8<sup>th</sup> grade only has a current enrollment of approximately 300 students. Marshall High School has received North Central Accreditation. There is one private school, Marshall Academy. See Figure 7 – School Districts for a map of school district boundaries. Regional educational facilities are provided by the Calhoun Intermediate School District. Nearly 34.3%% of all adults in the community have graduated from high school and 23.7% have had at least some college.

**Water** – Except for properties enrolled in Public Act 425 of 1984 Intergovernmental Conditional Transfer of Property by Contract (PA 425) agreements with the City of Marshall, there is no public water supply system in the Township.

**Sanitary Sewer** - Except for properties enrolled in PA 425 agreements with the City of Marshall, there are no public sanitary sewer systems located in the Township.

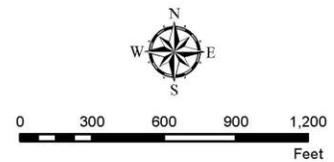
**Electricity** – The majority of Township residents receive electrical service from Consumers Energy. Some residents on the west side of the township have Marshall City Electric.

**Figure 6 - The Existing 425 Agreements**



**Marengo Township  
& City of Marshall  
425 Agreement Areas**

-  Warman's Party Store - 06/03/1991 - Liber/Page ???/??
-  Love's Travel Stop & Country Stores - 04/18/2005 - Liber/Page 2978/852
-  Love's Travel Stop & Country Stores - 12/28/2004 - Liber/Page 29735/212
-  Hi-Lite Cruz In - 06/27/2017 - Liber/Page 4217/913
-  Municipal Boundaries



**Natural Gas** - The Township has some natural gas service supplied by Consumers Energy on Partello Road to MarLee School and Michigan Avenue to the Marengo village area. Residents living elsewhere in the Township are supplied with liquid propane service through private delivery services.

**Telephone** - AT&T provides landline telephone service. Wireless service is available primarily from Verizon and has become relatively reliable.

**Internet** – High-speed internet is a challenge. Many parts of the township cannot obtain either DSL or Cable internet service.

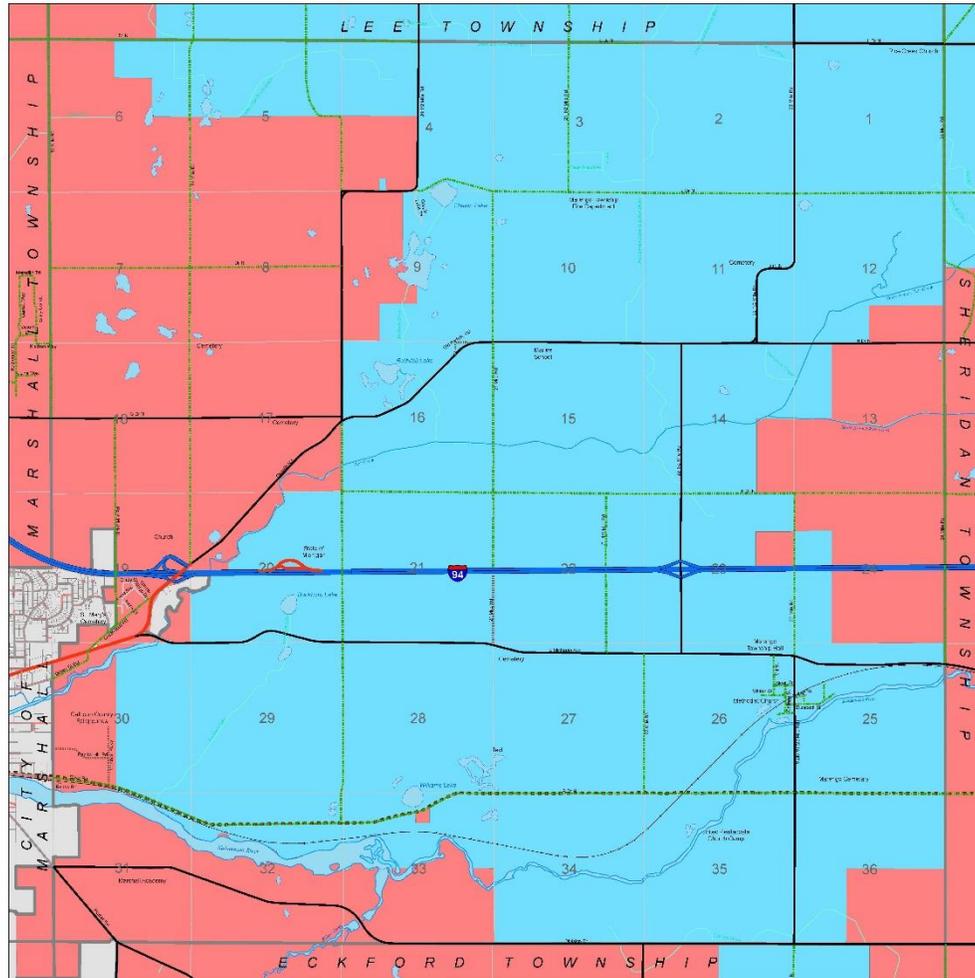
### **EMERGENCY SERVICES**

**Police** - The Calhoun County Sheriff's Department provides Police protection.

**Fire** – The Marengo Fire Department provides fire protection to the Township. The Marengo Fire Department services the township and parts of two adjacent townships from two locations in the Township. There is a mutual aid agreement with all the Fire Departments in the County.

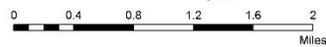
**Ambulance** - Private ambulance services, for other than emergency care, are provided by the Marshall Area Ambulance Authority.

Figure 7 - School Districts



# Marengo Township

## Calhoun County, Michigan



### School Districts

- MARLEE SCHOOL DISTRICT
- MARSHALL PUBLIC SCHOOLS



Source: Calhoun County GIS & Marengo Township, 2018

## **SIGNIFICANT TOWNSHIP FEATURES**

**City of Marshall** - The City of Marshall serves as the primary market center and provides most of the retail, commercial and related services for the daily needs of Township residents. Other market centers within 30 minutes of the Township include the cities of Albion and Battle Creek. Marshall is a friendly crossroads town, situated basically at the junction of I-69 and I-94. It has the 2nd largest historic district in Michigan. As of the 2010 Census, there were 7,088 people, 3,092 households, and 1,840 families residing in the city. In the 1830's, Marshall was thought to be the frontrunner for state capital, so much so that a Governor's Mansion was built, but the town lost by one vote to Lansing. In the years thereafter, Marshall became known for its patent medicine industry until the Pure Drug Act of 1906. Marshall was involved in the Underground Railroad. When escaped slave Adam Crosswhite fled Kentucky and settled in Marshall with his wife and three children, the people of the town hid him from the posse sent to retrieve him.

The first railroad labor union in the U.S., "The Brotherhood of the Footboard" (later renamed the "Brotherhood of Locomotive Engineers"), was formed in Marshall in 1863. Marshall was one of the only stops between Chicago and Detroit and became known as the "Chicken Pie City" because the only thing one could get to eat in the time it took to cool and switch engines, was a chicken pie. A replica of the city's roundhouse can be seen at the Greenfield Village outdoor living history museum in Dearborn.

The City has a great number of distinctive historic homes. For decades, Marshall has been holding its annual historic homes tour. Taking a walking tour through Marshall's neighborhoods will make you feel like you just stepped out of a time machine. It's block after block of historic homes from the 1800s.

Marshall also has a diverse retail business district and a burgeoning industrial base. The downtown has a variety of businesses including restaurants, micro-brewery, hair salons, car dealerships, and banks, among others. The community has vast possibilities for future growth.

**Kalamazoo River** - The Kalamazoo River basin consists of smooth, outwash plains with gently rolling, mostly forested land. The second growth upland forests include oak, aspen, and natural pine stands. The lowland forests along the River, Wilder Creek, and Rice Creek floodplains are dominated by maple, ash, and tamarack. Agricultural fields, planted pine stands, and small forest openings complete the landscape.

**Calhoun County Fair** - Michigan's oldest continuous running fair, Calhoun County Fair, at the same 69-acre site in historic Marshall since 1848, celebrated its 170<sup>th</sup> year of continuous operation in 2018. The portion within Marengo Township is nearly 30 acres, or about 44% of the total Fairground acreage. The grounds also feature open and shaded camping sites, electric and water hookups, dump station, restrooms and showers. The Fairgrounds include historic buildings and special events throughout the year. The Calhoun County Agricultural & Industrial Society (CCAIS) is a non-profit organization that owns and operates the Fairgrounds and organizes numerous activities held there each year. These events include the annual County Fair held in August, Marshall's Cruise the Fountain auto show in July, and approximately thirty other smaller events.

**North Country National Scenic Trail** - On March 5, 1980, Congress passed legislation authorizing the North Country National Scenic Trail (NCT), culminating efforts that began even before the National Trails System Act of 1968, which established the Appalachian and Pacific Crest National Scenic Trails. The authorized route that the NCT follows today differs significantly in many areas from some of the initial proposals. The trail's current route is the direct result of public input received during public meetings.

Spring, summer, fall or winter, the trail offers something for everyone. The North Country Trail is the longest National Scenic Trail in the United States (4,600 miles when complete). It is administered by the National Park Service and passes through 12 National Forests. In Marengo Township the route follows B Drive North, about 5 miles in total length within the Township.

**United Pentecostal Church Campground** - A Modern Campground and RV Park located in a convenient suburban setting. Within the park's 84.5 acres, there are campsites with separate areas for seasonal sites and sites used for daily or weekend camping. Seasonal sites are equipped with full hook-ups while sites used for daily or weekend camping have either full hook-up or water/electric hook-ups. All sites are generally large, and each has its own picnic table and fire ring.

**Historic Sites** - The unincorporated area of Marengo just south of the intersection of East Michigan and 23 Mile Road was originally recorded in Calhoun County on June 7, 1838. There are several Centennial farms in the Township. There are also several old one-room

schoolhouses in parts of the Township. A few have been converted to residences and a few are sitting empty.

## **SECTION 4 PUBLIC PARTICIPATION**

### **RESOURCE PARTICIPANTS**

The Planning Commission scheduled several meetings with local resource persons representing agencies and organizations that could contribute to the knowledge base for planning purposes. The following resource persons provided input to the planning commission in the form of attending work sessions and giving an overview of their areas of expertise in relation to Township planning.

January 2, 2019

Mr. Scott Fleming, Marshall Area Economic Development

January 2, 2019

Jennifer Bomba, Calhoun County MSU Extension

**Questionnaire** - In January and February 2019, the Planning Commission distributed a 33-question questionnaire to all Township taxpayers. Of the 913 questionnaires mailed out 30% or 285 were returned. This rate of return yields 95% accuracy with plus or minus 5% degree of error. The survey results provided many valuable insights into the preferences of township residents on a variety of subjects. A summary of the results is as follows:

The typical person that answered the questionnaire owns a primary residence located on a parcel of land between 1 and 5 acres in size and has lived in the township for between 11 and 30 years. Their primary reasons for living in Marengo Township are the rural character and the proximity to the City of Marshall.

Regarding land development, they do not support the division of farms and large agricultural parcels of land into smaller parcels for single-family dwellings. They prefer that both the "AA - Agricultural Zoning District" and the "AB - Agricultural/Business Zoning District" maintain their current minimum parcel sizes of 1.0 acres and 40 acres, respectively, and also that, the "RA - Low Density Residential District" should continue to have a minimum parcel size of 15,000 square feet. Nearly 80% are not in favor of increasing the amount of commercially zoned land, but more than 80% feel that the condition of township roads is either poor or very poor.

They believe that if the township were to consider the creation of a new zoning district called "Rural residential", the minimum parcel size should be between 1 and 3 acres. However, in developed areas of the Township respondents indicate that a parcel size of 5 acres or larger is preferred. In all residential areas, accessory buildings for storage should be limited in size according to the size of the parcel. Similarly, respondents support allowing second homes such as "mother-in-law apartments" and guest homes on the same property as the principal dwelling. Regarding different types of senior citizen housing in the township, there was considerable support for assisted living facilities and retirement communities.

Most respondents are in favor of allowing solar farms (64%), wind farms (52%) and to allow farm animals in residential areas on parcels less than 5 acres in size (46%). Conversely, there is not much support for home occupations occurring in accessory buildings (39%), storing machinery and equipment outdoors on residential parcels (32%), private streets to serve back lot land divisions (26%) Medical Marijuana Facilities (25%) or Recreational Marijuana Facilities (16%). Respondents are not in favor of zoning regulations for pond construction on individual parcels (32%), Wireless Communications Equipment (39%), or solar panels on residential parcels (29%).

Water quality is an important issue for respondents such that 71% are in favor of protecting the water quality of lakes and creeks and 84% were in favor of protecting the drinking water supply. Seventy-two percent of respondents support increased controls on the development of lakes, wetlands, ponds, rivers and streams. 53% would like to see more aggressive enforcement of zoning violations.

While many respondents would like to see the Township do more to promote recreational opportunities such as lake and river access (76%) and Biking and hiking trails 55%, only 29% are willing to pay a small millage to provide better recreational opportunities and only 27% think the Township should acquire land for future parks and playgrounds.

In addition to answering individual questions, there are 115 separate written comments covering a wide range of issues.

A copy of the complete survey results is included in Appendix A.

**Public Meetings** – The Planning Commission held public work sessions on the Master Plan at its regular meetings on:

**2018**

August 1, 2018  
September 5, 2018  
October 3, 2018  
November 7, 2018  
December 5, 2018

**2019**

January 2, 2019  
February 6, 2019  
March 6, 2019  
April 3, 2019  
May 1, 2019  
June 5, 2019  
July 10, 2019  
August 7, 2019

The Township also held a public meeting on December 4, 2019 to inform interested residents of the final draft of the proposed Master Plan and to convey the results of the community survey. This moderately attended session yielded some discussion. Mostly, the residents that attended seemed to be satisfied with the direction of the planning process.

## **SECTION 5**

### **PLANNING ANALYSIS AND LAND USE TRENDS**

Marengo Township is on the easterly edge of increasing development pressure from the Marshall area. As land becomes less available and subsequently more expensive, prospective developers and homeowners may begin to look for land in surrounding areas, particularly in rural settings. The proximity of Marengo Township to I-94 and the attractive wooded and rolling terrain in a predominantly agricultural setting throughout much of the Township adds to the attractiveness of Marengo Township to prospective homeowners. The Master Planning process has allowed Township residents, with a variety of backgrounds and opinions, to come together to express their vision for the future of the Township. To a significant degree, it is with this input and guidance that the Planning Commission has prepared this Master Plan.

It is useful to have a thorough understanding of population and other demographic characteristics of a community, in order to gain an accurate representation of existing housing and population, a historical perspective, and to extrapolate future trends. The following tables provide information on population, number of housing units, median home values and rent and age of housing units. Each table provides a comparison with adjacent townships and Calhoun County as a whole.

#### **POPULATION TRENDS**

The historical growth rates of Marengo Township, surrounding Townships and the county are portrayed in Section 2. The township was home to 1,592 people in 2000. This was an increase of 12.3% from 1,418 in 1990. The 2018 estimate is 2,261.

Marengo Township's rate of growth has been somewhat on par with the rate of growth of surrounding communities. Of the 8 surrounding Townships in the county, Marengo had the third highest growth rate by percentage. Table 10 – Population Trends and Projections shows population trends and projections from 1990 to 2030 for Calhoun County and Marengo Township.

An analysis of growth trends in Calhoun County has been conducted including a projection of population growth. The following is an excerpt from that analysis including a forecast of the population growth in Marengo Township.

<b>TABLE 10</b>							
<b>CALHOUN COUNTY POPULATION</b>							
	<b>1990</b>	<b>2000</b>	<b>2010</b>	<b>2015</b>	<b>2020</b>	<b>2030</b>	<b>2040</b>
<b>Calhoun County</b>	135,982	135,950	136,146	134,154	134,195	133,700	133,100
<b>Marengo Township</b>	1,801	2,131	2,213	2,198	2,295	2,404	2,534
<b>Township Growth Rate</b>	--	18.3%	3.8%	-0.7%	4.4%	4.7%	5.4%
<b>% of County</b>	1.32%	1.57%	1.63%	1.64%	1.71%	1.80%	1.90%

Source: US Census, Demographics Now, RTC

The growth analysis would indicate Marengo might experience moderate increased growth through 2030. Between 2000 and 2010 population for Marengo Township increased 3.8 percent, a level that was nearly triple that of Calhoun County, which grew at a rate of 1.4 percent.

While it is projected that Calhoun County may decline in population, Marengo Township will continue to be in a moderate growth mode. Marengo Township has not historically been a growth center for development, but recent building permit data supports an increasing trend in residential growth.

### **BUILDING PERMITS**

In recent years, increases in the Township’s State Equalized Value (SEV) have been largely the result of residential construction. The amount of new construction, number of building permits, and the value of the average permit all are growing annually. A close review of building permit data since 2008 establishes a good basis for analyzing this trend (See Table 4 – Building Permits). During the ten-year period from 2008 through 2017, the Township averaged 3.7 residential permits per year. The greatest single-year increase at 7 new home permits occurred in 2016.

These demographics provide a profile of Marengo Township as a location with a steady population growth, most significantly in the past twenty years. Based on the trends it can be anticipated that population growth will continue at a moderate rate and housing values will remain stable or increase.

## POPULATION PROJECTIONS

The lack of public sanitary sewer services and public water supply limit the sustainability of concentrated development in the township. The trend experienced between 2000 and 2010 is

<b>TABLE 11</b>						
<b>MARENGO TOWNSHIP POPULATION PROJECTIONS</b>						
	<b>2010</b>	<b>2018</b>	<b>2020</b>	<b>2025</b>	<b>2030</b>	<b>2040</b>
	<b>(estimate)</b>					
<b>Geometric Method (2000 to 2018)</b>	2,213	2,261	2,314	2,488	2,503	2,545
<b>Annual growth rates of 1.17 percent</b>						
<b>Adjacent Community Growth Rates (2000 to 2018) Annual growth rates of 1.23 percent</b>	2,213	2,261	2,319	2,498	2,513	2,571
<b>Arithmetic Method (2000 to 2018)</b>	2,213	2,261	2,279	2,363	2,408	2,498
<b>Annual growth rates of 9.0 persons</b>						
<b>Building Permits (2008 to 2018)</b>	2,213	2,261	2,282	2,373	2,425	2,529
<b>Annual growth rates of 10.4 persons</b>						
<b>Proportional Method % of Calhoun County</b>	2,213	2,261	2,295	2,344	2,404	2,534
<b>Average</b>	2,213	2,261	2,298	2,413	2,451	2,535

Source: US Census, Demographics Now, RTC

expected to be typical of the expected growth over the next twenty-year period. Census data from 2000 shows there were 3.2 persons per household in the Township. In 2010, this figure was adjusted to 3.1 persons per household, and in 2018 to 2.69 persons per household. Based on 2.69 persons per household and approximately 841 occupied housing units the 2018 population could be estimated at 2,262 persons. Assuming this rate of increase continues, the year 2020 population projection for the Township is estimated at 2,295 persons, an increase of 44.1% over the 2000 population (see Table 11 – Marengo Township Population Projections). It is expected that the bulk of this growth will consist of scattered residential development similar to what has recently taken place.

## HOUSING

A potential land use problem could occur throughout the area with the continued proliferation of scattered large-lot residential development. This has the greatest potential for making the eventual extension of public utilities impractical. Scattered large-lot residential development increases the future cost of providing community services. It will continue to be essential for Marengo Township to provide a balance between (1) the types of uses allowed, (2) the density of residential land uses, (3) how much land area is dedicated to non-residential development and (4) the location of these uses relative to each other and to residential growth areas.

Table 12 Projected Acreage Requirement for Housing				
Year	Population	Increase in Persons	Increase in Dwellings	Cumulative Increase in Acreage*
2018	2,261	--	--	--
2025	2,413	152	55	110
2030	2,451	38	14	138

\* = assuming 2 acres per unit, 2,75 persons per household

Source: Demographics Now, RTC

Table 12 – “Projected Acreage Requirement for Housing” demonstrates the extent to which population increases result in conversion of vacant land to residential development. This table indicates that over the next 11 years 206 more acres or approximately one-third of a square mile will be absorbed by new houses.

## SANITARY SEWER AND WATER SERVICES

Potable water supply is limited to individual wells throughout the Township. Provision of a public water supply is not likely in the foreseeable future. Currently, all wastewater is disposed of through individual on-site septic systems and drain fields.

## RECREATION (PARKS, LAKES, FISHING, BOATING, ETC)

There are currently no public access sites within the Township on the Kalamazoo River for water-related activities. Aside from the North Country Trail, there are no developed recreational facilities available. The Township may need to consider public recreational opportunities in the

future. The potential location of park facilities could be determined by inventorying the availability of land. The Township should attempt to take advantage of opportunities that might be created by linking to nearby trails and access to the Kalamazoo River. Trail systems are a key component of the State's long-term recreational goals and could be a significant funding source for future trail related recreational opportunities. Also, 76% of the questionnaire respondents thought the township should do more to promote access to rivers and lakes.

### **CITY OF MARSHALL URBAN AREA**

As the Marshall area continue to grow, adjacent transportation corridors will become increasingly developed. Development in the Marshall area has occurred as the result of its accessibility to I-94 and the population and employment base occurring within the city. It is likely that the trend exhibited in the past will continue. The rate and type of growth may change slightly, but the investment that has occurred in this area has created a permanent regional force.

### **NEIGHBORING LAND USE AND ZONING**

Except for the City of Marshall, land uses surrounding Marengo Township are generally open space, agricultural, and very low-density residential land use areas. The growth in Marshall Township has created considerable transformation in that area over the past ten or fifteen years. These changes in land use densities and non-residential development will continue to influence development in Marengo Township.

All surrounding Cities and Townships have their own zoning regulations. Some of the surrounding Townships have recently adopted updated master plans and recently revised zoning ordinances. In 2019, Calhoun County is expected to embark on a process to update the "Calhoun County Master Plan".

Surrounding zoning and proposed land uses are a continuation of the existing land use pattern. Most of the surrounding areas are intended for agricultural and residential development. The area adjacent to Marshall is considered a residential area maintaining the current densities. Areas that are adjacent to the Marshall City limits are zoned for a variety of uses including commercial, residential, industrial and medium-density residential. Marshall Township along the west border of Marengo Township is planned and zoned for a mixture of agricultural and low-density residential uses. Lee Township along the north border of the Township is planned and zoned for agricultural use. Eckford Township along the south border of the Township is planned

and zoned for agricultural use. Sheridan Township along the east border of the Township is planned and zoned for agricultural use. In each case, much of the land adjacent to Marengo is currently either vacant or agricultural land.

### **TRANSPORTATION LINKAGES**

Interstate I-94 passes through the center of Marengo Township. The I-94 expressway provides excellent regional transportation for Township residents and provides convenient access. Because of its access and availability for development, I-94 may become increasingly desirable for commercial development and businesses requiring large land areas and visibility. This transportation linkage will also create a demand for adjacent residential development servicing future employment centers.

Transportation corridors not only represent the "circulatory system" of a community but also potential commercial (and residential) development opportunities. Sometimes, they represent current or potential public services and utility corridors. Policy guidelines for the development of major transportation corridors need to be carefully thought out, especially regarding such issues as building setbacks, curb cuts, driveway spacing, commercial development, and frontage requirements. Visualizing each transportation corridor as a type of development "watershed" can be helpful in anticipating growth.

## **SECTION 6**

### **GOALS AND OBJECTIVES**

Goals and objectives represent a community's desire to look forward and conceptualize future paths and directions to meet present and future needs. Goals are general, broad-based and visionary. Objectives are more specific, directed to actions, and linked to the period of the Plan (generally five to ten years).

The Goals and Objectives outlined in this plan are grouped according to land use category and are the result of review and analysis of existing conditions, a community survey, public forums, and direction from the Marengo Planning Commission. Over time, these goals and objectives might change. Some of them may be realized; others may become less important considering new or pressing concerns. Periodically, the Planning Commission should assess the community's progress in achieving the future directions described in the plan and reassess the goals and objectives that may require adjustment. A Master Plan should be consistent with (1) the physical characteristics of the planning area, (2) local goals, and (3) regional needs.

Besides physical parameters, it is also important to evaluate social considerations when developing a Master Plan. To understand some of the social implications of certain development decisions, a Citizen Opinion Questionnaire was distributed to the residents of the Township. The Planning Commission also conducted many open work sessions to allow Township residents and other interested persons an opportunity to participate in the process. The responses and comments from the community have provided direction for the Planning Commission in setting goals and policies.

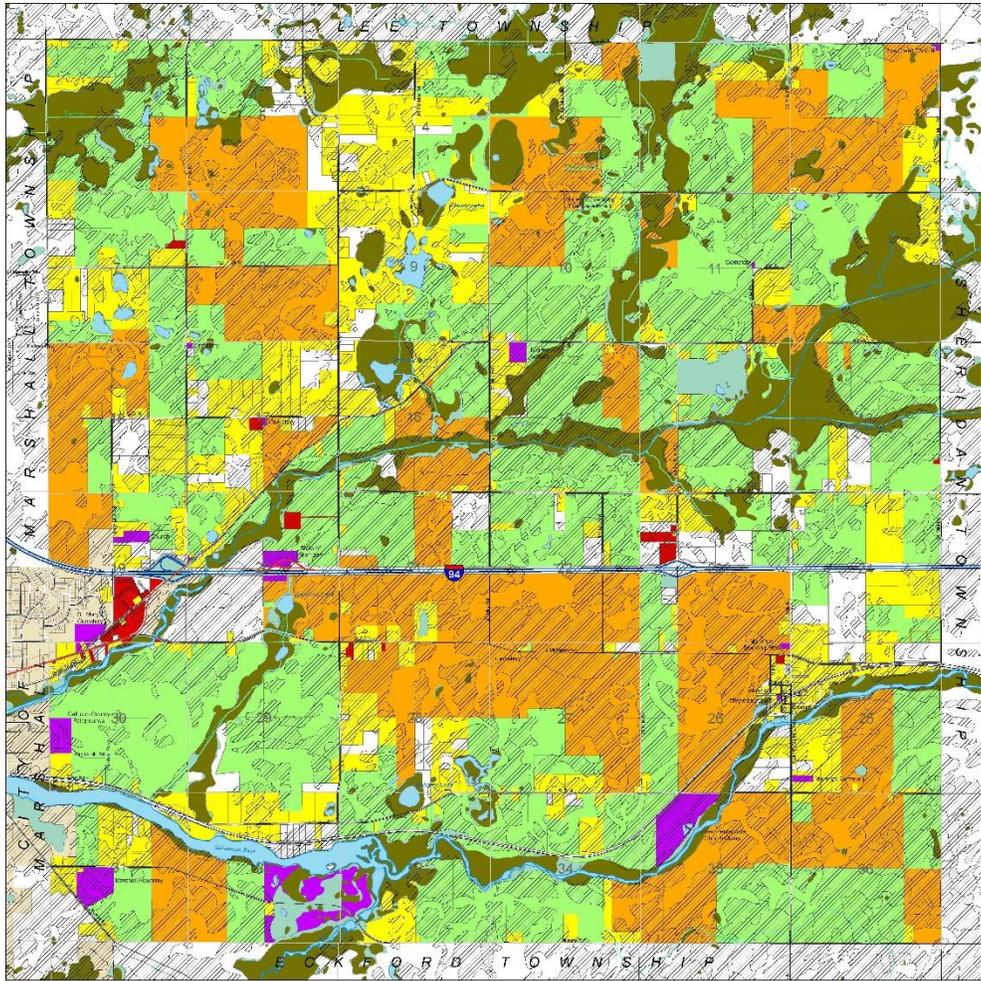
The final element in preparing a Master Plan is to determine its reasonableness from a regional perspective. It is very possible that at least some development pressure will be exerted on the Township in future years. Past growth trends in Townships surrounding Marengo; particularly Marshall Township to the east; an increase in the number of requests for property splits, rezoning's and variances; and the expected growth in the I-94 Corridor and the Kalamazoo/Battle Creek Metropolitan area, all support this expectation. Most of the development pressure will be for residential homesteads in a rural environment. However, other related and associated development, such as retail, service and related business are frequently generated by the existence of larger, more concentrated population areas. Studies have shown

that low-density sprawl is without question the costliest type of development. The existence of high-quality agricultural land in the Township is another important consideration. The use of Public Act 116, the Farmland and Open Space Preservation Act, that provides tax relief in exchange for keeping the land for agricultural use, is relatively widespread in Marengo Township.

It is well documented that Marengo Township contains some of the most desirable agricultural land in the region. In the interest of maintaining the appealing character of this area for generations to come, protecting this resource and adjacent lands is a reasonable consideration. Consuming land for large-lot type developments would be reasonable only if prospective developers can demonstrate that there is no other land in the region available for such development. At this time, there continues to be adequate land in the Township for residential development that would not adversely affect the environment or agricultural activities. Directing development to these suitable areas is the best measure for preserving and maintaining the more environmentally challenged land in the Township. **Figure 8 – Development Limitations** illustrates the areas in the Township where development should be limited based on a variety of factors.

Analysis of the existing character and conditions in the Township reveals that much of the land continues to be well suited for agriculture. The presence of farming operations in the Township and the lack of available public water and sewer facilities, make much of the land in the Township unsuitable for concentrated development. Similarly, the lack of available public water and sewer facilities and the primarily rural character of the Township have not created a demand for commercial or industrial development. Further, the adjacent cities of Marshall and Battle Creek have absorbed most of the demand for industrial and commercial land uses.

**FIGURE 8 Development Limitations**



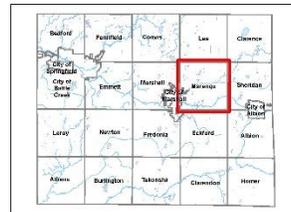
# Marengo Township

## Calhoun County, Michigan



### Limitations to Development

- |                              |                        |
|------------------------------|------------------------|
| Prime Farmland               | Commercial             |
| Has Wetland Designation      | Industrial             |
| Wet Soils or Water           | Public & Institutional |
| Agricultural                 | Residential            |
| PA 116 Farmland Preservation | Vacant                 |



Sources: Calhoun County GIS & Mapping, 2016

Thus, based on natural physical characteristics and historic development patterns, the logical primary land uses in the Township should continue to be agricultural and residential. However, there exists a few large underutilized parcels of land totaling approximately 200 acres adjacent to I-94 and Love's Truck Stop, that may be the exception. The largest parcel within this 4-parcel area was once proposed to be converted to an 18-hole golf course. After the top soil was removed and sold, heavy equipment reshaped the ground for that intended purpose. However, with the housing reversal in 2008, the project was never completed. Because of its proximity to utilities and visibility of I-94, it is thought that this area could function as an ideal location for light industrial development.

**Policy Statements** - The basic intent of this Plan is to maintain the agricultural presence along with reasonable residential development areas as the dominant land uses in the Township. Other forms of development will be allowed, as needed, but will be located and patterned such that adverse impacts and conflicts with agricultural and residential activities will be minimized. The following goals and objectives summarize the issues and concerns for the various types of development expected to occur in the Township.

The following goals and objectives are hereby established for Marengo Township.

### **AGRICULTURAL LAND USE**

**Goal** - It is the intent of the Plan to use appropriate buffer zones and site planning to minimize adverse impacts on agricultural lands adjacent to developing areas.

**Policies** - The basic policy of the Plan is to maintain and promote agricultural uses. It is recognized that agricultural lands will be affected in areas where residential, commercial, and industrial developments are projected. The existing agricultural land throughout the Township is intended to continue to be used for agricultural purposes. The Township should consider options for preservation of agricultural land such as limited and controlled sized residential parcels, quarter/quarter zoning, sliding scale zoning or open space zoning. Other techniques such as the establishment of a purchase of development rights (PDR) program, transfer of development rights (TDR), conservation easements and related techniques could also be considered.

**Objectives:**

1. Preserve agricultural uses that contribute to the rural character of the Township
2. Identify areas in the township for farmland preservation
3. Provide for the needs of the agricultural community for limited development by allowing compatible or related uses in agricultural areas, including single-family residential uses on land that is unsuitable for agricultural use
4. Continue the strict standards for development already included in the zoning ordinance
5. Enforcement of strict standards for all types of non-agricultural development
6. Provide public information to other jurisdictions, residents, and potential residents/developers regarding the township's land use policies
7. Provide for special review and consideration of high intensity livestock and associated agricultural uses, which may negatively affect the environment or surrounding land uses
8. Consider the need for agricultural zoning such as quarter/quarter, sliding scale, exclusive agriculture or other zoning options that preserve agricultural land

**RESIDENTIAL DEVELOPMENT**

**Goal** - It is the intent of the Plan that the character of Marengo Township will be primarily agricultural with homes in rural and low-density settings and encourages meaningful open spaces to create an overall positive sense of place for Township residents.

**Policies** - The basic policy of the Plan is that the Township should adopt and implement Ordinance provisions that foster the establishment of residential developments that maintain its rural character, lower density settings, and natural features.

Marengo Township residents strongly desire to keep the Township a rural, residential community. While most would readily acknowledge the need to have a balance of other uses, the preservation of rural character and residential lands is an essential element of their definition of quality of life. This character is most evidenced by the Township's rural surroundings and natural features.

It is the basic intent of the plan to concentrate higher density land uses in limited areas within the Township. Consolidating higher density land uses will minimize conflicts between land uses. It will also minimize the cost of providing additional community services associated with higher density development such as fire protection, street improvements, drainage, lighting, and utilities.

The basic policy of the Plan toward residential development is to be planned and orderly in areas best suited to accommodate growth and minimize potential conflicts between residential and other land uses. Residential neighborhood development should occur without altering the aesthetic character of the rural and environmentally sensitive open spaces.

Encouragement of single family, low density residential uses in appropriate locations consistent with the Future Land Use Plan and adopt and enforce regulations necessary to protect the investment of single-family homeowners.

Protection of groundwater resources and surface waters are paramount considerations. When the Township is considering development proposals, natural features and other environmental features should be reviewed. In general, the Health Department recommends a 1-acre lot minimum lot size as an appropriate minimum lot size to accommodate the required separation between wells and septic systems with areas large enough to accommodate a second septic system if necessary.

Before approval, the Township should seek information about land development projects from applicants and other sources that is necessary to ensure that utilities, septic or sewage systems, wells or public water systems, roads, fire and police services, and other services are adequate to serve the proposed areas. Street addresses and driveway permits should be required for all zoning applications.

The Township should discourage large lot development, which wastes land and promotes unsustainable development. Acceptable densities can be realized through a combination of established maximum density requirements, clustering and related techniques. The Township should encourage compact development and creative design such as clustering and open space design incentives.

Other strategies could be employed such as the requirement that all new roads in certain areas must be public rather than private. Private street design standards, such as length and location, and the standards for lots that are served by private streets should be reviewed. Consideration should be given to their impact on the lower-density areas of the Township.

Where there is a potential for septic system failures or ground water contamination, larger lots could be justified.

Standardized formulas should be developed for use in the review and consideration of all open space residential developments. Residential developments that do not meet the standardized formulas for open space requirements, based on the number of proposed lots should be rejected.

The styles and types of contemporary subdivisions and site condominiums are not helping to create neighborhoods. Through a policy of consolidating development and requiring connecting streets and pedestrian pathways, existing neighborhoods can be meaningfully expanded. Certainly, lot size is an important issue, but there are many strategies the Township could employ to create better living environments.

A basic tenet of this plan will be to create a logical system of densities from higher density areas to lower density areas.

**Objectives:**

1. Consider locating low intensity multiple family residential units in environmentally appropriate and compatible with surrounding land's uses

2. Consideration of the need for development and adoption of local subdivision controls.
3. Elimination of conditions of blight in residential areas by enacting and/or enforcing property maintenance regulations
4. Adoption of provisions for environmental protection and enhancement related to the construction of new single-family residential development, including impact upon floodplains, wetlands and lowlands.
5. Discouragement of land divisions that would landlock parcels, or create excessively narrow or shallow parcels
6. Protection of existing residential development from negative impacts associated with incompatible land uses.
7. Provision of public information to other jurisdictions, residents, and potential residents/developers regarding the township's land use policies.
8. Direction of necessary capital improvements to areas of existing higher intensity
9. Site condominium and subdivision regulations should be adopted to reflect the policies of this Plan.

## **COMMERCIAL DEVELOPMENT**

**Goal** - It is the intent of the Plan that the Township should provide for an appropriate mixture of land uses. Accordingly, the Township will provide areas for nonresidential development that are appropriate for a rural, low-density community.

**Policies** - The basic policy of the Plan toward commercial development is to provide for convenient local commercial facilities to meet the needs of Township residents.

Commercial development should be designed to reflect the low-density residential character of Marengo Township, with an emphasis on meeting the daily needs of residents and limiting sizes of buildings and parking areas.

The Township should promote requirements for attractive commercial buildings and site development standards. Signage for example, should be attractive and sized appropriately for the size and scale of the site. Landscaping should be incorporated based on appropriate standards, and impervious surfaces should be kept to a minimum. Access management strategies such as minimizing the number of driveways should be utilized. Stormwater management practices such as on-site detention, retention and controlled outlets should be established.

Review of land use and zoning changes will include consideration of how the development preserves a rural character and natural features of the Township. Development proposals will be required to assure adequate water and sanitary sewer service prior to approval. Development reviews will include information on the effects of the development on area groundwater sources and surface water quality. Review agencies for site plan review should include the Fire Authority, Calhoun Conservation District, Health Department, and other regulatory agencies.

While Township residents place great interest in the preservation of rural character, they also recognize the need to provide for other land uses necessary in the community. The Township recognizes the need to establish a balance between the residents' needs for goods and services, and their desire to maintain a rural character.

The Township's low-density residential development may not be able to support a high level of services. Low-density spread-out homes and farms make it difficult to provide extensive public services in a cost-effective manner. It is unlikely that widespread public water or sanitary sewer will be available anytime soon. The need for on-site water supply and sewage disposal underscores the concerns of the Township about groundwater protection and the effects of growth on water quality.

**Objectives:**

1. Guidance of proposed commercial development to established population centers and Interstate intersections.
2. Discouragement of strip commercial development
- 3 Adoption of zoning review procedures for commercial development within the Township
4. Enacting of regulations that limit commercial development to those businesses that primarily meet local needs
5. Provision of public information to other jurisdictions, residents, and potential residents/developers regarding the township's land use policies.
6. Direction of necessary capital improvements to areas of existing higher intensity
7. Limit commercial development to protect the rural character of the Township.

**MANUFACTURING/INDUSTRIAL DEVELOPMENT**

**Goal** - It is the intent of the Plan to provide for very limited development areas for new industrial activities. The impact of proposed development must be carefully evaluated to ensure that the completed facility will not be detrimental to the Township as a whole.

**Policies** - The basic policy of the Plan is that heavier more intensive industrial development will be directed to those areas in adjacent communities where public services can be provided without excessive cost and with minimal effect on residential areas.

**Objectives:**

1. Discourage large-scale industrial development in the Township as a means of preserving rural character

2. Allow low intensity, small-scale industrial development to locate in proximity of infrastructure and I-94 and major paved streets, to limit the impact of truck traffic upon the circulation system
3. Adoption of zoning review procedures for industrial development within the Township
4. Provision of public information to other jurisdictions, residents, and potential residents/developers regarding the township's land use policies
5. Direction of necessary capital improvements to areas of existing higher intensity
6. Limit industrial development to specific locations to preserve the rural character of the Township and in proximity to public utilities.

### **RECREATIONAL FACILITIES**

**Goal** – It is the goal of this Plan that recreational facilities should be provided elsewhere and not necessarily within the Township. It is recommended that initially the Township consider primarily: (1) accommodation for continued development of facilities such as trails and bikeways, (2) coordinating activities with other governmental agencies such as the Michigan Department of Natural Resources and Calhoun County Parks Department (3) Consider greater utilization of the Kalamazoo River as a recreational resource.

**Policies** - Recreational facilities should be conveniently located in areas having significant residential development. It is recommended that the Township should consider acquiring land in strategic locations for the development of future recreational opportunities.

A Township recreation plan and the use of available grant programs should be maintained to assist in this effort. The Township should consider an alliance with the Michigan Department of Natural Resources, surrounding townships, and the Calhoun County Parks and Recreation Department to coordinate the possible expansion of recreational opportunities in Marengo Township. Bikeways, trails, and other types of non-motorized facilities should be emphasized as an important form of public recreation.

**Objectives:**

1. Preservation of open space/recreational resources in the Township
2. Development of private recreation and open space areas/facilities, and/or locally supported facilities, in cooperation with other public agencies
3. Consideration of proposals related to location of a county park or other outdoor recreational facility in the township.
4. Identification and preservation of ecologically sensitive areas, and valuable plant and animal habitats
5. Provision of public information to other jurisdictions, residents and potential residents/developers regarding the Township's land use policies.

**TRANSPORTATION FACILITIES**

**Goal** - The Township should pursue land development policies that foster a safe and efficient transportation network appropriate for a rural, low-density community. The influx of new homes will likely affect traffic along the major roadways. The Township must balance the desires of residents for rural character with the need to provide a safe, high quality roadway system. Non-Motorized transportation opportunities should be expanded in strategic places.

**Policies** - The basic policy of the Plan toward future road improvements is to provide an adequate transportation network to meet Township needs. Proper maintenance such as improving section line roads, road improvements, widening existing roads, and paving of gravel roads should occur in all areas but especially in areas of existing and proposed future residential development. The residential areas should be the top priority for a more concentrated effort at road maintenance and improvements.

Efforts should be made to maintain an efficient transportation network for motorized and non-motorized traffic. A pedestrian trail system, connecting concentrated residential areas, should be created throughout the Township, especially linkages between major activity nodes such as

schools, public institutions and other activity centers. Non-motorized facilities should be incorporated into the road system.

The Township should encourage the Calhoun County Road Department to consider a system for determining both short and long-term road improvement priorities considering such factors as resident desires, traffic volumes, roadway function, land use, and other appropriate elements. A land development pattern that reduces the number of access points onto county roads for individual uses should be encouraged. The County Road Department should be encouraged to improve all section line roads to at least minimum standards.

If the need for low-density residential development continues, it may be reasonable to allow the construction of new private streets to accommodate this type of development. Private Street design, location and inter-relatedness are important issues. Private streets might need to be prohibited in certain areas, where there are very large lot sizes, or in environmentally critical or sensitive areas. Private streets should be connected, where possible, thereby creating something of a neighborhood street system. This should be done by requiring reserve easements or out-lots. Since many easements to residential parcels were created a long time ago, it may be necessary for the Township to obtain a better understanding of all older private streets and easements and private accesses throughout the Township. Creating an inventory of recorded easements is an excellent way to accomplish this.

The Township should investigate and monitor the funding of the Calhoun County Road Department by the State Transportation Fund (Act 51 consisting of gas and trailer registrations) and prepare a summary to show how roads are funded. Annually, the Township should verify and monitor the 65.12 miles of county roads in Marengo Township. There are 35.44 miles of county local roads (34.79 miles paved and the other 0.66 miles gravel) and 29.68 miles of paved county primary roads. In addition, there are 1.80 miles of private (non-public) streets and 7.60 miles of Interstate 94. There are no State Highways within the township.

**Objectives:**

1. Provision of a safe and efficient transportation network in the Township
2. Create design and construction standards for private streets

3. Discourage the development of any new streets in the Township until existing streets are repaired to a reasonable standard
4. Participate cooperatively with the Road Department to develop a thoroughfare and pavement management plan that will meet the current and future needs of the community.
5. Discussion and implementation of the continued maintenance and improvement of all roads within the Township with/by the Road Department

### **PUBLIC UTILITIES AND SERVICES**

**Goal** - It is the intent of the Plan that public utilities should be provided in higher density areas in the Township. Construction of public improvements should be financed by developing property owners to not create an undue financial burden on existing residents. It is recommended that new developments provide the primary financing required for installing necessary public improvements as part of the initial construction of a project.

**Policies** – The basic policy of the Plan toward public utilities contemplates that public utilities such as gas, cable, high speed internet, telephone and electric services will be needed in areas experiencing higher density development. However, the precise extent and location of all public utilities is not precisely known and should be investigated further to gain a better understanding of their potential need throughout the Township. Also, the Township should obtain a better understanding of the impact that future public water and sanitary sewers might have on the Township especially along the Partello Road corridor. Although, while the Township is not currently part of any sanitary sewer district, any future connection is likely to be directly adjacent to the City of Marshall.

### **ENVIRONMENTAL**

**Goal** - It is the intent of the Plan that the Township maintain a high-quality natural environment. The numerous streams, and the Kalamazoo River watershed, all possess good water quality and support many species of wildlife throughout the Township. Recognizing that any development generally has the potential to cause some environmental degradation, it is the intent of the Plan that reasonable efforts be made to minimize adverse environmental impacts

whenever development occurs. Minimizing adverse environmental impacts can be achieved by ensuring that development occurs according to local and state environmental regulations.

**Policies** - The basic policy of the Plan is that development should not significantly interfere with the present environmental quality. Special attention should be given to regulations regarding septic tank location and construction, the State's Inland Lakes and Streams Act (Act 346, P.A. 1972) and the state's Soil Erosion and Sedimentation Act, (Act 347, P.A. 1972). Homeowners should be encouraged to monitor and properly maintain their individual on-site sewage treatment systems.

**Objectives:**

To maintain the high-quality environment and the rich natural resources that the Township currently possesses, environmental conditions within the Township should be monitored regularly. Adverse impacts occurring to the environment because of development should be corrected and prevented. Specifically, the forested portions of the Township have great aesthetic value and are a renewable resource and wildlife habitat.

1. Typical parameters that might be monitored include water quality in the lakes and streams and shallow or deep groundwater supplies.
2. The Township could also monitor loss of acres of wetlands, forestlands, and farmland. MDEQ permits for development in or near wetlands, mitigation or delineation should be monitored.
3. Potential causes of environmental degradation should be documented. Information acquired through the monitoring program should enable the Township, either through the distribution of informational bulletins or the adoption of appropriate regulations, to maintain its high-quality environment.
4. The Township should continue its partnership with the Calhoun County Conservation District.
5. The forested areas in the Township should be protected against unnecessary destruction.

6. Protection measures should be established including an inventory of mature trees on potential development sites, licensing of activities involving harvesting of tree lots or forestlands, and mitigation of certain species or caliper size trees to ensure continued forestation. Clear-cutting of significant forested areas should be prevented.
7. These policies can be modified for a variety of site characteristics and development activities and may be varied based on their location in the Township.
8. Provide for limitations on building and development adjacent to rivers and streams.
9. Provide for environmental protection and enhancement related to the construction of new single-family residential development, including impact upon floodplains, wetlands and lowlands.
10. Buildings and structures should not be allowed within 100 feet of a lake, river, or stream.
11. Establishing a clear and effective means of establishing the high-water mark is important.
12. Development within areas having 25%-33% grade should be required to present engineered plans.
13. Wind turbine and solar energy facilities for electricity generation could be allowed for use by individual homeowners, but commercial ventures should not be allowed without a Special Land Use permit.
14. Storm water retention facilities should be required for all nonresidential developments and for residential developments over five acres.

Using appropriate setbacks and buffer zones should help preserve sensitive environmental and habitat areas including wildlife habitat corridors, wetlands, swamps, lakes, creeks, streams, and other similar areas. Therefore, all parcels within a 500-foot setback of surface water bodies should be inventoried by creating a GIS overlay that shows where Soil Erosion and Sedimentation Permits are required. Within this 500-foot zone, the following activities should be monitored:

- Permits for earth changes that disturb one or more acres, except for farming activities
- DEQ permit applications for all properties that have navigable water frontage
- Require DEQ permit applications for the construction of all ponds greater than one (1) acre in size
- Obtain written comments on all development projects requiring Site Plan Review from Calhoun County, Road Commission, Drain Commission, Health Department and appropriate Fire Chief.
- Soil Erosion and Sedimentation Permits for all zoning applications are required.

While there have not been any new county drains since the 1970's, there are new privately maintained drains that require the Calhoun County Drain Commissioner's approval. County drains with watersheds, sub basins, and wetlands should be mapped on the same GIS overlay system. A minimum buffer should be established to all these mapped features for all development activities. An effective Wetland definition should be created.

## **PUBLIC HEALTH**

**Goal** – It is the intent of the Plan that the Township's environmental health policy protect the air, water and natural resources of the Township by promoting public awareness and establishing reasonable well-thought out protection measures.

**Policies** – The Township should promote nitrate contamination awareness and continue to require a minimum well depth for drinking water, since the chance for contamination is higher in shallow wells. Septic systems should not be located where ground water can interfere with infiltration. Since quality is better in sandy soils because of dilution, higher density development should only be allowed in areas having sandy soils as opposed to a high ground water table. Stricter standards should be developed for development in certain areas of the Township that has had problems getting water because of near-surface clay veins.

### **Objectives:**

1. The invert (or the bottom of the excavated portion) of septic systems should not be allowed within 100 feet of the 100-year flood plain or within 100 feet of the ordinary high-water mark of rivers and streams

2. To keep septic systems from failing, soil information should be required on lots smaller than one acre
3. Depending on soil types and depth to ground water, a one-acre minimum lot size should be required to leave room for a reserve drain field
4. Residential Planned Unit Developments (PUD) and Open Space Developments should be encouraged
5. Development should be determined by density rather than lot size to maintain open spaces, water quality and to create long-term sustainability
6. Hydrologic studies should be required in large developments to ensure groundwater sustainability
7. A 25-foot minimum well depth for drinking water should be required

## **SECTION 7**

### **MANAGEMENT RECOMMENDATIONS AND LAND USE STRATEGIES**

Existing land use patterns in Marengo Township suggest continued growth, consisting primarily of residential development in the form of individual lots. Environmental conditions, protection of farmland and access constraints limit growth in certain areas of the Township. As growth pressure from the Battle Creek and Marshall areas heightens, it may become more challenging to maintain the low-density rural character that is the resident's vision for Marengo Township.

Planning and management guidelines can be used to maximize the quality of life and create a more pleasing environment. This is fundamental to the Township if it is to exist as a unique place to live or visit. Protection of the natural amenities of the Township and their ecological functions are a high priority. As the Township develops, there will be an increased demand for public facilities and services to serve the increased population and to protect the environment. This section discusses the management strategies of the Township considering the Township's future needs, existing conditions, and goals. The following management practices can be administered through a variety of techniques including the Site Plan Review requirements of the zoning ordinance and other ordinances of the Township such as land division controls.

#### **PUBLIC SERVICES**

There are currently no discussions or consideration being given to the development or extension of public utilities in the township. A logical extension of services in the township would be along the eastern edge of the City of Marshall. Public services including sanitary sewers and public water supply could eventually be an integral part of this area. Their availability depends primarily on having developed densities or major users to support the significant cost. Other public services such as natural gas, storm drainage, sidewalks, bike paths, and street lighting could also be encouraged in this area. This Plan recognizes that public services are typically added in response to higher density development and intensive land uses. An on-going cooperative planning effort, between Calhoun County, the City of Marshall and Marengo Township could help establish a basis for extension of public services.

## **TRANSPORTATION MANAGEMENT**

**Public Streets** – While the design of public streets (county roads) is not the responsibility of the Township, there are ways in which the Township can influence the future maintenance and improvement of county roads. The highest priority road improvements (paving, widening, extensions, and realignments) should be clearly identified and a program established to implement the necessary changes. The Township should work closely with the County Road Commission to agree on road improvement priorities and related improvements such as bridges, road ends, trails, bikeways and pedestrian ways. Streetlights are recommended at all intersections.

**Private Streets** - Existing residential development has primarily occurred along major roadways. As development progresses, an increasing number of section interior lots will likely be created. The creation of small subdivisions on private streets or the desire for long easements leading to back lots will undoubtedly occur. This is especially true for the low-density residential areas of the Township. Sensitivity to the placement of new roads, private street regulations, and the preservation of natural resources should be priorities.

Without design standards, private easements are constructed haphazardly and may be insufficient to carry traffic for extended periods. In many cases, these private easements provide access to numerous dwellings. Without the benefits of basic tools such as maintenance agreements, street names, and stop signs or in some cases, even a good understanding of property owner's rights of access, problems can occur for the township regarding repairs and maintenance as well as difficulties as the result of changes in property ownership. These easements should be identified, and an effort made to urge the affected property owners to establish maintenance agreements, and perhaps other improvements such as stop signs, street name signs and speed limit signs.

Private streets may serve a legitimate purpose in areas where residential development is intended but would not achieve a high enough degree of density to maximize the conversion of otherwise rural land. Private streets can be effective tools for developing the interiors of sections, especially in areas where road frontages are already substantially developed. Typically, the developer is required to meet the Township's standards for road building and must establish a homeowner's association having the responsibility for road maintenance. In this way, the

Township can regulate the quality of development and not be burdened with maintenance responsibilities.

If private streets are proposed, they should be developed to the minimum design, construction, inspection, approval, and maintenance requirements as specified by the Township design standards. Basic design standards should be established. For example, road intersections should be efficiently aligned at 90-degree angles, wherever possible. Design standards should address pavement type, right-of-way width, depth of pavement and sub-base, curves, shoulders, curbs, culverts, and drainage. The layout of private streets in respect to their location, intersections, cul-de-sacs, vertical street alignment, street grades, street signs, horizontal curves, curb openings at intersecting streets, etc., should conform to Township standards. Streetlights are recommended at all intersections, the installation and operation of which should be financed by homeowners through a special assessment district.

Private Street design standards set forth the minimum standards for all private streets. Streets should be arranged in proper relation to topography to result in usable lots, safe streets, and reasonable gradients. Streets should follow contours to minimize the effect of water drainage over the street or onto adjacent properties. Cul-de-sac streets that do not have a second connection to a county primary road or the equivalent should be limited in length. Special consideration may be given to longer cul-de-sacs under certain topographic conditions or other unusual situations. Cul-de-sacs should end with an adequate turnaround with a minimum radius to accommodate emergency vehicle such as fire trucks. Design standards for private streets should be less stringent for roads serving only a few parcels.

## **NATURAL FEATURE RESOURCES MANAGEMENT**

The goal of this plan is to protect and preserve the natural beauty and environmental quality of the Township. Marengo Township has a variety of unique and environmentally sensitive land types including ecologically significant areas. Development activities can contribute to environmental degradation by contributing toward soil, herbicides and pesticides draining into adjacent surface watercourses. A level of protection can be afforded to these water features by establishing a buffer zone adjacent to drainage ways. A setback of 100 to 150 feet can be very effective in preventing damaging runoff. Natural vegetative buffers in these areas absorb nutrients that might otherwise be carried downstream and the resulting ribbons of green space

can become recreational amenities in the form of linear parks. At a minimum, the Township should restrict building near watercourses by establishing a specified setback for structures and septic systems.

Low-lying areas should be avoided for development. Typically, the lowest elevations represent wetlands, floodplain, or groundwater recharge areas. The lowest elevations in the Township are typically along the rivers and streams. The preservation of low areas represents concern for groundwater recharge and flooding. Therefore, developments in low elevations should demonstrate that flooding and impairment of groundwater recharge would not present a problem. Other important natural features include wetlands, lakes, and forest. They add to the beauty of the Township and play an important ecological role by providing wildlife habitat, detaining storm water runoff, reducing soil erosion and sedimentation, and function as recharge areas for groundwater aquifers. They are the primary reason for the quality of life in Marengo Township and should be preserved or left largely undeveloped.

Large consolidated parcels provide excellent opportunities to preserve meaningful habitat areas and wildlife corridors. The Township's zoning regulations should provide strong regulations to protect natural features and environmentally significant areas. Overlay zones, environmental regulations, and design standards can all be incorporated into the zoning ordinance.

**Clustering and Open Space Development** - Clustering development in a limited area, with the overall, or "gross density" of the site remaining the same as might otherwise be allowed can be advantageous. Cluster development does not increase the number of homes but does allow the preservation of valuable open space. Although clustering may increase the net density within a smaller area, the gross density would fall within the requirements of the Master Plan and subsequent zoning regulations. Approving cluster development through a planned unit development (PUD) provides the opportunity to ensure that land will be kept free from future development. The remaining open space could be deeded to a conservation society or other public institution or deeded in equal parts to the property owners. Regardless of ownership, the remaining acreage could not be developed with additional housing units.

**Wetlands** - Wetland's management is an integral part of the Township's goals regarding protection from unsuitable growth and development, and a means to preserve water quality.

Numerous areas of the Township are classified as wetlands. The Township should monitor development in or near wetlands and discourage development in wetlands. The Township should ensure that proper MDEQ permits are secured if any filling, dredging, or development is proposed in wetlands.

Wetland areas should not be rezoned to higher intensity uses, such as high-density residential, commercial, or industrial uses. The Township's Site Plan Review process should also be used as an effective tool to prevent development in wetland areas. Township wetland areas are identified in **Figure 9 - Wetlands**. Wetlands pose a great limitation to development for several reasons. Their water table makes them unsuited for septic disposal systems. To build on them, fill is required, which destroys the wetland and eliminates its role in the ecological system.

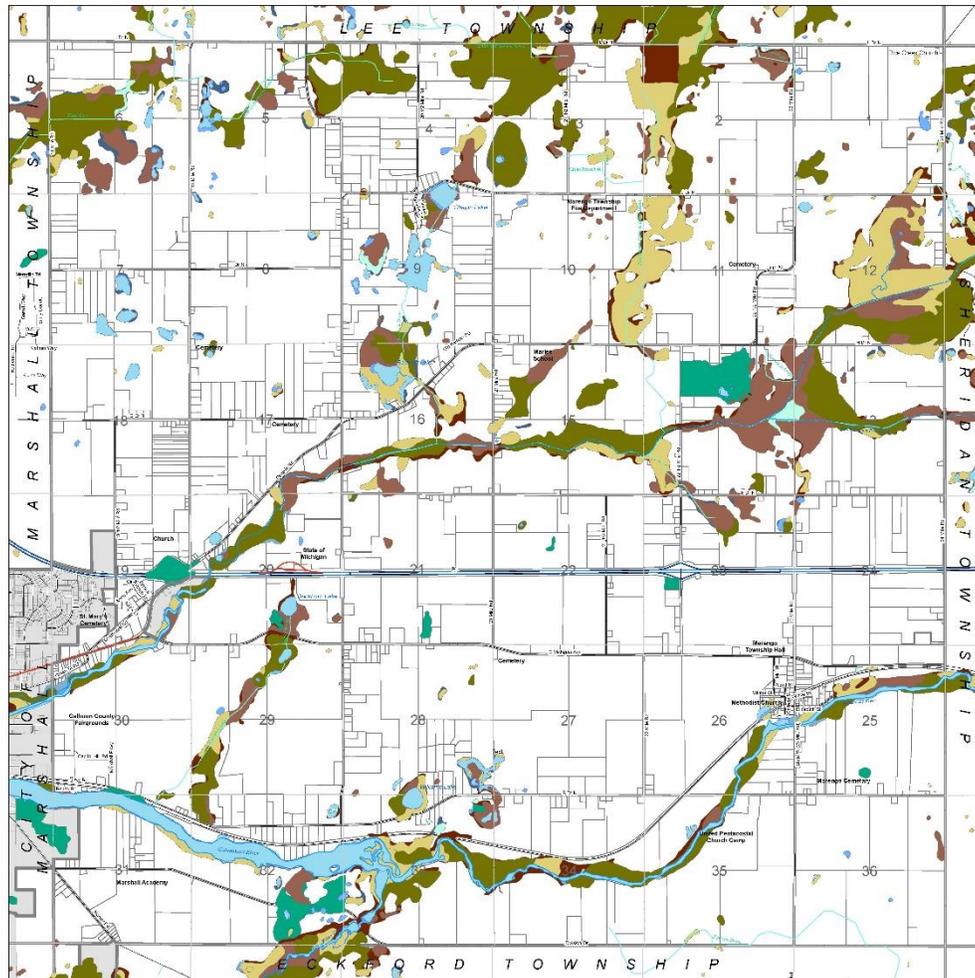
The following are the two most common techniques that can be effectively incorporated into a wetland management strategy:

Avoidance is the Township's preference in protecting wetlands. Avoidance protects the environment and ensures quality land development, and many developers understand that the best way to obtain site plan approvals is to avoid wetlands altogether. The goal of this Plan is to encourage avoidance.

Mitigation is another common option of approving development in wetland areas but is not the preferred technique in Marengo Township. Mitigation refers to methods for eliminating or reducing potential damage or destruction to wetlands, ways to repair or restore unavoidable damage, and creation of new wetlands to offset the loss. The most common procedure is to compensate for wetlands destroyed by creating new wetland habitat on sites at another nearby location. The preference of the Township is to discourage mitigation.

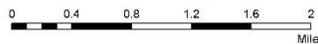
At a minimum, the zoning ordinance should include provisions requiring that development proposals obtain the necessary state and federal permits, including wetland permits, before consideration for a zoning permit. There should be requirements that all newly created lots be buildable (i.e., that lots must have enough non-wetlands area to meet minimum size, setback, parking, and accessory use requirements). The review process should guarantee that newly created lots and development applications meet the standards of the term "buildable lot" as

**FIGURE 9 WETLANDS**



# Marengo Township

## Calhoun County, Michigan



### Water Features

#### Wetlands Classification

- Aquatic Bed
- Emergent
- Forested
- Open Water/Unknown Bottom
- Scrub-Shrub

#### Soil Class

- Histosols & Aquepts
- Histosols & Fluvaquepts
- Muck
- Udipsamments & Udorthents
- Water

- Drains
- Rivers
- Lakes



Source: Calhoun County GIS & Marengo Township, 2014

defined in the ordinance, and a statement that lots created by circumventing this process are not legally developable or eligible for variance review. In addition, the Township should consider:

- Ensuring that local subdivision controls require that all lots be buildable and that wetlands be identified on all information submitted for review
- Having full-size color drawings of Township wetlands available for display
- Establishing, as the primary goal, the absolute avoidance of wetlands for development
- Coordinating wetlands planning and enforcement with adjacent units of government
- Appointing local officials to coordinate wetlands permit review with the State Department of Environment Great Lakes and Energy (DEGLE)
- Initiating improved mapping of wetlands on a parcel-by-parcel basis
- Disseminating wetlands information in a campaign to educate the public

The township may regulate wetlands by ordinance, in addition to state regulation, if certain criteria are met.

**Waterfront Development** - Proper regulations (such as setbacks, preventing removal of natural vegetation, and maximum land coverage) should be established. Non-residential land uses should be limited along shorelines as surface water runoff from these uses includes many impurities harmful to water quality. The Township should establish an easily enforceable demarcation along the shoreline from which to enforce setback regulations. The township should consider methods for management of waterfront property to protect them from degradation while making them available for public appreciation.

**Forested Areas** - A considerable portion of the Township is heavily wooded. Much of the rural character and beauty of the Township is a result of the presence of large, mature trees and wooded areas. The preservation of woodlands and trees benefits the community, the property owner, and the developer in many ways. Woodlands serve many valuable functions including providing wildlife habitat, protecting against erosion and sedimentation, buffering against noise, and cooling and cleansing air. Completely removing all the trees and woodlands creates an undesirable situation, and development that proposes the entire removal of forested areas should be prohibited. Woodlands and tree protection guidelines demonstrate a forward-thinking policy concerning the stewardship of the Township's natural resources. They also provide an

important element of community character. Mature trees and woodlands have been shown to increase property values, and extensive woodland areas influence water quality by transpiration, reduction of evaporation from soils, filtering rainwater and groundwater, and preventing runoff and soil erosion. Studies have shown that they may improve air quality by filtering harmful chemicals. They also provide very effective noise and wind screens.

Low-Density Residential areas may be appropriate in forested areas, provided the design minimizes the destruction of trees and maintains an overall forested appearance. The primary concern is to provide for a certain degree of preservation of trees or woodlands, but not to have regulations that restrict development to such an extent that property rights are unfairly inhibited. A basic type of protection can be focused on saving individual trees. In areas where there are few actual types of woodland remaining, zoning regulations could require that individual mature trees be preserved or replaced. Ultimately, a detailed tree inventory of a site might be warranted.

Woodland protection, as opposed to tree protection, emphasizes preserving larger areas that contain complete environs of ground cover, under story, over story, wildflowers, shrubs, trees, and wildlife. Woodland regulations are intended to protect, preserve, and ensure proper maintenance of woodlands, and seek to promote development that minimizes impacts on a community's woodland resources. Woodland protection may evaluate potential impact on woodlands as part of a Site Plan Review process. Evaluation of developmental impact might include soils, water, and diversity of species, tree vigor, species tolerance, climatic influence, and wildlife habitats. The Township should support a policy prohibiting clear cutting in mature forest areas. Selective harvesting of forested areas as a business venture may be acceptable.

Woodland protection ordinances are generally intended to preserve community character by limiting the clearing of large stands of trees. This is different from landscaping requirement regulations, the usual intent of which is the planting, protection, and establishment of care standards of street trees that are usually located on public property. The requirements of woodland protection ordinances are easily linked to, and can be enhanced by, other regulatory measures in the zoning ordinance, such as planned unit developments or cluster development options.

**Water Quality** - Water resources are part of a fragile system that is potentially at risk. A combination of poor soils unsuitable for septic systems, a high-water table, and an increasing amount of rural development, may threaten the quality of the area's water supplies. Surface water features, which are affected by land use, include soil erosion, impermeable surfaces (such as parking lots, private streets, driveways, and roofs), soil contamination, and recreational development can affect surface water quality. The preservation of water quality is important for plant and animal life and drinking water supplies.

One of the most significant threats to surface water is soil erosion, which deposits sediment into streams. One of the more effective means of controlling sedimentation is through watershed management. Watershed management involves a combination of land use and environmental analysis to determine actions to identify and address those areas that contribute to sedimentation of the stream system. A watershed approach is used to ensure that problems that are regional in nature are addressed, rather than attempting to find solutions on a site-by-site basis.

**Watersheds** – In actuality, a very small percentage of the total area of a watershed borders directly on the water body. Yet, a larger land area is drained by a flow system that transmits surface water from all land in the watershed. If, for example, improved drainage channels do not connect the bulk of a drainage basin to the water body, the movement of runoff may be slow. Much of the water may be retained, infiltrated, or evaporated. On the other hand, if the basin is interlaced with channels that together form an efficient flow network connected directly to the water body, little water is lost en route. Larger watersheds contain numerous smaller sub-basins. Smaller sub-basins having rapid drainage should be protected from damaging pollution by limiting the extent and density of development.

Watershed management requires the cooperation of the units of government that lie within the watershed. Coordination of land use and development regulations is necessary to ensure that the actions of one community do not cancel out those of another. Specific regulations pertaining to soil erosion and sedimentation control practices, protection of wetland areas, increased water body setbacks, the use of greenbelts or buffers, and density reductions can assist in protecting water quality. However, these measures are most effective if done throughout the watershed.

**Stormwater Management** - The relatively low density of Marengo Township today makes stormwater management a realistic and realizable goal. The recommended management program calls for Stormwater to be stored onsite and released at a rate that approximates predevelopment runoff rates. While stored, sediment and attached pollutants may be settled out. When applied throughout a drainage basin, runoff management can substantially reduce major investments in downstream flood, pollution, and erosion control projects.

Preserving critical stormwater storage areas in flood plains and wetlands is one of the most important elements of a Stormwater management program. To the extent feasible, it is better to preserve and use the natural drainage system than to replace it with a man-constructed system. Existing wetlands are excellent natural detention areas for storm drainage. Developments should be required to install Stormwater detention facilities designed to store temporarily the water on the site and to release it slowly into the natural system. This will help to reduce flooding and will improve the quality of water entering the Township's streams and lakes. Curb and gutter design configurations with underground drainage on private streets should be discouraged. County drains can also be established, only when necessary to resolve flooding problems.

**Groundwater Management** – Groundwater quality is a primary concern because all Township residents rely on groundwater for their domestic water supply through individual wells. Any substance that is placed or injected in the ground has the potential to affect groundwater quality. Therefore, protection of ground water supplies is a consideration that should be given high priority. Groundwater contamination can result from a variety of sources. Groundwater protection measures can begin with good surface water management. There is certainly a direct link between land use activities and groundwater protection. A problem of growing concern is the cumulative impact of contamination of a regional aquifer from non-point sources (i.e., those that lack a well-defined single point of origin), such as those created by intensive use of fertilizers, herbicides, and pesticides. In addition, small point sources, such as numerous domestic septic tanks, small accidental spills from both agricultural and industrial sources, and toxic substance leaks and spills by transportation activities threaten the quality of regional aquifers. Avoiding undesirable land use activities in recharge areas and wetlands should help protect groundwater quality.

In the past, strict standards regarding the location and depth of drinking water wells were not always followed. The Township may have an undetermined number of shallow wells at individual home sites. Scrutiny should be given in the future to the depth and location of drinking wells and the type and location of septic systems.

Land use regulations, land acquisition, and education programs can play a key role in protecting groundwater. Examples of land use control activities include the following:

- Land use plans which consider groundwater vulnerability;
- Zoning ordinance and site plan review standards related to aboveground secondary containment, interior floor drains, and other topics;
- Purchase of land and/or conservation easements to provide a buffer around municipal wellfield;
- Public education through public meetings, school-based classroom programs, library displays, cable television videos, public information flyers, and municipal newsletters.

Groundwater protection will become increasingly important as population densities in areas not served by public utilities continue to increase. As more people move to Marengo Township, and more of those people come to rely on groundwater for their household water, protecting groundwater will be essential.

## **AGRICULTURAL MANAGEMENT**

**Purchase of Development Rights** – Farming has been a historically successful component of community life in Marengo since its earliest settlement. Large areas of the township consisting of prime soils for agricultural production are actively farmed. It is obvious that farming represents an economic benefit to the community and to the region. The Calhoun County Master Plan supports the objective of purchasing the development rights of the most valuable farmland to protect it from development. This is also the objective of this Plan. Farmland should be preserved, and the purchase of development rights program is an excellent way to achieve that.

**Agricultural Best Management Practices (GAAMPs)** - To date, agricultural lands have been mapped, and limited analysis has been conducted on the types of ongoing agricultural practices. It is proposed that the Township work closely with the Conservation District to promote and

coordinate implementation of best management practices. Agricultural best management practices are farming practices designed to promote soil conservation. Since runoff from agricultural lands has the potential to be a major source of pollution, steps should be taken to reduce agricultural runoff to the extent possible.

## **OPEN SPACE MANAGEMENT**

Using a variety of good management techniques at the local level can help preserve open space. The Township can employ Site Plan Review, Planned Unit Development, or Clustering Options, as functions in the zoning ordinance. Privately funded Conservancies, local groups or the Township itself can purchase development rights, use conservation easements or purchase property outright. These techniques are intended to assist the Township in accomplishing its goal of preserving valuable open space.

A conservation easement is a legal agreement in which the landowner retains ownership of private property but conveys certain specifically identified rights to a land conservation organization or a public body. Essentially, under provisions of a conservation easement, development and other activities that have the potential to diminish the scenic or environmental integrity of the land are limited or prohibited. Conservation easements provide an extremely effective tool for protecting environmentally sensitive lands, such as undeveloped shore lands and wetlands.

## **HAZARD PROTECTION**

Natural hazard mitigation is an effective tool in reducing the loss of lives and property in areas where hazards exist. Hazard mitigation is defined as an action intended to reduce or eliminate damages or other negative impacts caused by natural or technological hazards. Federal funds are available for up to 75 percent of the cost of some hazard mitigation measures. To be eligible, a project must satisfy specific criteria about the applicant, cost and work eligibility. Potential eligible projects are limited to the following:

- Acquisition of real property in a hazard area/physical relocation of structures from a hazard area.
- Elevation of structures in compliance with Federal, state, and local ordinances.

- Retrofit of structures to reduce wind, water, fire, and freeze damage such as wet or dry flood proofing, high wind bracing, and application of wildfire resistant materials, structural fire safety measures, and insulating public infrastructure.
- Structural hazard control measures such as debris basins, storm water detention basins or infiltration wells, culvert upgrades, diversions, flap gates or floodgates, localized flood control system to protect critical facilities.
- Vegetation management such as natural windbreaks, living snow fences, shoreline stabilization, urban-forest practices, landslide stabilization, and wildfire defensible space.
- Conduct design, engineering, or feasibility studies for complex mitigation projects that can be reasonably expected to be funded and implemented.

The primary natural hazards affecting Marengo Township include the following:

**Flooding** - Zoning regulations should limit development within flood plains. Existing structures within flood plains should be considered non-conforming and the Township should consider having non-conforming structures removed. Subdivision regulations should contain requirements for development only above flood plain levels.

**Winter Weather/Snowstorms** - The Township should consider the establishment of heating centers (shelters) having emergency power to accommodate at-risk populations during winter power outages. Site plans should include snow removal areas to accommodate the extra snow during periods of sustained severe winter storms.

**Wildfires** - Wildfires typically start in woodland or prairie areas. They can occur naturally or by human activities. Wildfires can be difficult to control as they move toward developed areas and threaten homes. Prevention of this threat could include creating defensible space in the form of buffer zones. One such technique might be to widen the cleared areas of rights-of-way that are in the direct path of prevailing winds. Other techniques include fireplace and chimney maintenance, controls on open burning, arson prevention, driveway standards allowing quick and easy access, bridge maintenance, and clear property addressing.

**Severe Storms (Tornadoes and High winds)** - Damage from thunderstorms and high winds can damage property and cause loss of life. Communities can employ early warning systems

and require wind-engineered measures for construction of all wind prone construction items such as accessory structures and signs, etc. Manufactured homes should be required to have tie-downs with anchors inspected to ensure they are appropriate for the soil type that is present.

**Accidents and other Transportation Hazards** - The risk to transportation accidents can be reduced through improvements in traffic law enforcement and transportation planning. The Sheriff's Department should be encouraged to enforce speed limits for transport vehicles, especially those hauling hazardous or flammable materials. Street design should incorporate reasonable curve radii, truck routes, weight restrictions, and the use of connector roads to reduce congestion on main routes. Alternate routes and good traffic control in the case of accidents during a hazardous material accident should be carefully planned. Railroads should be inspected, and crossings maintained.

**Public Utility Failure** – In order to prevent public utility failures, it should be the policy of the Township to encourage all new utility lines be placed underground. Certain redundancies should be planned into critical utility systems such as generators for backup power for emergency services and at shelters. Electrical and communications systems should be protected from lightning strikes.

**Infrastructure Failure** – Bridge and road failures have the potential to prevent necessary relief to disaster areas and can create severe hardship for all forms of transportation movement. At a minimum, alternative routes should be planned along major thoroughfares where bridges are present to prevent blockage to any part of the Township by emergency vehicles. The Township should coordinate with the County Road Department in preparing an analysis of bridge conditions in the Township.

## **SECTION 8**

### **PLANNING AND DESIGN STANDARDS**

As the Township develops and as people continue to move into the Township in search of rural lifestyles, there will be increasing conflict between development and quality of life. The intent of this plan is to allow reasonable development to occur, provided growth does not destroy the quality of life that encouraged people to move to the Township in the first place. This section discusses some of these issues and presents recommendations for proper site planning and design.

#### **SOLAR ENERGY (Primarily on-site use)**

Solar energy is a clean, readily available, and renewable energy source. The Township's policy on the installation of solar panels is one of balancing the need for supplemental energy in an environmentally sensitive way with the desires and concerns of residents. Consequently, solar panels for personal use may be acceptable in most parts of the Township perhaps under certain conditions. The adoption of regulations facilitating the use of solar energy within individual properties is consistent with being an environmentally friendly and energy conscious community. Solar Energy Systems should be considered a permitted accessory use in all zoning districts. Zoning regulations should facilitate the installation and construction of Solar Energy Systems so that systems are safe, effective, and efficient, as well as harmonious with the character of the adjacent area where located. Potential conditions could include the size of the solar panels, yard location, parcel size, height restrictions, setback provisions and noise considerations. Future amendments to this ordinance may be necessary as technologies and market conditions may influence the frequency, density, and impacts of these systems.

#### **COMMERCIAL SOLAR ENERGY FACILITIES**

Commercial Solar Energy Facilities differ from residential or personal systems in that the land, equipment, devices and hardware comprising a commercial operation creates energy from direct sunlight that is transformed into electricity for distribution exclusively to a regulated public utility for transmission to off-site customers. A Solar Energy Facility produces electrical energy only for off-site use. Such a facility may include solar photovoltaic cells on ground-mounted panels and other equipment, including underground electric distribution lines and, if permitted, above-ground connection to overhead electric utility transmission lines. It is recommended that

the Zoning Ordinance be amended to include conditional uses authorizing approval, subject to applicable standards and requirements as are deemed appropriate.

## **WIND TURBINES**

Wind energy is a growing form of alternative energy sources. Wind energy for production of electric power is typically harvested by turbines elevated on towers. Wind turbines can be small residential applications with single rotors that merely supplement the electrical usage of a home or they can be harnessed by large wind farms consisting of many wind turbines. The small wind-powered electric systems industry sized for homes, farms, and small businesses has experienced major growth in the past decade. These turbines, which are defined as 100 kilowatts in capacity and below, have seen their market grow significantly and the industry has set ambitious growth targets continuing at 18-20% through 2020. The U.S. is the world's leading producer of small wind turbines, the vast majority of which are installed on U.S. soil. These machines are used by individuals to lower their electric bills, become independent of their electric grid, and to avoid the unpredictability of traditional energy prices. The Township's policy on the installation of small-scale individual-use wind turbines is one of balancing the need for supplemental energy in an environmentally sensitive way with desires and concerns of residents. Consequently, small-scale wind turbine locations for personal use are acceptable in most parts of the Township perhaps under certain conditions. Potential conditions could include the size of the propellers and towers, parcel size, yard location, height restrictions, setback provisions and noise considerations. Towers of 100 feet in height or less should be adequate for personal use.

## **COMMERCIAL WIND FARMS**

Locating towers and turbines in residential settings can be challenging. It is recommended that towers have adequate spacing from property lines and cleared areas around them. Towers should be monopole design and should not be excessively tall

A large wind farm may consist of just a few turbines to several dozen and cover an extended area of many square miles but the land between the turbines may be used for agricultural or other purposes. Usually sites are selected based on site-specific meteorological data for wind speed and direction. To collect wind data a meteorological tower is installed with instruments at various heights along the tower. These 'MET' towers include anemometers to determine the wind speed and wind vanes to determine the direction. The towers generally vary in height from

90 to 180 feet. The towers primarily are left to collect data for one to two years and then disassembled.

With wind farms, individual turbines are interconnected with a medium voltage power collection system and communications network. At a substation, this medium-voltage electrical current is increased in voltage with a transformer for connection to the high voltage transmission system. Wind farms have many turbines and each extract some of the energy of the wind. Where land area is sufficient, turbines are spaced three to five rotor diameters apart perpendicular to the prevailing wind, and five to ten rotor diameters apart in the direction of the prevailing wind, to minimize efficiency loss. The "wind park effect" loss can be 2%.

Wind farm sites may have significant esthetic impact, since the turbines are visible for great distances. Wind farm siting must also consider impacts on wildlife, including migratory animals. Wind project proponents may face opposition from area residents concerned about sound level, light flicker, appearance, throwing of ice and snow and the other impacts of wind turbine placement

### **TELECOMMUNICATIONS TOWERS**

The Township's policy on the installation of these towers is one of balancing the necessity of communications facilities with the desires and concerns of residents. Consequently, tower locations are expected to be located mostly along major transportation corridors. Where it is practicable, the Township should encourage co-location, using tower locations or other existing structures already in existence. Where this is not possible and new towers are proposed for construction, the Township's policy should be to locate these facilities along highway or county primary road corridors. The most logical location in Marengo Township is along I-94. For the most part, towers should be located within a reasonable distance from this corridor and preferably, on property that borders the highway. Setback provisions and other standards protect both the safety and aesthetics of nearby residents and property.

### **WOOD-FIRED BOILERS**

The Township's policy on the installation of wood-fired boilers is one of balancing the need for supplemental energy in an environmentally sensitive way with the desires and concerns of residents. Consequently, one wood-fired boiler for personal use may be acceptable in most parts

of the Township perhaps under certain conditions. Potential conditions could include parcel size, yard location, height restrictions, setback provisions and smokestack height considerations.

## **SIGNAGE**

Commercial development in the Township will create a corresponding increase in signage. However, an abundance of signs can create an unsightly appearance and can detract from the residential and rural character of the Township. Sign clutter resulting from large, gaudy or imposing signs can create an unattractive business environment that would discourage quality businesses from locating in the Township. Therefore, Township regulations should control the size, height, type, and location of signage. The regulations should be flexible enough to allow businesses to attract customers but not allow the signage to destroy the character of the community.

## **BILLBOARDS**

Billboards are signs that advertise businesses, products, or messages not related to the site on which they are located, generally called “off-site” signs. Billboards are typically much larger than on-site signage and can destroy the overall appearance and aesthetics of the community. Billboards should be limited to appropriate areas of the Township and should be regulated with respect to location, size, spacing, and height. State sponsored signs and Tourist Oriented Destination Signs (TODS) are encouraged as the primary type of off-site advertising signs. Consideration must be given to Act 106 of 1972, the Highway Advertising Act of 1972.

## **SETBACKS**

Proper setbacks from property lines and the right-of-way should be provided for all land uses in the Township. Setbacks are necessary to maintain the character of an area, protect natural systems, buffer adjacent land uses, provide emergency access, provide for adequate light, ventilation, and air, and to create an aesthetically pleasing environment. Setbacks from rights-of-way on major arterials promote safe vehicular movements, reduce noise levels, and preserve rural character. Setbacks in commercial areas should be sufficiently wide when adjacent to residential areas. Land uses along county primary roads should have greater setbacks than other local roads to provide room for future potential road widening.

## **SCREENING/BUFFERING**

Higher intensity uses should be screened and buffered from the view of motorists and adjacent residential homes. Screening refers to devices such as walls, fences, and compact planting of vegetation. Buffering refers to separating land uses, either by adequate setbacks or through a gradation of zoning districts (e.g., where commercial and single-family homes are buffered by apartment buildings).

## **LANDSCAPING**

To ensure that the built environment is as attractive as possible, landscaping requirements should be included in the Site Plan review requirements of the zoning ordinance. Required landscaping could take the form of grass cover and/or shrubs and trees. Parking lot landscaping, usually in islands, can also be used to improve the internal circulation of the lot. Front, side, and rear yards should also be landscaped with at least grass cover to improve appearance of higher-density residential or commercial areas. Maintaining some lots in green space will also reduce the rate of surface water flow and improve the water quality of Stormwater leaving the site.

## **JUNK/JUNK VEHICLES**

The township should restrict the unsightly accumulation of junk and junk vehicles. The accumulation of junk creates public health and safety concerns, as the junk creates habitats for rodents and insects and creates dangerous environments for children. In addition, junk causes deteriorating property values and generally makes the Township a less desirable place to live. Outdoor storage of junk should be prohibited in all residential areas and should be properly regulated (e.g., fenced and screened) in agricultural and commercial areas. Therefore, the plan also recommends that the Township continue to enforce the ordinance to regulate existing junk and junk vehicle problems.

## **HOME OCCUPATIONS**

Home occupations are accessory business uses conducted in a home, usually by the residents of the home itself. Several home occupations such as childcaring, hair styling, and pottery making, currently exist within the Township and are among the various types of services or occupations that residents of Marengo Township provide from their homes. Some home occupations are occurring outside the confines of the residence in yards or accessory buildings. Some of these uses include an auto repair, electrical contracting, machine shop and a banquet facility. The intent of this plan is to allow these uses to continue, if the character of the home and

the residential neighborhood is maintained. Accessory buildings should be allowed for home occupations only by Special Land Use permit. Regulations regarding signage, outdoor storage, off-street parking, and the permitted size of the home occupation should be included in the zoning ordinance.

## **HOUSING**

A serious concern as rural areas develop is the quality and condition of homes in the Township. To protect the Township and its residents from housing stock deterioration and related problems, the plan recommends that the zoning ordinance include regulations for all new dwellings in the Township. Such regulations should include a minimum dwelling size and/or dwelling width, approved sewer and water supplies, minimum enclosed storage area, aesthetic compatibility, and conformance to appropriate building codes. For mobile homes, the ordinance should also require that all wheels be removed, adequate anchoring be employed, skirting be properly placed, no towing mechanisms be exposed, and homes meet all H.U.D. regulations. These regulations should help ensure that all dwellings in the Township maintain the public health, safety, and welfare for existing and future Township residents.

## **CONDITIONAL REZONING**

Michigan Townships now can rezone land subject to conditions voluntarily offered by the landowner. Zoning Ordinance Provisions are recommended to help implement this "conditional rezoning" procedure. The Zoning Ordinance should be consistent with the policies and uses proposed for the area in the Township's Master Land Use Plan proposed for rezoning and uses allowed under the proposed rezoning should be compatible with other zones and uses in the surrounding area.

## **PLANNED UNIT DEVELOPMENT**

Planned unit development (PUD) regulations provide an increased level of flexibility in the overall design of residential projects in exchange for a higher quality of development. PUD ordinances often allow developers greater latitude in locating buildings on the development site, mixing various housing types and densities (single- and multi-family), and land uses (including some neighborhood commercial uses), and in some cases grant density increases over those normally allowed in the zoning ordinance.

PUDs can allow for a mixture of land uses, reduction of lot size, increase in height, or other waivers from conventional zoning regulations in exchange for some public benefit. PUDs have been used to promote environmental preservation, preserve open space, natural features, and other community goals. They enable local municipalities to negotiate with developers in order to create a compatible relationship between the built and natural environment.

Planned Unit Developments (PUDs) should integrate the natural features of the site with the proposed uses. Communities should be careful to avoid an overly cumbersome PUD process that may discourage developers from using this alternative. Flexibility is a major key to successful PUD projects. Creating incentives such as reducing minimum land area requirements for PUDs can encourage greater use of this development technique.

### **OPEN SPACE PRESERVATION DEVELOPMENTS**

The township must provide in the zoning ordinance that land zoned for residential development may be developed, at the option of the landowner, with the same number of dwelling units on a smaller portion of the land than specified in the zoning ordinance, but not more than 50% that could otherwise be developed on the entire land area, if a percentage of the land area but not less than 50% will remain perpetually in an undeveloped state by means of a conservation easement, plat dedication, restrictive covenant, or other legal means that runs with the land. After a landowner exercises this option the land may be rezoned. The zoning ordinance provisions shall be cited as the "open space preservation" provisions of the zoning ordinance.

### **DEVELOPMENT AGREEMENTS**

Development agreements could be used to restrict some future uses of property and are developed prior to the approval of a site plan. Development agreements ensure those ordinance requirements, and other mutually agreed upon items are enforced and may include the following: architectural character, maintenance agreements, and other natural and built environmental issues. Development agreements may also be associated with subdivisions and site condominium developments, which require formal recording of the agreed-upon issues within deed restrictions. Development agreements are legally enforceable by the Township.

Potential benefits might be gained using agreements in requests for conditional rezoning and in approving large development projects such as Site Condominium and Subdivision Developments. Agreements and deed restrictions may include reasonable restrictions, along

with other conditions that may be part of the approval process. Examples of topics that might be included in an agreement might include whether public services and facilities are to be provided by the developer and restricting the scope of a precise use proposed under a requested rezoning.

## SECTION 9 FUTURE LAND USE

Large expanses of relatively level agricultural land in the north and northeasterly portions of the Township characterize Marengo Township. The westerly area of the Township and land areas along water bodies, such as Rice Creek and the Kalamazoo River, range from rolling to hilly topography, with woodland and wetland areas situated in a variety of locations. The Marengo “town” area in the southeast of the township is a small historical grouping of homes. However, it is not considered to be a growth center for the Township. Much of the residential growth in Marengo has been focused near the westerly edge of the Township and in proximity to I-94. Other new residential development has occurred in scattered sites throughout the Township in a typically rural residential pattern. There are only a few industrial/commercial uses present in the Township.

Agricultural uses range from large established commercial agricultural operations to small family farms, which produce income augmented by salaries/wages earned from employment off the farm. The Township possesses only a few institutional uses including the Township Hall, five cemeteries, three churches and a school.

Future Land Use decisions for Marengo Township will be guided by this Plan's Goals and Policies. These statements rest on the desire of Township residents and officials to preserve the values that make Marengo Township a desirable place to live. Specifically, the Plan's Goals and Policies are directed at preserving the Township's rural character, low-density residential settings, and natural features. The Plan acknowledges that new development will occur, but must be planned, and not rely on the availability of public utilities to protect the water quality upon which most residents rely. This section of the Plan provides a description of proposed land uses and recommendations on the best location for various land use activities anticipated within the Township. The Plan identifies various land use areas based on the existing characteristics, goals, and management guidelines of the Township. The general strategy of the plan is to provide a low-density level of development in most of the Township. The land use areas described in this section are shown on the Future Land Use Map of the Township (**see Figure 10 - Future Land Use**). The Future Land Use Map identifies generalized land use areas and is therefore intended to be flexible in its interpretation. The map establishes the planned land use

pattern for the Township, contains only broad categories of land uses, and is not intended to show uses on individual parcels of land.

Large land areas in the Township will be primarily identified for low-density residential development having appropriate densities. The lower densities planned for these “Rural Residential” areas reflect the absence of public services, a less well-developed road system, wetlands and heavily wooded lands. Most land that would be classified “Rural Residential” lies in those parts of the Township where larger parcels already exist. The intent of this classification is to recognize the lack of public services and paved roads, and to protect the qualities of rural living enjoyed by the area's residents.

The preservation of agricultural land and natural resources is a key element of the plan. It is recommended that concentrated, higher-density development take place in select areas rather than scattered throughout the Township. This policy will reduce the cost of community services (i.e., roads, police and fire protection, street lighting, mail delivery, school bussing, and sewer and water services); preserve important agricultural lands and other natural assets; and encourage a compatible development pattern. The recommendations of this plan should be implemented through the zoning ordinance regulating the location, type, design, character, and density of land uses permitted in the Township. Site Plan Review requirements will be provided in the zoning ordinance for all non-single-family residential development.

**Preserving Natural Features** - Preservation and integration are the two general approaches to natural features. Preservation measures should be applied to those features that are so sensitive or so valued that any alteration would have a negative impact on the community in terms of aesthetics, environmental quality, and safety. In these areas, development should be either prohibited or restricted to those land uses that would have a negligible effect on the environment. Regulated wetlands are examples of lands that require preservation techniques. Wetlands generally do not require the implementation of local land use regulations to ensure their protection since state and federal laws have already been enacted.



Natural features may also be integrated into the development of a site, allowing them to remain as pristine as possible. The use of small wetlands as aesthetic features or maintaining vegetated areas for screening or visual interest is becoming more common. In this way, natural features often actually help the marketing and attractiveness of development projects. The preservation of natural features, such as wetlands, shorelines, woodlands and topography, may be accomplished through conditions of approval.

In addition, there are continuing concerns about the quality of groundwater in the future. Without access to community facilities, protecting the source of well water will be important for the long-term welfare of Township residents.

Development densities and design considerations should be of a nature that will continue the rural character of the area or permit the use of a portion of the land for preserving open space or natural features. One of the means by which this may be accomplished is by clustering or open space development.

Other land use techniques may become available for use in these areas, such as development restrictions placed by property owners through land donations or conservation easements. It may be desirable to limit the development of land adjacent to larger tracts of undeveloped land held by public entities. This type of development “buffer” can be used to preserve valuable habitat, since larger tracts of land are more meaningful as habitat areas than smaller areas.

## **AGRICULTURAL LAND**

Agricultural land is determined to be an important, irreplaceable, and irretrievable natural resource. It is the intent of the Plan that residential densities in these areas be kept low. Farming provides jobs, economic base, and vital food and fiber resources for existing and future residents of the Township, state and nation. Agricultural lands in the Township are generally of high quality as can be seen by the Agricultural Analysis map, **(Figure 11 – Agricultural Analysis)**. Much of the land in the Township is presently utilized for agriculture and it is considered important to

### **Figure 11 – Agricultural Analysis**



maintaining the integrity of the community. There are a few “hobby farms” where the practice is more for pleasure than income. It is recognized that, for the most part, the designated agricultural land in the Township should be preserved. However, in many cases, these areas coincide with the areas in the Township best suited for development.

Home sites in agricultural areas should be placed in such a manner as to not adversely affect farming operations, degrade the rural character of the area, damage natural systems, or create the need for additional Township services. The proposed density of residential development is intended to be low enough to buffer homes from adjacent agricultural uses, preserving the rural atmosphere, protect ground and surface waters from septic systems, preserve community character, and the environment of the Township, and provide room for the replacement of septic systems.

The primary goal for this land use area will be to preserve the Township's existing agricultural areas and natural resources while allowing for limited residential development. These areas are designated for agricultural use because they contain parcels of significant size, have a consistent history of active agricultural production and the documented existence of soils most suitable to agricultural production. The proposed best alternative is to establish an “exclusive” agricultural zoning district. This is considered appropriate to preserve agricultural land while allowing residential use on a limited basis. Land uses related to the rural and agricultural character of the Township such as horse stables, home occupations, and roadside stands should be allowed in this area.

Large-scale residential developments or multiple parcel splits in agricultural areas should not be permitted. One consideration could be to limit residential parcel splits and non-farm residential development by allowing land divisions on a sliding scale based on the size of the parcel. Another method could limit the use of private streets in these areas. However, in agricultural areas, single-family dwellings should only be allowed if the land where they are to be located is poorly suited for agricultural production. Conditions such as non-prime soils, slopes greater than 12%, high groundwater table, floodplain, or wetlands etc., should be used to make this determination. In addition, the resulting parcel size should not exceed two (2) acres unless that portion greater than two acres contains no prime agricultural soils, and there is satisfactory proof that the water supply and septic systems will meet County Health Department approval.

In addition, preservation techniques including Purchase of Development Rights (PDR) should be encouraged. Publicly funded programs, through Calhoun County or even the Township itself can purchase development rights that are intended to accomplish the goal of preserving valuable open space. Purchase of Development Rights is a legal agreement in which the landowner retains ownership of property but conveys certain specifically identified rights to a public body. Essentially, under provisions of a PDR, development and other activities that have the potential to diminish the integrity of the land are limited or prohibited. In addition to agricultural land, PDR's provide an effective tool for protecting environmentally sensitive lands such as undeveloped shorelines and wetlands.

## **RESIDENTIAL DEVELOPMENT**

Housing within Marengo Township is divided into two groups: Low Density and Moderate Density Single-Family. New residential development is occurring on large lots with two to three and perhaps five acres of land. This type of development will present challenges to the Township in the future to provide services for waste collection, school busing, mail deliveries, sewer and water distribution, and emergency services.

Residential development patterns should make efficient use of land, public services, and private improvements, and should provide a variety of affordable housing choices. Growing communities require housing stock with a variety of densities, prices, and locations. The density and location of residential development heavily influences housing costs and the types and levels of services required. This Plan encourages different residential densities to address these considerations and to promote a diversity of housing choices. Housing should be located primarily in areas already developed for residential purposes and limited in undeveloped areas. Sustainable low-density residential development in appropriate areas of the Township contributes to the diversity of housing choices, protects environmental quality, and minimizes conflicts between incompatible land uses. Compatible non-residential uses include day-care facilities, schools, churches, and certain limited home occupations. In rural areas, low densities should be sustained, maintaining rural character, allowing agricultural activities and open space.

Growth projections indicate that approximately 69 home sites could be expected in the next ten years. Under current conditions, given an average lot size of three acres (and an additional acre removed for easements, rights-of-way and land that may be difficult to develop such as wetlands taken into consideration), the equivalent land required for each home site could be expected to

be 4 acres. This would produce a demand for approximately 276 acres of additional land for residential development. This land should be primarily within existing residential areas.

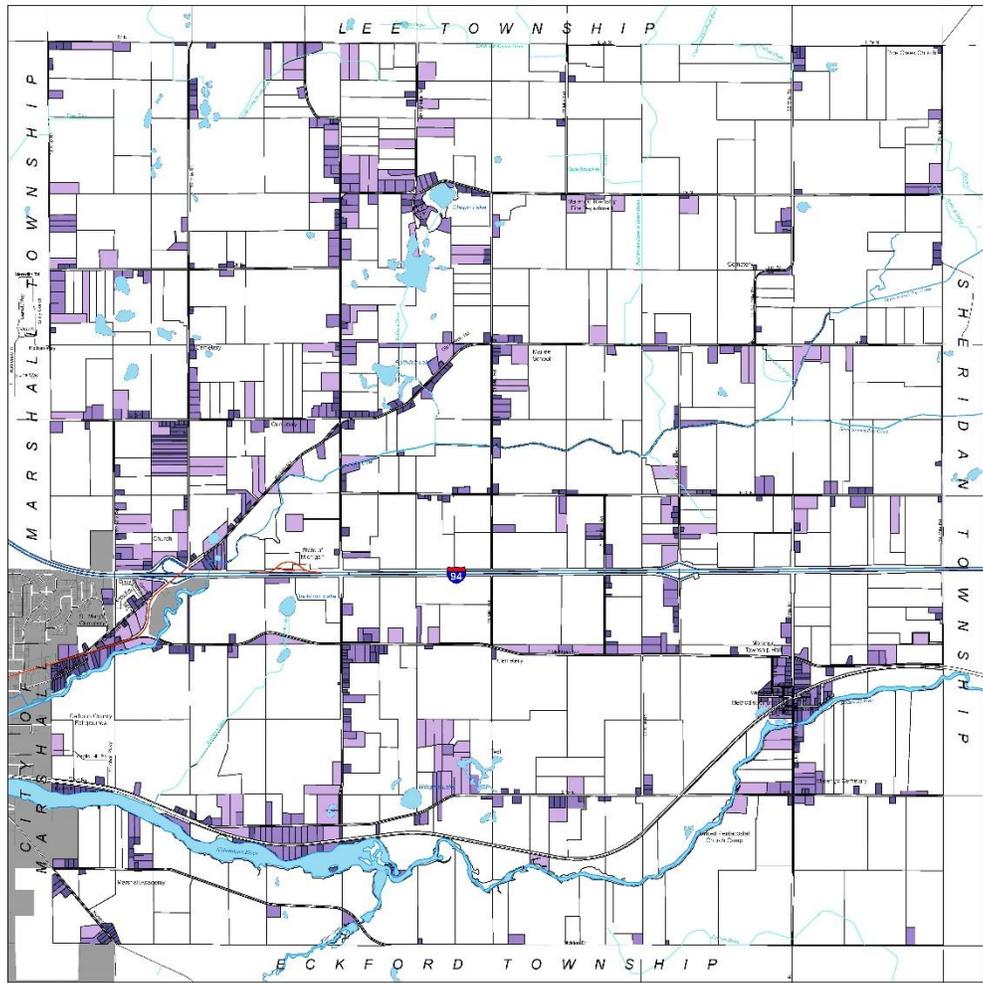
Because of the rural character of the Township, appropriate locations should be set aside for higher intensity uses. There are very few manufactured homes in the Township and the demand for this type of housing may increase as growth in the Marshall area continues. Therefore, the Township should discourage mobile homes on individual parcels in residential areas. Instead, the Township should provide for manufactured housing to locate in manufactured housing communities approved by the Michigan Manufactured Housing Commission.

A limited amount of moderately dense residential development has occurred in primarily two areas of the Township: (1) within the unincorporated area of Marengo, and (2) adjacent to B Drive N and 20 Mile Road in the southwestern part of the Township. It is conceivable that some public facilities such as sanitary sewer improvements may be necessary in the future in southwestern part of the Township to protect water quality.

For purposes of the plan, future residential development is classified into three different and unique residential areas anticipated for the Township. These areas, Low Density, Rural Residential, and Moderate Density. These designations will meet a diverse range of residential needs and will provide more than an adequate amount of land for the projected population in the Township. Generally, housing sizes of less than 1,100 square feet are considered incompatible with the existing housing stock of the Township. Therefore, a minimum size of 1,100 square feet is recommended for all housing in the Township. Manufactured homes smaller than that minimum may be in manufactured housing communities designated for that purpose. There is ample capacity for manufactured housing communities in surrounding communities.

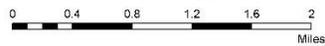
It is expected that most of the future residential growth in the Township will be lower density in character. Parcel acreages in the Township (**shown in Figure 12 – Parcel Acreages**) show the character of residential development in the Township. An examination of this information indicates that residential development is scattered but primarily occurring in the west half of the Township. As such, continued residential development would be consistent with the developing character in these areas.

Figure 12 - Parcel Acreages



# Marengo Township

## Calhoun County, Michigan



### Parcel Sizes

#### In Acres

- Less than 2 Acres
- Between 2 and 5 Acres
- Between 5 and 10 Acres
- Greater than 10 Acres



Source: Calhoun County GIS & Marengo Township, 2014

Moderately sized single-family residential lots are planned where public services such as public water and sanitary sewer improvements are most likely. Low Density Residential areas are less compact featuring single-family housing on moderately sized lots where private water supplies and on-site sewage treatment systems will serve adequately. Planning concepts regarding future growth in these residential classifications in the Township are discussed below.

**Private streets in LDR** - In the Low-Density Residential areas, private streets should be limited to serving ten parcels or less. Residential developments serving more than ten parcels or units would need to have the necessary streets approved by the County Road Department as public streets. This should have the effect of reducing the density of development maintaining the character of these areas. Furthermore, private streets should be prohibited within the 500-foot buffer surrounding surface water features.

## **RURAL RESIDENTIAL**

It is the intent of this plan to allow scattered homes on large parcels of land in locations that do not affect areas of environmental concern, unique farmland or diminish forest and woodlands. Home sites should not degrade the rural character of the area, damage natural systems, or create the need for additional Township services. The primary goal for the Rural Residential areas will be to preserve the Township's natural resources and agricultural areas while allowing for limited residential development. Rural Residential areas typically contain the largest residential parcel sizes and are far less developed than the rest of the Township. These environmentally sensitive areas encompass large portions of the Township containing rural, unique agricultural land, forest, open spaces, and areas of environmental concern. Residential development is sparse and parcel sizes ranging from five acres or more are prevalent. Much of the land classified Rural Residential areas is generally well served by the roadway system. Roads are mostly paved, and no additional Township services are planned. The principal land uses in this area are residential dwellings and farming, but a great deal of this land is vacant.

Rural Residential areas are intended to provide for the compatible coexistence of low-density residential uses, agricultural uses, and valuable natural resources. Rural Residential zoning simply increases the minimum lot size required in residential zoning districts. In Marengo Township, the definition of a Rural Residential seems to be at about 5 acres. The principal purpose of most Rural Residential zones is to provide some land in the community for a permanent rural residential lifestyle. This lifestyle is one of a full range of lifestyles offered in a

community balanced with other lifestyles necessary for the full economic functioning of the locality.

**Sliding Scale Zoning** - Sliding scale zoning limits the number of times that a parent parcel (a parcel existing on the date of ordinance adoption) can be split, based on its size, i.e., the larger the parcel the more splits that may occur, up to a maximum number established.

Sliding scale zoning can be useful in areas where there are significant development pressures and land speculation, and in areas where a wide range of parcel sizes exist, and non-farm residential development has already begun to occur. Since this method does permit some use of land for development, it allows communities to more effectively avoid a claim that land has been "taken" without compensation.

**Maximum lot sizes** - Maximum lot sizes can be used to encourage the location of development on less productive farmland or in areas where development is more concentrated to direct growth onto already fragmented land.

**Clustering/Open Space Regulations** - This technique provides for the clustering of housing units (within a residential development) on lots smaller than those normally allowed under existing zoning, usually with the provision that the land that is saved be set aside permanently as open space. This technique encourages grouping homes in those areas of a development site that are best suited for development.

Cluster subdivisions generally conform to a zoning districts' "gross density" requirements (measured by the number of housing units per acre relative to the total area of the site), but may increase the site's "net density" (measured by the number of housing units per acre relative to the buildable area of the site), by reducing lot sizes and concentrating development on a smaller portion of the available site.

It is important to recognize that clustering or open space development does not necessarily increase the development density permitted by the individual zoning district, unless incentives are provided to do so. It allows only the density of development that would be permitted under conventional zoning regulations but allows that development to be placed on a smaller portion of a site. Density bonuses may be granted in order to encourage this type of development, but

are not necessarily needed since clustering can reduce a developer's construction costs for road paving, grading, etc. Often large parts of a site are permanently protected open space, protected by a restoration covenant or, in some instances, deeded to a non-profit land trust or the Township.

In Michigan, Act No. 110 of the Public Acts of 2006, known as the “Michigan Zoning Enabling Act”, requires this technique. The Act states that the Township must provide in its zoning ordinance that land zoned for residential development may be developed, at the option of the landowner, with the same number of dwelling units on a smaller portion of the land than specified in the zoning ordinance, but not more than 50%, that could otherwise be developed, as determined by the local unit of government, if certain conditions apply.

### **LOW DENSITY RESIDENTIAL**

Growth in this area is primarily influenced by the demand for home sites in parts of the township historically experiencing residential development. The intent is to maintain a rural atmosphere and to encourage residential development in areas of the Township where developed densities are already greater and where public services could be provided more affordably in the future. Single-family homes are the primary intended uses. Because housing stock is important to the community, these areas must also be protected from higher density, incompatible non-residential development through appropriate zoning standards. However, land uses related to the rural and agricultural character of the Township such as horse stables, campgrounds, and roadside stands should be allowed in this area under special conditions.

Lot size and lot dimension standards in the zoning ordinance should be designed to minimize the conversion of land to residential uses. For example, excessive lot depth should not be allowed, as this type of development pattern creates large areas of land that are not suitable for agricultural production or available for future development. Densities should be low enough to buffer homes from adjacent agricultural uses, reduce the likelihood of the need for public sewer and water, and preserve the rural atmosphere, community character, and environment of the Township. The proposed density of development is intended to range from 1 to 2 acres per unit or more. At that desired density, the typical individual parcel should have a lot width of between 150 and 200 feet. Developed densities in this range will protect ground and surface waters from septic system drain fields and provide room for the replacement of septic systems. Design

guidelines and considerations for sensitive environmental areas should be incorporated into the regulations for this area.

While lot sizes of one acre are adequate to protect ground and surface waters there may be good reasons for establishing larger lot sizes. Densities should be compatible with those already established and in neighboring Townships. In some places this would be compatible with the 2 to 3-acre lot size.

Innovative approaches to development are recommended in this zoning district. These might include limiting the extent of private streets and strong environmental regulations, and clustering of residential developments. The clustering option would allow building sites to meet the allowed density on a smaller lot size reserving the balance of the development in open space.

Direct access to major thoroughfares by individual home sites should be minimized using subdivision and site condominium regulations or PUD provisions. Private streets can maximize the development potential of section interiors. However, private streets should be limited in number, restricted to serving only a few parcels, meet certain construction standards, have an established maximum length with turnarounds and ensure long-term maintenance.

Lot sizes could be reduced for developers willing to consider certain conservation or preservation development techniques. These techniques emphasize the philosophy of open space as the central feature of the development and not as an afterthought. Techniques might include, clustering with the preservation of wetlands, steep slopes, flood ways, drainage ways, wooded areas, and other environmentally unique or sensitive portions of the site.

The clustering option would allow building sites to meet the allowed density on a smaller lot size reserving the balance of the development in open space. Site planning considerations must begin with the preservation of natural features and the identification of lot sizes with lot arrangements being the last step in the process. Expanding upon the minimum described preservation areas to create usable open space amenities for residents further embellish the open space subdivision technique. Developers willing to consider these important site-planning features, site amenities and an extra measure of cooperation could be entitled a bonus beyond that customarily allowed in the low-density residential areas of the Township. Therefore, to

maximize open space, the Township may be willing to consider reducing the required individual lot sizes without increasing density.

It is also a goal of this plan to discourage development along road frontages of the Township's section line roads. This type of development unnecessarily "landlocks" existing agricultural land, destroys rural character, and will eventually create large areas of land with no access to public roads. This Plan encourages the use of new roads that are well designed and safe, serving back-lot areas where the homes may be clustered in existing woodlot or other nonagricultural areas. Dead ends should be kept to a minimum by requiring stub lots that can eventually be used to connect with other new streets.

If public services such as sanitary sewer and water are eventually provided, density should be based on considerations such as public service capacities, environmental factors, adjacent land use, and overall design.

### **MODERATE DENSITY RESIDENTIAL**

Moderate Density Residential land use areas are concentrated in the "Marengo Town Area" and in the southwest part of the Township along B Drive N and 20 Mile Road. This classification is intended primarily to protect existing development and ensure that it is compatible with new development. In large part, this classification recognizes development that has already occurred. Development density is recommended at an average of one acre per housing unit.

It is expected that much of the western sections of the Township will experience significant amounts of higher-density residential development. It is recommended that this type of development be in areas that can most logically, economically and easily be served by public water and sanitary sewers. However, where these areas are adjacent to surface water, care should be taken not to increase densities. It is recommended that residential development along the Township streams and wetland areas be located at least 100 feet from the water's edge, high water mark or floodplain.

It is likely that much of the residential development in this classification will occur along existing roadways. Although development of this nature is typical of rural areas, it presents some practical problems. The number of driveways along these roadways can become a traffic issue, particularly in areas where zoning allows relatively narrow lot widths. While individually these

driveways do not generate excessive amounts of traffic, taken together on a busy roadway they can present problems with additional turning movements, especially where vehicle speeds are high.

An inefficient use of land also occurs when homes are placed near the front property line on long narrow lots. Some areas of the Township are divided into relatively deep lots, with only the frontage being used by individual homes. This type of development tends to leave sizeable portions of land cut off from road access and essentially unusable.

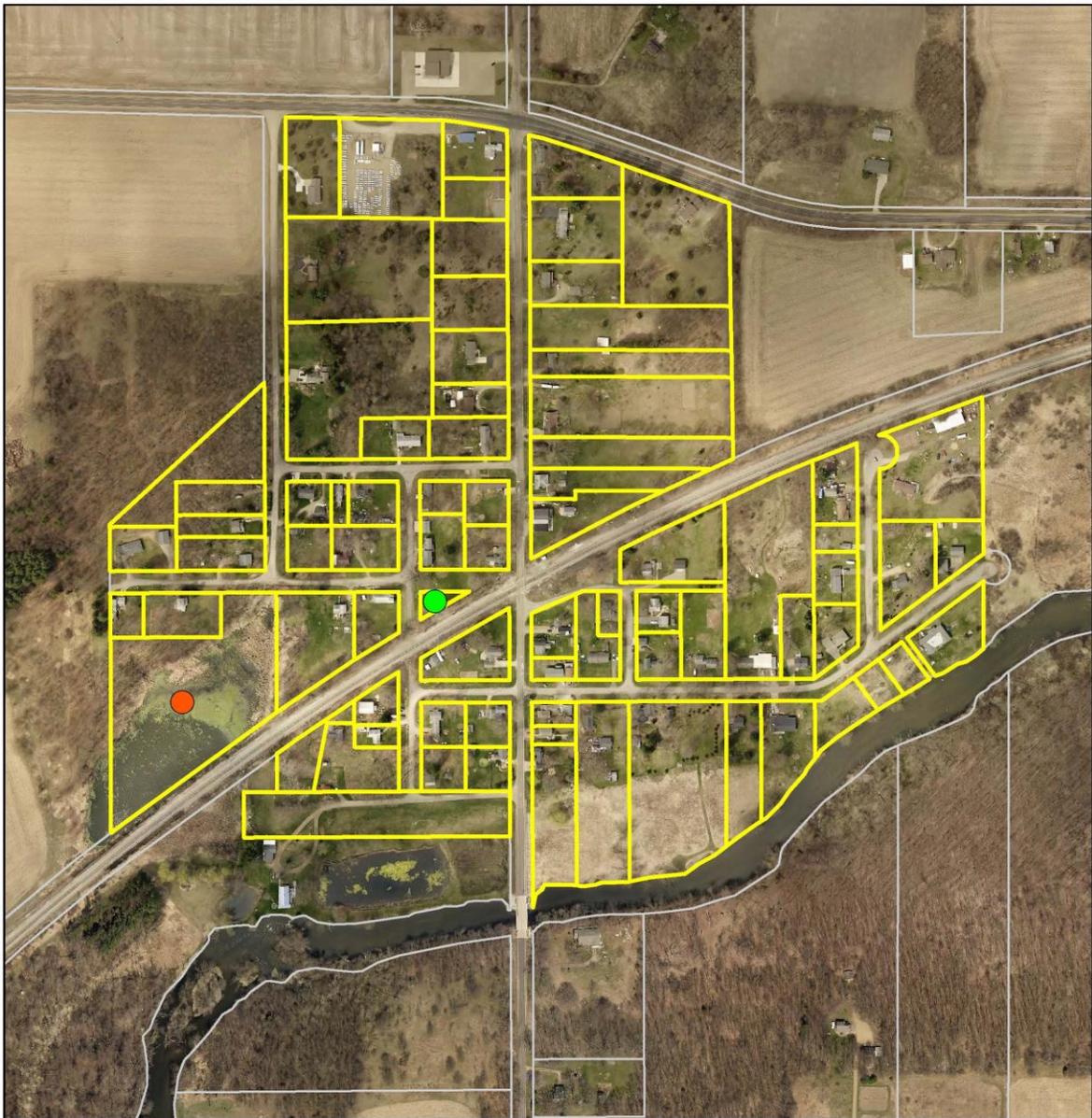
While this may not be an immediate problem, future owners may look for opportunities to use the back portions of these lots for further development and seek variances or other approvals from the Township. While the Land Division Act limits the depth of lots created without the filing of a plat (through lot width to depth ratio requirements), access to interior properties will continue to be an important consideration in reviewing subdivision development proposals. Although the Land Division Act requires a 4:1 ratio, the Township may elect to enforce stricter ratios.

One alternative, if the interior of the property is also being developed, is to require as many lots as possible to gain access from the interior streets. Rather than placing lots along the roadway, the interior street should be placed on lot depth into the property and the homes should back up to the section line street. Additional landscaping or fencing may be provided for the back-yard areas of these homes.

These areas should be developed with neighborhood characteristics, including paved roads, sidewalks (where appropriate), adequate lighting, well-placed open spaces for recreation, and a sensitivity towards existing natural features (woods, shoreline, etc.). Density ranges will require building sites of between one-half acre and one acre. Lots should have minimum widths of approximately 100 to 150 feet.

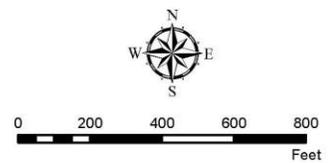
There are two primary areas in the Township that have concentrated development sufficiently dense to warrant public improvements. One is directly adjacent and east of the City of Marshall and the other is the original platted, but unincorporated village of Marengo. The original platted "Marengo Town Area" contains approximately 80 parcels averaging approximately 1 acre in size. (See **Figure 13 Marengo Village Area**) It is recommended however, that medium density residential development

Figure 13 Marengo Town area



**Marengo Village Area**

-  Village Parcel (80)
  -  Smallest (0.137 acres)
  -  Largest (5.073 acres)
- Average Parcel Size 0.946 Acres



is needed or desired in the Township in the future, it should be located near the western border of the township.

### **HIGH DENSITY RESIDENTIAL**

High-Density residential uses are currently nonexistent in the Township and most likely not an essential component of future land uses. It is recommended that at this time, designating land areas for high-density residential development is unnecessary.

### **MANUFACTURED HOUSING COMMUNITY RESIDENTIAL**

Mobile home parks may be appropriate in this area if properly designed to be compatible with adjacent residential uses. It is recommended that a full range of public services serve these uses in the future. Manufactured Housing Communities must be developed meeting the Mobile Home Commission regulations but may accommodate modular home construction and condominium-type ownership. However, Manufactured Housing Communities continue to provide a suitable and affordable place for the smallest and typically oldest mobile homes that may not meet the minimum size and square-footage requirements of traditional, single-family residential areas.

Presently the only area in the Township that has concentrated development sufficiently dense to warrant public improvements is directly adjacent to the City of Marshall. This area of the Township is the most likely to be served by public water and sanitary sewer facilities in the future, and, consequently, will be able to accommodate concentrated urban type development. Therefore, it is recommended that if such development is needed or desired in the Township in the future it should be located there.

### **COMMERCIAL DEVELOPMENT**

The intent of this plan is to encourage this historic mixture of land uses, while providing for growth if market demands warrant it, but to limit the extent of commercial development. The proximity of Marshall to Marengo Township provides virtually all the necessary commercial services.

Commercial businesses provide necessary services to Township residents and the motoring public. However, they may increase demand for public services, create land use conflicts and traffic problems. There is a broad spectrum of commercial uses. Some have a greater potential

to affect residential areas. Commercial development requires a variety of services and can result in land use changes, increased traffic, parking problems, the need for water and sanitary sewer services and street lighting.

Commercial businesses also have the potential of creating inefficient, unattractive, and dangerous strip development, especially along major roadways. Because of these factors, commercial development should be limited to select areas of the Township. Consolidation of commercial activities is desirable for many reasons. First, it allows customers to obtain commercial services conveniently from a variety of establishments with a trip to one area. Secondly, by concentrating activities associated with commercial operations, such as parking requirements, traffic flow, lighting and public service needs, the potential for creating conflicts with other land uses will be minimized. Finally, necessary public services, such as fire protection, police protection, and water and sewer connections can be provided to the commercial establishments more economically and efficiently if they are in one area. Therefore, it is recommended that most commercial facilities, intended to serve local needs, should be located primarily along existing commercial corridors.

Furthermore, the existence of commercial development attracts additional commercial activities that may be incompatible with adjacent residential areas. By consolidating commercial development in select areas, public services can be provided more efficiently, and land use conflicts can be minimized. Careful site planning should be conducted in these areas to protect residential homes from non-residential uses. This is particularly true when considering Marijuana Facilities, specifically Secure Transporters and Safety Compliance facilities since the Township has determined that retail facilities are not compatible with the proposed commercial development areas.

Presently, commercial development is limited and there are no primary concentrations of commercial land uses in the Township. Commercial areas that might be designated in the future should be along major thoroughfares or adjacent to existing, historically defined areas. Commercially designated areas should maintain historical businesses and serve existing and anticipated residential areas. With the eventual provision of necessary services, neighborhood centers can be created. They should be designed to blend with community character through a combination of site design, buffering, lighting, and sign regulations. Approval of all commercial businesses should depend on the nature and intensity of proposals received by the Township.

## **INDUSTRIAL DEVELOPMENT**

For the most part, the Township is not well suited for industrial development. Except for the existing Tool and Die Shop on Michigan Avenue, no land in the Township is currently utilized for industrial purposes, and there has not been a demand for industrial development. Public sanitary sewer, water, and other services should serve such developments, and, except for the three 425 areas, there are currently no areas in the Township served by such services.

However, the potential in the future for less intensive industrial development may be an issue because of the I-94 expressway, bisecting the entire length of the Township, and two interchanges, which could provide an excellent means of transportation for light industrial activities. Light industrial activity being characterized by minimal noise and odor discharge and low traffic volumes. Negative factors, such as the lack of available public services, limit the potential for heavy industrial development. Because of the residential character of the Township and the potential harm heavy industrial development could have on the Rice Creek Watershed, heavy industrial development would have a decidedly adverse impact on the character of the Township and on existing land uses. Heavy industrial development can have far-reaching impacts because of the potential for the creation of nuisance conditions and because of the environmental damage it might generate. Adverse impacts to the community or its natural resources should not be permitted.

## **SECTION 10**

### **ZONING PLAN**

Zoning Plan – It is the intention of this Plan that the areas planned:

- Agricultural will correspond to the existing AA Agricultural and AB Agricultural Business Zoning Districts
- Rural Residential will be represented by a new zoning district
- Low Density Residential will correspond to the existing RA Low Density Residential Zoning District
- Moderate Density Residential will correspond to the existing RB Medium Density Residential Zoning District
- Multiple Family Residential Zoning District which will be retained in the zoning ordinance although not identified in the Master Plan
- Manufactured Housing Community Residential will correspond to the existing MH Manufactured Home Park Zoning District
- Commercial Development will correspond to the existing HS Highway Service Commercial Zoning District
- Light Industrial will correspond to the existing LI Light Industrial Zoning District
- Surface Water Overlay will correspond to the existing WO Waterfront Overlay Zoning District.
- OC Open Space Waterbody Conservation Zoning District will remain
- OSB Open Space Preservation Overlay Zoning District will remain
- Marijuana Facilities will be represented by a new Overlay Zoning District

The proposed Rural Residential areas will require that a new zoning district be created presumably named RR Rural Residential Zoning District. Manufactured Housing Communities will be allowed in the MH Manufactured Home Park Zoning District. Marijuana Facilities, namely grow operations and processors, will be allowed in the new Marijuana Facilities Overlay Zoning District.

**Future Land Use Categories** - Marengo Township has been divided into Future Land Use categories intended to guide future development decisions, which include zoning. As a guide,

the Future Land Use categories are not to be viewed by themselves as complete recommendations. It is necessary to also review the Township's vision, goals and objectives and Future Land Use Map to gain a complete understanding of the expectations for future development. The proposed zoning district categories are described on the following pages and include:

- |                                 |                            |
|---------------------------------|----------------------------|
| 1. Agricultural                 | 40 Acre minimum            |
| 2. Rural Residential            | 5 Acre minimum             |
| 3. Low Density Residential      | 2-3 Acre minimum           |
| 4. Moderate Density Residential | 30,000 Square Feet minimum |
| 5. Commercial                   | 1 Acre minimum             |
| 6. Light Industrial             | 1 Acre minimum             |

The intent of the new Rural Residential category is to provide areas for larger lot residential development to meet the desires of the residents of the township as expressed through the Community Attitude Survey. Township residents who responded to the survey preferred allowing larger lots as well as preserving natural features. A preponderance of small lots could cause the township to lose its rural character. Larger lot zoning is the desired method of preserving the rural character of neighborhoods, reducing the danger of fire hazards, protecting natural features and open space, and avoiding pollution from improper sewage disposal.

The majority of those who returned surveys agreed that lots should be no less than two or three acres in size. The Planning Commission studied many factors in determining the appropriate size of parcel for the Residential categories. Reasons for increasing the minimum lot size from 1 acre to 2 or 3 acres include:

- (1) Areas are near productive agricultural lands
- (2) The development trend is toward dwellings located on larger lots
- (3) The road system in the area is limited
- (4) Public water systems are not readily available to serve the area
- (5) Public sewer systems are not available to serve the area
- (6) The capacity of existing drainage courses to handle runoff from a large-scale development is limited

(7) Waterways, woodlands, wetlands and other natural resources or wildlife corridors are present

Density-control mechanisms help to prevent the overcrowding of land, preserve open space, lessen congestion on public roads and facilitate the eventual provision of municipal services, which are all legitimate governmental interests. Larger lots are particularly appropriate where: (1) the property can be used as farmland or has significant natural features; or (2) the township's zoning restrictions are a reasonable way to avoid overcrowding and infrastructure problems.

A variety of factors were studied to determine the appropriate parcel size for the Residential zoned areas of the Township. Among them:

1. Inventory of current lot sizes (particularly of recently developed residences) to identify discernable trends toward large lot development in certain areas.
2. Identify areas where low-density requirements are necessary to protect existing, productive farmland. Larger lot zoning can be beneficial not only in preserving valuable farmlands, but also to isolate residential uses from the noise, dust, and over-spray which can result from farming.
3. Concentrate on the need for low-density development to promote traffic safety, preserve groundwater, and prevent erosion. It is important to focus on specific factors such as the existing quality of roads serving rural areas, poor sight distances because of steep grades or sharp curves, and areas where porous soils, grades, and high-water table conditions combine to pose a pollution risk from the use of private septic systems.
4. Attempt to provide for relatively higher densities in some areas (where conditions are appropriate) and low densities in others to allow a range of development opportunities.

Therefore, larger minimum lot sizes are proposed for substantial areas within the Township where public utilities are not available; where smaller land divisions have not already occurred; where larger lots are the predominant residential land use type; or where other factors, such as soil or road conditions, dictate that somewhat larger lot sizes would serve the public health, safety and welfare.

Much of the township has been planned for the Residential categories. These classifications anticipate lot sizes of slightly less than one acre in some areas up to parcels of five acres in other areas, with varying lot widths. The 2 to 3 acres minimum is currently anticipated as more appropriate for a large portion of Township lands. Useable amenities, such as trails and connecting pathways should be included within residential subdivision design.

### **LOW DENSITY RESIDENTIAL – 2 or 3 acres**

Somewhat smaller lot sizes should be retained in areas where utilities could potentially be made available, and in areas where smaller lot development has already occurred. These areas have been identified as suitable for continuation of spacing that consists of lots of two or three acres. The intent of this category is to provide areas for moderately sized residential lots comparable with existing densities in areas of the Township already significantly developed. In most of these areas there are still ample acres of vacant land available for infill development. These consolidated areas provide smaller lots and higher densities for those that desire more affordable home sites. Cluster housing that is developed with the intent of protecting large areas of natural features and agricultural land may be developed with smaller lot sizes. Useable amenities, such as pathways, passive open space and recreational areas, should be included within an open space residential design.

Since small lot zoning is the desired method in these areas of the Township, this category anticipates lot sizes not more than one (1) acre with lot widths of not less than 200 feet.

### **MODERATE DENSITY RESIDENTIAL – 30,000 square feet (0.7 acre)**

Moderate Density Residential is generally limited to areas with historically small lots primarily in the Marengo Town area in the east portion of the township. Typical moderate density residential development includes small lot single-family dwellings and are intended to allow for densities not exceeding 1 to 2 units per acre.

Development design should be such that it fosters unity and social and recreational opportunities. Developments should include useable open space, such as playground areas, a community square, and recreational trails and sidewalks that connect to existing and planned adjacent uses (commercial and residential). Sensitive natural areas otherwise available for development (i.e. not in a floodplain and not a wetland regulated by the State) should be

preserved through designs which incorporate those features as attractive elements of the development.

## **COMMERCIAL**

This land use category is intended to accommodate a wide range of traditional commercial, retail, office and other general commercial uses that cater to the larger Marengo Township community and travelers along I-94. Uses within this category rely partially on freeway traffic, such as those uses allowed within the Highway Service (425 Plan) land use category. This land use category is intended to serve as a focal point for highway services and activity. For instance, a highway commercial area may have such uses as gas stations, convenience stores, drugstores, and smaller offices/services (doctor's office, insurance, dentist, etc.), barber shops, cafes, small grocery stores, and other businesses compatible with rural areas, involving lower traffic volumes. Marijuana Secure Transporter Facilities and Safety Compliance Facilities are included in the types of uses allowed in the commercial zoning district although perhaps as Special Land Uses. As such, commercial development should be located within and adjacent to transportation corridors in the Township.

However, Commercial areas are often going to be located at the cross section of large roads and should be allowed in a manner that is consistent with the township's rural character. This includes consideration of:

- Shared driveways and parking areas.
- Consistent site elements, such as landscaping and lighting.
- Roadway improvements, including turning lanes, deceleration lanes and others.
- Signs that are consistent with the rural character of the township.

Development in commercial areas must also be sensitive to existing and planned residential development in adjacent areas. Consideration must be given to the locations of buildings and parking areas, lighting, noise and other potential nuisances, and location of activity areas, such as loading and trash collection.

Generous setbacks, sign limitations, reduced lighting levels, and landscaping are necessary to ensure that these uses fit within the neighborhood in which they are located. Driveways will be located as far from intersections as possible to minimize traffic conflicts, generally not less than

150 feet from the intersection. In most situations a single driveway will be permitted unless a professional traffic study determines that a second drive is needed to accommodate higher volumes of traffic or to facilitate the safe, effective flow of traffic.

It is intended that these areas be compatible with the City of Marshall Highway Commercial zoning district which is "...designated on the western city limits near the interchange. Uses are intended to be primarily auto-oriented, including drive-through facilities, automotive service, large scale retail, restaurants, hotels, and other intensive uses not well suited along Main Street."

Effective access management, streetscape design, building design and pedestrian connections should be included in the review of development proposals. Building/tenant spaces would be wide ranging and not limited by square feet. Generally, parcel sizes should be no less than 1 acre. Development should be accomplished with consideration of corridor management techniques recommended in the Management Recommendation section of this Plan. Consideration must be given to the locations of buildings and parking areas, signage, lighting, noise and other potential nuisances, and location of activity areas, such as loading and trash collection.

### **LIGHT INDUSTRIAL**

Light industrial areas could include non-retail commercial as the predominant use but would also allow limited industrial uses as well as office businesses. It is the intent of this area to accommodate industrial establishments that are generally incompatible with pedestrian movement and which are not engaged primarily in retail sales or providing services to the travelling public.

Light industrial development is planned for areas which are already served or could potentially be served by public utilities. This area should provide for a mix of industrial uses including utilities, trucking terminals, warehousing, large equipment sales and servicing, etc. Uses intended for this category include facilities that do not rely on heavy traffic volumes and the accessibility and convenience associated with being located adjacent to a freeway. Low key industrial uses with limited negative impacts are encouraged in this area. Adverse effects caused by these proposed uses should be mitigated by requiring generous setbacks, screening and buffering, and by carefully regulating land uses that may create noise, odors, dust, smoke or other adverse effects for neighboring properties.

Appropriate screening and buffering installations are anticipated between industrial uses and surrounding properties. Industrial uses are expected to be low key uses with limited negative impacts of a type that would benefit from proximity to the interchange such as light manufacturing, warehouses and research and development. Site development standards would need to ensure that the buildings and other site improvements such as lighting and truck movements have minimal impact on adjacent uses. New zoning regulations may need to be prepared and put into place along with a rezoning of property to accomplish this proposed zoned area.

Typical uses could include distribution and warehousing, sales or service of trucks, boats, trailers, recreational vehicles, farm implement sales and service, outside storage and sales, transport and trucking services, contractor's yards, veterinary hospitals and kennels, heavy equipment sales and service, landscapers, self-service storage facilities, sign fabricators, assembly of finished parts, etc. and similar non-retail commercial and light industrial uses. Marijuana Grow and Processing Facilities are included in the types of uses allowed in the light industrial zoning district although most likely as Special Land Uses.

Lot sizes should be a minimum of one acre with a minimum lot width of 100 feet. Generous side and rear yard setbacks and buffering should be required when adjacent to a residential use. Additional site design issues should also be determined by appropriate site plan review.

### **ENVIRONMENTALLY SENSITIVE**

The Environmentally Sensitive category is intended to recognize areas of the Township that contain natural features such as lakes, streams and wetlands. Large areas of Environmentally Sensitive land are located within the township and are primarily linear in shape following the banks of Rice Creek and the Kalamazoo River that transverse the township.

Development that does occur should be designed to minimize negative impacts upon the environment and natural features. Land uses within these areas should emphasize low density residential uses, including the use of open space or cluster development to offer protection of environmentally sensitive features.

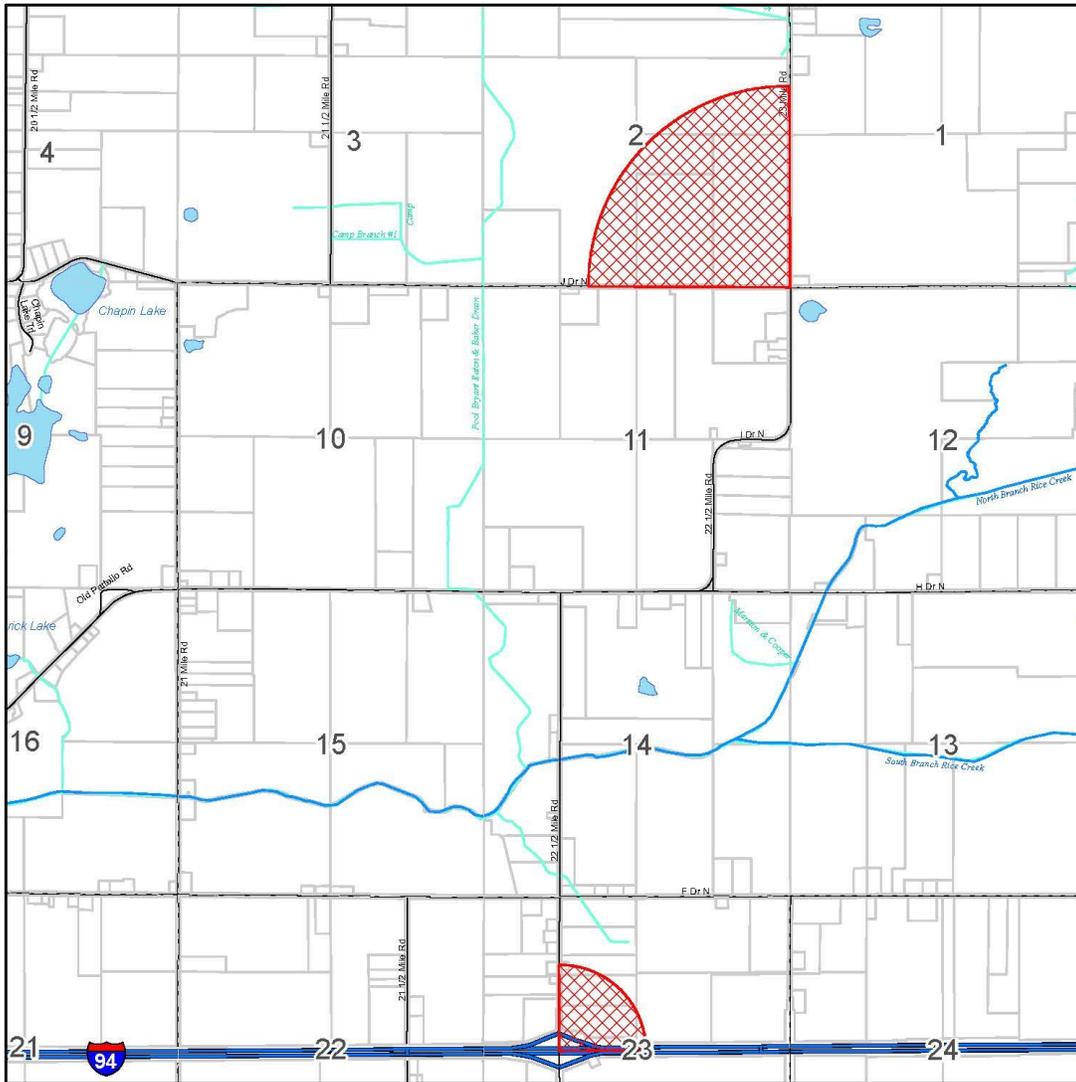
While protection of these features should be a priority, opportunity exists to utilize these areas for recreational purposes such as natural trails and environmental education for area schools and the public. It is the intent of this land use category to allow for reasonable development that preserves the character and environmental quality of these environmentally sensitive areas. Techniques to preserve their quality, such as utilization of natural vegetation buffer strips at the edge of waterbodies and utilization of small-scale water control measures for run-off from impermeable surfaces such as roofs and pavement, should be utilized in development proposals.

### **MARIJUANA FACILITIES OVERLAY**

The Township has adopted an Ordinance allowing Marijuana facilities. the establishment of this overlay district is to satisfy the requirements of the Michigan Marijuana Facilities Licensing Act, Public Act 281 of 2016, which authorizes the regulation of Commercial Medical Marijuana facilities, and Initiated Law 1 of 2018, which authorizes the Regulation and Taxation of Marijuana Facilities, by requiring compliance with requirements, in order to maintain the public health, safety and welfare of the Township. This new overlay zoning districts is intended to accommodate the new facilities in areas deemed most appropriate, particularly for Marijuana grow facilities and processors. In Section 2, there exists a large underutilized agricultural building that is adoptable to a Marijuana grow facility and processor. It has been determined that continued utilization of this facility is in the best interest of the Township. In Section 24, there is an area directly adjacent to the commercially zoned area at exit 115 on 22 ½ Mile Road and I-94. This commercially zoned area is already intended to support interstate travelers and township residents. This is also an area of the Township believed to be appropriate for Marijuana Facilities. Further, it has been determined that consolidating Marijuana facilities in areas that are deemed acceptable is also in the best interests of the township. Therefore, the overlay district concept has been determined to be the best scenario for accommodating the desired Marijuana grow and processor facilities. See **Figure 14 Marijuana Facilities Overlay**.

**Zoning Strategy** - As with any Master Plan, the planned areas should be implemented over time. A zoning strategy will be used to integrate future zoned land as needs and time dictate. The purpose of this strategy is two-fold. First, the intent is to ensure that adequate zoning exists for commercial uses that are necessary both for the greater area and as related to the traveling public. At the same time, care must be taken to ensure that an oversupply of land is not made

Figure 14 Marijuana Facilities Overlay



## Marengo Township Calhoun County, MI

### Marijuana Overlay Areas

 Marijuana Overlay District

  
 Scales:  
 Map - 1" = 2,500'  
 Inset - 1" = 18,500'



Sources: Marengo Township, Calhoun County GIS, 2019

available to avoid haphazard development, marginal uses with high turnover rates, and land uses that do not rise to the level of quality desired by the stated goals of this Plan.

Second, the zoning strategy is intended to avoid development that does not permit the use of proper access management techniques, such as access points, shared driveways, shared parking lots, and other techniques. It is also intended to improve the quality of development through consistent application of landscaping requirements.

Before new land areas are rezoned, the following conditions should be considered by the Planning Commission and Township Board in reviewing rezoning requests or for site plans related to zoned areas.

- The area proposed for rezoning should usually be contiguous to, or near similarly zoned areas, particularly for Commercial and Industrial. For new commercial uses which have available public sewer and/or water facilities, exceptions may be appropriate.
- Planning for service drives or street extensions to serve adjacent properties should be encouraged, and in some instances, required. Where service drives are impractical due to topographic or other physical conditions related to the property, shared drives should be considered.

## SECTION 11 IMPLEMENTATION

**The Master Plan as a Guide** - As a guide, the Master Plan is not meant to be rigidly administered, as changing conditions may affect the assumptions used when the Plan was originally conceived. Changing conditions may call for the Plan to be adapted. The Township Planning Commission must examine those changes and decide if the principles on which the Master Plan was based are still valid.

As growth occurs it will be necessary for the Township to address difficult zoning issues brought on by the pace and increasing complexity of development sought by residents and property owners. The need to address sometimes conflicting land use influences will also be a driving element of the Plan. It will also be important for the Plan to be used consistently. A plan which is not actively followed and implemented may erode future benefits the Plan seeks to achieve.

Likewise, consistent, vigorous use of the Plan will lend credibility to community attempts to implement tough decisions on rezoning's or other zoning actions. The courts of the State of Michigan find there is credibility in actions which are supported by careful planning.

Finally, it is critical that the Plan be read in its entirety. Rather than attempting to isolate individual statements that may appear to support one position or another regarding the Future Land Use for the Township, the Planning Commission must consider the intent of the Plan. This requires a careful reading of the Plan to ensure that all the Plan's considerations are included in the evaluation of any change.

The Plan will not be fulfilled overnight; as a look at the future, it is intended to guide decisions made, one day at a time. Accordingly, the Plan is intended to be flexible so that changing conditions can be accommodated.

On the other hand, while the Plan needs to be a flexible instrument, its recommendations should not be taken lightly. Adjustments should be made only when necessary and justified by changing conditions or shifts in community philosophy. The Planning Commission should regularly review the Plan to ensure that the Township remains on the right track to achieve the future it desires.

Overall, the Master Plan is based on many township characteristics, each of which must be considered by the Planning Commission and Township Board as the Plan is implemented and updated. These characteristics include:

**❑ Community Character**

The Plan's goals describe the character desired by the community. The strong emphasis placed on maintaining rural character, for example, is reflected in the Future Land Use element.

**❑ Capability of Land**

Environmental constraints must also be considered. Is the land itself able to accommodate planned uses? Are soils and water resources capable of accommodating the density of planned development where public utilities are not available? How will decisions affect wildlife and natural features?

**❑ Community Needs**

What uses are needed in the community? Identified needs can be addressed by providing appropriate land uses in desirable locations.

**❑ Available Services**

Through issue identification, goals, and data collection, information is obtained about the status of community services. Are services capable of handling planned development? What kind of strain would new residential development place on the ability to provide adequate fire protection? What road improvements may be required?

**❑ Existing Development**

How will the planned land uses affect existing uses? Are there some areas that the Township would like to rezone for different uses in the future? How will planned future uses affect those existing uses already established?

**❑ Regional Planning**

The Township does not exist in a vacuum. There are other regional issues, such as transportation, environmental, and utility plans, that also need to be considered. These include the on-going cooperative planning with the City of Marshall and other neighboring municipalities on issues of regional concern.

The Master Plan should be used as a guideline for making future land use decisions in the Township. One of the primary goals of the plan is to provide an orderly and rational process of growth. The basic intent of the plan is to provide for economic development within the Township, while maintaining a high quality and attractive residential environment.

This will be accomplished by separating higher-density residential, commercial and industrial activities from lower-density, single-family uses wherever possible. Where this is not possible, the plan recommends adequate buffer requirements be established. The future land use map sets aside adequate land for commercial and agricultural land uses during the planning period. However, much of the Township is reserved for residential land uses.

Land use changes should be consistent with the plan. If changing circumstances make certain types of development desirable that are not in accordance with the present plan, the plan should be reviewed prior to construction of the development to determine if a revision to the Master Plan is appropriate.

**Implementation Techniques** - The purpose of the Master Plan is to establish a coordinated approach to land use and development and to promote the general health safety, convenience, welfare, economy, and efficiency of the Township. However, the plan must be implemented so that the benefits of the planning process can be realized. The plan will be most successful if it is continually used in the decision-making process of the Township.

**The Master Plan and Zoning Ordinance** - The primary means for implementing the goals and objectives expressed in the Master Plan is through a zoning ordinance. The relationship between the Master Plan and Zoning Ordinance is often misunderstood. Stated concisely, the Master Plan is a guide for land use for the future, whereas the Zoning Ordinance regulates the use of land in the present. The Master Plan is not a binding, legal document, but the Zoning Ordinance is a law that must be followed by the Township and its residents. The plan itself has no legal basis to restrict or encourage development. Rather the plan serves as the basis for the rational development and administration of a zoning ordinance that is specifically designed to accomplish the goals and objectives expressed in the plan.

Adopting or changing a Master Plan does not directly affect the zoning for any property. However, it is contemplated that future changes to the zoning map will be reflective of the planned uses shown by the Master Plan.

**Subdivision Controls** - While zoning regulates the use of land, various State laws regulate the division and subdivision of land. Subdivision regulations are designed to ensure that each development is compatible with the community, that adequate public facilities are provided, and that all applicable regulations are met. Subdivision regulations typically consider such elements as streets, drainage, public services, natural amenities, street lighting, and off-street parking.

The planning commission plays an instrumental role in the subdivision review process. It has been given the authority and responsibility to meet with the developer throughout the review process, to provide an adequate public hearing, and to present its recommendations of either approval or disapproval to the Township Board.

**Capital Improvement Programming** - A third means of implementing the Plan is through a capital improvement program (CIP). The CIP is a 6-year capital improvement budget for the Township enabling it to plan for needed improvements on an orderly basis within its capabilities. For example, the Township may determine a need for improvements in certain areas (public infrastructure, such as sewer, water, and roads) or can encourage diverse types of development through the expenditure of public funds.

The advantage of a CIP is that attention can be focused on the community's needs and objectives and the methods of implementing them. In addition, the administration of the Township can be improved, thereby, optimizing its tax revenues.

**Public Cooperation** - Marengo Township residents can and should provide comments and discussion regarding development in the Township. As representatives of its citizens, the Township Board and planning commission welcome input from the public. Prior to making any major land use changes and prior to making modifications to this plan, a public hearing will be held to allow all interested and affected citizens to express their opinions and have their interests considered by the decision-making body.

The Township should work and cooperate with surrounding townships to help ensure compatible, neighboring land uses for the betterment of the entire community. The planning commission will make copies of this plan available to interested parties and welcomes input concerning plan implementation.

The Master Plan will be most successful if Township residents are involved in the drafting of the plan and support its goals and recommendations. This involvement must also be encouraged during the implementation of the plan. An informed and supportive public may be the crucial link to the successful implementation of this plan.

**Maintaining the Plan** - The plan serves as a guide for the decision-making process of the Township. To be a functional, decision-making tool, the plan must remain current. By recording land use activities on a regular basis, the plan can be continually updated to reflect current conditions. This will also help identify development trends that are not in accordance with the objectives of the plan and may identify concepts that should be incorporated into the plan. Recording the following information will help maintain the Master Plan:

- Locations of new buildings.
- Parcel splits.
- Zoning requests.
- A description of any development that would be noteworthy in assessing the growth of the Township.

Narratives should be prepared summarizing the annual activity in the Township. A review should then be made of the year's activity to assess its compliance with the development plan. If necessary, modification should be made to the plan.

The Michigan Planning Enabling Act provides that every 5 years the plan should be reviewed. In that review, the Planning Commission will compare the development that has occurred with the policies of the plan. The plan should be updated to reflect the current character of the community. The goals and objectives of the Township should also be reassessed considering any changed conditions.

**Using the Plan** - The Planning Commission and Township Board should continuously strive to:

- **Refer to the Master Plan in All Zoning Decisions**

One principal benefit of having an adopted Master Plan is the foundation provided for sound zoning decisions. Just as the Plan is the policy guide for land use, zoning is the principal legal enforcement tool. The two should work together to support each zoning decision and to assist in defending legal challenges to those decisions, should they occur.

- **Encourage Other Decision-Making Bodies to Use the Master Plan**

The Master Plan should help guide every-day decisions, from the capacity of improved roads to new schools. The Township should use the Master Plan to make policy decisions in the Township. Working with other parties that can affect land use patterns in the Township, such as the County Road Commission, School District, and even adjacent townships, can help Marengo Township in the implementation of the Master Plan.

- **Keep the Plan Current**

The Planning Commission should regularly review the Plan to ensure that it is kept current. Community goals should be updated and zoning decisions that affect the direction of development should be incorporated. Where uses have been approved contrary to the Plan, the Plan should be amended to reflect these changes. By routinely following this procedure, the Master Plan will continue to be an up-to-date, reliable planning tool.

- **Mandated Review**

The Michigan Planning Enabling Act indicates that the Master Plan should be reviewed every 5 years. While this does not mandate that the Plan be changed, it at least encourages a thorough review to determine if the directions set forth are still valid.

### **How does the Master Plan affect landowners?**

How the Master Plan affects you depends on your situation. A property owner may wish to know what uses are proposed for your property and for land in your area.

Township residents may be interested in the concepts of the Plan, as expressed in its goals. These statements will indicate the Planning Commission's view of the township now and in the future.

## **How Should the Plan be Used?**

Use of the Plan depends on your interest in the future of Marengo Township, but generally, here is the procedure you could follow.

### **Step #1 What land use is proposed for your property and the area surrounding your property?**

You will find this information on the Future Land Use map. The map is divided into separate land use categories. Find the category in which your property is located.

### **Step #2 Determine how the Planning Commission views development in your area.**

Although the text of the Future Land Use Plan will indicate to you the general direction of development within your area, it may be specific, or it may be somewhat general. The Future Land Use text is meant to provide a general direction to the Planning Commission and property owners regarding future development within the township.

### **Step #3 Determine the meaning of the land use designation for property.**

In the Future Land Use Section, there is a discussion covering each land use category. If you have a specific proposal which does not fit the Future Land Use portion of the Plan, you may want to investigate the Plan in more detail, beginning with the goals.

### **Step #4 Determine how the Plan affects property.**

The Future Land Use designation will indicate how your property is planned for use in the future. This does not necessarily mean that you cannot continue the use that you currently have. Land use within Marengo Township is also affected by the zoning for your property. See the Zoning Ordinance or call the Township offices for more information.

The Master Plan may have a significant impact on the future of your property. As a resident of Marengo Township, it is important that you become familiar with the Plan and what it may mean to you.

**Conclusion** - The Planning Commission and Township Board of Marengo Township have assumed their responsibility to look beyond today's zoning issues and provide long term guidance for land use and development through the adoption of this Master Plan. The Township hopes that the Plan will provide tangible benefits in improved quality of life, efficient use of

financial and other resources, a cleaner environment, and an economically healthy community. The degree to which the Township and its citizens follow the Plan and keep it current may dictate how effectively the Plan goals are realized. It is demanding work; but the rewards offer to make the effort well worthwhile.

## **SECTION 12**

### **METHOD FOR ACCOMPLISHING PLANNING OBJECTIVES**

#### **PROCESS FOR DECISION MAKING**

A primary goal of the Plan is to provide for an orderly and rational process of growth. The Land Use Plan should be used as a guideline for making future land use decisions in the Township. The basic intent of the Plan is to maintain residential land uses. Therefore, to the extent possible, extension of other types of land uses into residential areas should be limited. Wherever possible, natural buffer zones should be utilized to separate other higher intensity types of uses such as multi-family residential or commercial developments, which could conflict with residential activities. Where natural buffer zones cannot be utilized, transitional land use zones should be provided between residential areas and higher intensity uses. Only land use changes following the Plan should be permitted. The Plan should be amended without haste when changing circumstances prompt unanticipated development types.

#### **ROLE OF THE PLANNING COMMISSION, TOWNSHIP BOARD AND CITIZENS**

Besides preparing and adopting the Land Use Plan, the Planning Commission has various other duties including:

- The powers and duties of the Zoning Board have been transferred to the Planning Commission.
- Review and approve all Plans for construction of public facilities in the Township.
- Review plats and other matters relating to land development and make recommendations to the Township Board.

#### **ZONING ORDINANCE**

The primary mechanism for implementing the goals and objectives expressed in the Land Use Plan is through a Township Zoning Ordinance. The Land Use Plan itself has no legal basis to restrict or encourage development. Rather, the Plan serves as the basis for the rational development and administration of a zoning ordinance that is specifically designed to accomplish the goals and objectives expressed in the Plan.

The Planning Commission does not have final authority for denying requests for development in the Township. Rather, this authority rests with the Township Board. The Planning Commission's responsibility is to make informed recommendations to the Board based on the provisions of the Zoning Ordinance, the objectives of the Land Use Plan, and the needs of the Community.

Meetings held by the Township Board and the Planning Commission are open to the public. Therefore, citizens have an opportunity and the responsibility to provide comments and discussion regarding development plans in the Township. The Township Board and the Planning Commission welcome participation from the citizens in the form of constructive comments. Public hearings will be held to allow all interested persons and affected residents to express their opinions and have their interests considered.

## **SECTION 13**

### **KEEPING THE PLAN CURRENT**

#### **MONITORING ACTIVITY IN THE TOWNSHIP**

To be a functional, decision-making tool, the Master Plan must be kept current. By recording various activities in the Township regularly, the Master Plan can be periodically updated to reflect the current conditions. This procedure will also help identify development trends that are not following the objectives of the Plan, and may identify advantageous concepts that should be incorporated in the Plan. To keep the Plan current, the following suggestions are recommended:

1. Use building permits to locate new buildings.
2. Parcel splits.
3. Requests for rezoning and zoning variances, with notation of action taken.
4. A description of any development that would be noteworthy in assessing the growth of the Township.

Once a year a short narrative should be prepared summarizing the annual activity of the Planning Commission. A review should then be made of the year's activity to assess its compliance with the desired development Plan. If necessary, modification should be made to the Plan.

Every five years the Plan must be reviewed to compare the development that has occurred with the provisions of the Plan. If necessary, the Plan should be modified to reflect the current character of the Township. The goals and objectives of the Township should also be reassessed in light of any changed conditions. As the Plan is modified, the Zoning Ordinance should be reviewed to determine if the provisions of the Zoning Ordinance agree with the revised Master Plan. Zoning changes should not be considered without being substantiated by the Plan.

Following adoption of the future Land Use Plan, the following steps should be undertaken to complete this process, and achieve zoning consistency:

1. Direct Plan to the Township Board, for their review and information.
2. Send Plan to Calhoun County Planning Department for inclusion in countywide planning programs.
3. Meet with representative of County Planning Department to determine the status of the Township Zoning Ordinance and Zoning Map, and determine the extent if any, of required zoning changes.
4. Implementation of any necessary zoning changes

## APPENDICES

### Appendix A – Survey Questionnaire

# Marengo Township

**The Township Planning Commission is in the process of updating the Township Master Plan. The Master Plan serves as a general guide to growth and development in the Township. As we go through this process, it is very important that we have as much input from the community as possible. This questionnaire is designed to obtain your input and opinions regarding Marengo Township's opportunities, present conditions, and future growth. Your input will provide the Township a perspective on your preferences concerning the quality of life in the Township. The information you provide will be a valuable and necessary component in the process of determining the direction of future endeavors for the whole Township.**

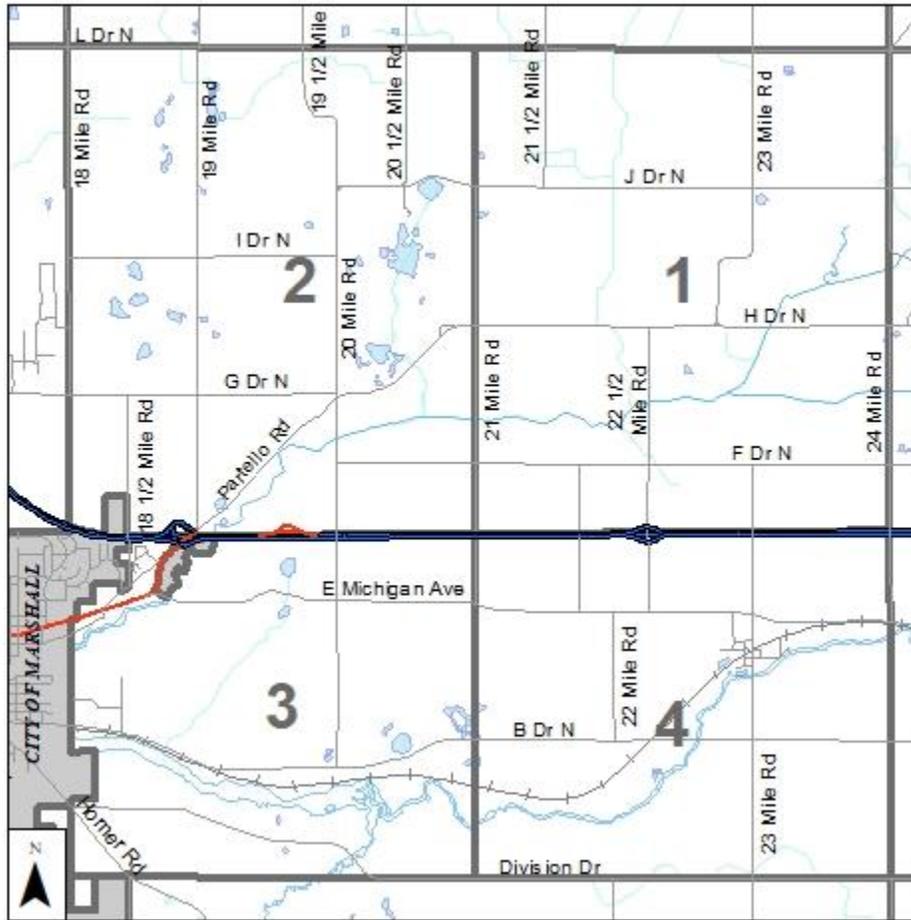
**Please take a few minutes over the next few days to complete the questionnaire.**

**If you would like to stay informed about the effort to update the Master Plan, participate in community meetings. Planning Commission work sessions are generally the 1st Wednesday of every month at 6:00 p.m. until we have completed the Plan.**

- **Please return by February 11, 2019**
- **Feel free to blackout your name if you would like to keep your results confidential**
- **When you have completed the questionnaire please fold so the township address is on the outside and tape closed.**
- **Thank you for your time and support**

1. Referring to the map of the township, please indicate in which numbered area you live or own property.

- Area 1
- Area 2
- Area 3
- Area 4



2. What best describes the type of property you own in the Township? (Select all that apply.)

- Vacant land
- Primary residence
- Secondary residence
- Commercial business
- Rental housing
- Agricultural
- Other (Please Specify) \_\_\_\_\_

**3. What size parcel(s) do you own in the Township? (Select all that apply.)**

- 1.0 acre or less
- 1.1 to 5.0 acres
- 5.1 to 10 acres
- 10.1 to 20 acres
- 20.1 to 40 acres
- 40.1 or more acres

**4. How long have you owned property in the township? (Select only one.)**

- 5 years or less
- 6 to 10 years
- 11 to 30 years
- 31 years or more

**5. Do you generally support the division of Farms and large agricultural parcels of land into smaller parcels for single-family dwellings?**

- Yes
- No

**6. In your opinion, what is the primary reason residents locate in Marengo Township? (Select all that apply.)**

- Rural character
- Proximity to I-94
- Low taxes
- Proximity to Lansing
- Proximity to Marshall
- Proximity to Albion
- Mar-Lee schools
- Other (Please Specify) \_\_\_\_\_

**7. Would you utilize the proposed North Country National Scenic Trail (hiking trail)?**  
**<https://northcountrytrail.org>**

- Yes
- No

**8. Should the Township do more to promote any of the following recreational opportunities?  
(Select all that apply.)**

- Playgrounds
- Lake and River access
- Biking and hiking trails
- camping
- Tennis Courts
- Basketball Courts
- Ball fields

**9. Should the Township acquire land for future parks and playgrounds?**

- Yes
- No

**10. Would you be willing to pay a small millage to provide better recreational opportunities?**

- Yes
- No

**11. Presently, the "AA - Agricultural Zoning District" has a minimum lot size of 1.0 acres. Do you think it should be...**

- Increased
- Decreased
- Stay the same

**12. Presently, the "AB - Agricultural/Business Zoning District" has a minimum lot size of 40 acres. Do you think it should be...**

- Increased
- Decreased
- Stay the same

**13. Presently, the "RA - Low Density Residential District" has a minimum lot size of 15,000 square feet (about 1/3 of an acre). Do you think it should be...**

- Increased
- Decreased
- Stay the same

**14. Which natural features in Marengo Township are important to you? Select all that apply.**

- Public access to Township Creeks
- Water quality of lakes and creeks
- Public access to the Kalamazoo River
- Protection of drinking water supply
- Access to Lakes
- Other (Please Specify) \_\_\_\_\_

**15. Do you support increased controls on development to protect lakes, wetlands, ponds, rivers and streams?**

- Yes
- No

**16. If the township were to consider the creation of a new zoning district called "Rural Estates", what minimum size lots would you like to see? (Select only one.)**

- Less than 1 acre
- 1 to 3 acres
- 3 to 5 acres
- 5 to 10 acres

**17. In the area where you live, which of the following types of new housing should be encouraged?**

- Single-family homes on 5 acre lots or larger
- Single-family homes on 5 acre lots or smaller
- Apartments, duplexes or attached condos
- Both housing and commercial development together

**18. Please describe how you feel about roads in the Township. (Select only one.)**

- Very Good Condition
- Good Condition
- Adequate Condition
- Poor Condition
- Very Poor Condition

**19. Should the Township increase the amount of commercially zoned land?**

- Yes
- No

**20. Would you like to see any of the following types of senior citizen housing in the township?  
(Select all that apply.)**

- Assisted living
- Senior apartments
- Nursing home
- Retirement community

**21. Would you support making second homes such as "mother-in-law apartments" and guest homes on the same property as the principal dwelling?**

- Yes
- No
- Maybe

**22. Accessory buildings for storage should be limited in size according to the size of the lot.**

- Agree
- Disagree

**23. Do you believe the township should allow the following? Select all that apply.**

- Tiny homes (under 700 square feet)
- Farm animals in residential areas on parcels less than 5 acres in size
- Medical Marijuana Facilities
- Recreational Marijuana Facilities
- Home occupations occurring in accessory buildings
- Storing machinery and equipment outdoors on residential parcels
- Private streets to serve back lot land divisions
- Solar farms
- Wind farms

**24. Do you believe the township should regulate the following? Select all that apply.**

- Mining activities
- Air bnb's (Short term rentals in residential areas)
- Pond construction on individual parcels

- Wireless Communications Equipment
- Solar panels on residential parcels

**25. Would you like to see more aggressive enforcement of zoning violations?**

- Yes
- No

**26. Do you have any other comments?**

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## Appendix B – Survey Results

# Marengo Township

There were 913 surveys mailed out.

There were 285 surveys returned and processed for results.

This is a return rate of 31.2%

The level of confidence is 95% with a 4.97% degree of error that the sample size represents the entire township

Following is the results of the returned surveys.

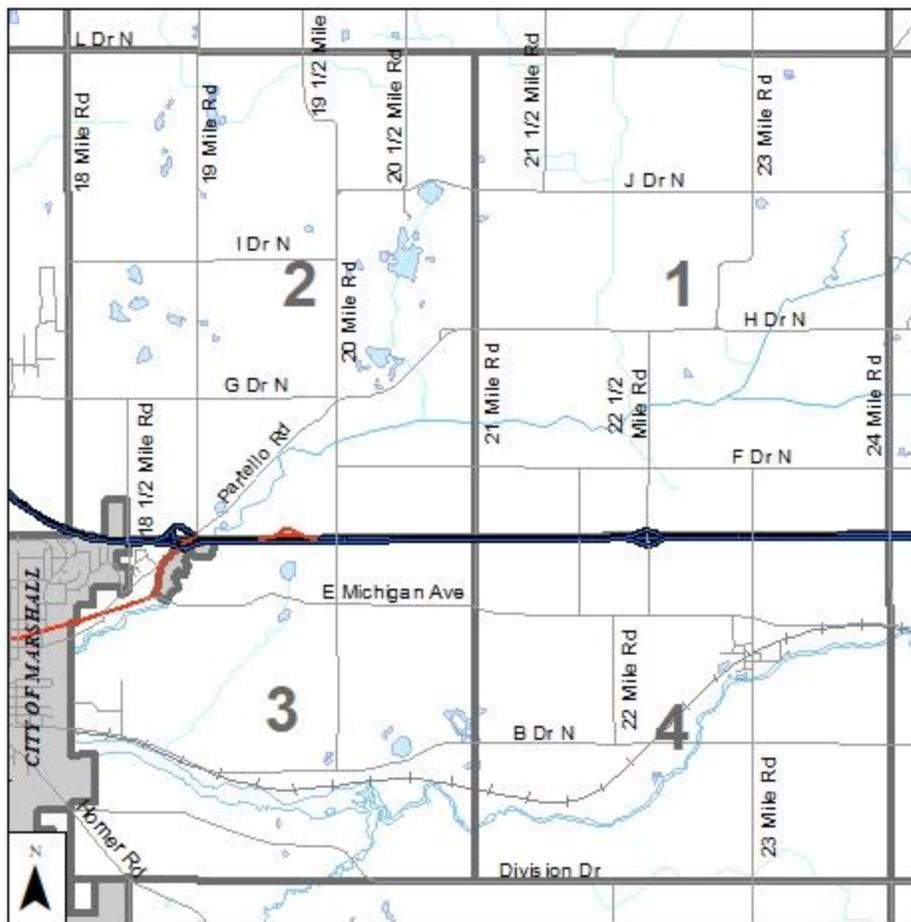
**1. Referring to the map of the township, please indicate in which numbered area you live or own property.**

Area 1 - 24% (67)

Area 2 - 42% (117)

Area 3 - 18% (50)

Area 4 - 16% (43)



**2. What best describes the type of property you own in the Township? (Select all that apply.)**

Vacant land - 17% (46)

Primary residence - 83% (227)

Secondary residence - 1% (3)

Commercial business - 1% (4)

Rental housing - 5% (13)

Agricultural - 21% (57)

Other - 4% (10)

Horse pasture

MHP

Partially wooded

Storage/hobby

Greenhouse

Workshop and 2 car garage

Work in progress

Our madness

Swamp

Woods

**3. What size parcel(s) do you own in the Township? (Select all that apply.)**

1.0 acre or less - 17% (47)

1.1 to 5.0 acres - 40% (112)

5.1 to 10 acres - 13% (37)

10.1 to 20 acres - 11% (31)

20.1 to 40 acres - 8% (22)

40.1 or more acres - 19% (53)

**4. How long have you owned property in the township? (Select only one.)**

5 years or less - 14% (40)

6 to 10 years - 11% (31)

11 to 30 years - 41% (114)

31 years or more - 34% (95)

**5. Do you generally support the division of Farms and large agricultural parcels of land into smaller parcels for single-family dwellings?**

Yes - 39% (106)

No - 61% (164)

**6. In your opinion, what is the primary reason residents locate in Marengo Township? (Select all that apply.)**

Rural character - 72% (200)

Proximity to I-94 - 43% (119)

Low taxes - 37% (102)

Proximity to Lansing - 8% (23)

Proximity to Marshall - 56% (156)

Proximity to Albion - 10% (29)

Mar-Lee schools - 38% (105)

**Other - 6% (18)**

Proximity to I-69

Low price fixer upper

Happenstance

Michigan Avenue

Near extended family

Less restrictions and codes

Rolling hills, agriculture, sunrise/sunsets

Place to live

Not sure

Family

The reason I live here/box's checked

Farming

Born and raised

Family

Raising horses

Great for hunting

Who knows for sure – ROADS ARE BAD

Farming

**7. Would you utilize the proposed North Country National Scenic Trail (hiking trail)? (<https://northcountrytrail.org>)**

Yes - 41% (112)

No - 59% (162)

**8. Should the Township do more to promote any of the following recreational opportunities? (Select all that apply.)**

Playgrounds - 27% (48)

Lake and River access - 76% (134)

Biking and hiking trails - 55% (96)

Camping - 21% (37)

Tennis Courts - 5% (8)  
Basketball Courts - 5% (8)  
Ball fields - 15% (27)

**9. Should the Township acquire land for future parks and playgrounds?**

Yes - 27% (75)  
No - 73% (199)

**10. Would you be willing to pay a small millage to provide better recreational opportunities?**

Yes - 29% (80)  
No - 71% (193)

**11. Presently, the "AA - Agricultural Zoning District" has a minimum lot size of 1.0 acres. Do you think it should be...**

Increased - 27% (74)  
Decreased - 3% (7)  
Stay the same - 71% (194)

**12. Presently, the "AB - Agricultural/Business Zoning District" has a minimum lot size of 40 acres. Do you think it should be...**

Increased - 5% (13)  
Decreased - 21% (56)

Stay the same - 74% (201)

**13. Presently, the "RA - Low Density Residential District" has a minimum lot size of 15,000 square feet (about 1/3 of an acre). Do you think it should be...**

Increased - 41% (109)

Decreased - 1% (2)

Stay the same - 59% (158)

**14. Which natural features in Marengo Township are important to you? Select all that apply.**

Public access to Township Creeks - 33% (87)

Water quality of lakes and creeks - 71% (188)

Public access to the Kalamazoo River - 42% (110)

Protection of drinking water supply - 84% (220)

Access to Lakes - 44% (115)

Other - 6% (15)

Farms

Water quality Kalamazoo River

Kalamazoo river access and trash containers in Marengo Township Village

Protection of private property

Specific loading/unloading on creeks (not just by bridges and people's property) for public use

Sense of community and lack of nit picking

Trees – road commission and consumers should stop cutting them down

People mind their business

None of the above

Quiet neighborhoods

Wildlife & wild places rural life

There isn't any – can't even fish Rice Creek. Have to go to Stuart Landing to fish the Kzoo River. Lake of the Woods but that isn't a DNR access.

I don't know of any public property for access to any lakes, creeks or rivers

Dog park

Keeping it rural – 5 acre min. to build

**15. Do you support increased controls on development to protect lakes, wetlands, ponds, rivers and streams?**

Yes - 72% (199)

No - 28% (76)

**16. If the township were to consider the creation of a new zoning district called "Rural Estates", what minimum size lots would you like to see? (Select only one.)**

Less than 1 acre - 8% (20)

1 to 3 acres - 48% (122)

3 to 5 acres - 20% (50)

5 to 10 acres - 24% (61)

**17. In the area where you live, which of the following types of new housing should be encouraged?**

Single-family homes on 5 acre lots or larger - 47% (119)

Single-family homes on 5 acre lots or smaller – 50% (127)

Apartments, duplexes or attached condos - 2% (6)

Both housing and commercial development together  
- 7% (17)

**18. Please describe how you feel about roads in the Township.  
(Select only one.)**

- Very Good Condition - 0% (0)
- Good Condition - 4% (10)
- Adequate Condition - 17% (48)
- Poor Condition - 39% (108)
- Very Poor Condition - 43% (119)

**19. Should the Township increase the amount of commercially zoned land?**

- Yes - 22% (57)
- No - 78% (203)

**20. Would you like to see any of the following types of senior citizen housing in the township? (Select all that apply.)**

- Assisted living - 66% (112)
- Senior apartments - 32% (54)
- Nursing home - 23% (39)
- Retirement community - 53% (90)

**21. Would you support making second homes such as "mother-in-law apartments" and guest homes on the same property as the principal dwelling?**

- Yes - 49% (135)

No - 20% (54)

Maybe - 32% (87)

**22. Accessory buildings for storage should be limited in size according to the size of the lot.**

Agree - 59% (160)

Disagree - 41% (112)

**23. Do you believe the township should allow the following? Select all that apply.**

Tiny homes (under 700 square feet) -41% (99)

Farm animals in residential areas on parcels less than 5 acres in size - 46% (112)

Medical Marijuana Facilities - 25% (61)

Recreational Marijuana Facilities - 16% (40)

Home occupations occurring in accessory buildings - 39% (96)

Storing machinery and equipment outdoors on residential parcels - 32% (79)

Private streets to serve back lot land divisions - 26% (63)

Solar farms - 64% (155)

Wind farms - 52% (127)

**24. Do you believe the township should regulate the following?  
Select all that apply.**

Mining activities - 79% (153)

Air bnb's (Short term rentals in residential areas)  
- 40% (77)

Pond construction on individual parcels - 32% (63)

Wireless Communications Equipment - 39% (76)

Solar panels on residential parcels - 29% (57)

**25. Would you like to see more aggressive enforcement of zoning violations?**

Yes - 53% (131)

No - 47% (114)

**26. Do you have any other comments?**

43% (121)

1. None
2. No
3. No
4. No
5. No
6. No

7. The trail on the river is an invasion of privacy to the owner of the property. I am not allowed to be in someone's back yard that is not mine - I pay the property taxes and therefore expect others to not have access just as I do not have access to their backyards.
8. The trail is a waste of good money that could be used for other needed programs like education, road improvements, etc.
9. I would like enforcement of residential property for keeping property neat and not cluttered with junk. My neighbor has trashed their property and no one does a darn thing about it. If I wanted to sell my property it would deter a reasonable sale, and I may want to do that in a few years. Someone should enforce the ordinance we already have, if we have one!! Also, the sidewalks in front of my house have NEVER BEEN TOUCHED. People go by in wheelchairs and I'm afraid they will tip over on the holes and chipped out cement. I have lived there for 54 years and nothing has been done to it.
10. Yes, find a way to lower property taxes for the elderly.
11. Thank you for taking care of things.
12. Clean up property. Cars must have current plate.
13. Fire Department does an excellent job. If I could wish for anything it would be access to high speed internet. Are the results of this survey going to be sent out to residents?
14. Why does it take so long to put a bridge in 21 Mile Road?
15. Road repair is most important to me.
16. Some of the questions are hard to answer because I am not aware of controls or ordinances we already have. Wouldn't want to increase something that is adequate already.
17. Please do something with 19 Mile Road from Partello to N Drive North. The farmers use it for a lot of semi-truck traffic and the road is horrible. I understand the use of the road for the trucks but with the amount of traffic and trucks, it needs a major overhaul. It doesn't do any good to promote recreation and home sites if you can't get to them without trashing your vehicle. 34 years ago, when I was considering buying my house, I was told that 19 Mile Road was scheduled for repaving as it was not good then. Part of the decision to buy was based on that. Well, 34 years later, no repaving and the road has gone from very bad to at times impassable. When a truckload of patch only lasts 1/4 mile and it is empty, it takes all summer to patch the road. They even went down over our road 2 weeks ago and it is already full of holes again and now we have it covered with ice.  
Rod Christensen 269-317-1930

18. Promote more water way usage instead of bicycle paths. We have plenty of water ways and would help the draining problem.
19. You should fire AGS and hire someone who can correctly interpret your ordinances
20. #19 Plenty of commercially zoned land but township needs to be more willing to allow commercial growth.
21. Barking dog ordinance Junk car ordinance and see they are enforced.
22. Roads are a joke. Beyond ridiculous it takes until September/October to fill potholes from prior winter season?? Why the county and the townships can't have an all-out approach on filling potholes the first few months of spring is unacceptable. Contracted labor not an option?
23. I would gladly pay a small millage to gain some sort of access to the rivers
24. Would like to see more safety equipment installed on 20 Mile/Partello Road/G Drive north section.
25. With the reoccurring amount of traffic that DO NOT STOP at intersections/stop signs causing many close encounters and accidents, including death, would help improve safety for homes in this area along with more visual evidence of intersection and property along this area.
26. Possible safety equipment would be ground rail on north side Partello Road/20 Mile on corner to G Drive. Flashing stop signs, with more stop ahead signs or move signs closer to road for more visibility maybe street light at intersections
27. School bus zone signs - many cars not stopping for busses.
28. Any excess money should be used to fix the roads. If roads are good people will want to bicycle, jog, motorcycle riding. People would be wanting to move to the township the roads are terrible. They are a hazard to those driving on them.
29. Not multiple families in single dwellings. Too many vehicles in one yard.
30. Instead of the township expanding recreational sources the township should put financial resources towards road repair first.
31. #20 - Not enough information on how this would affect taxes
32. #21 Would they be taxed?

33. Junk cars are a problem. Would support targeted special assessment for secondary roads.
34. We live on 19 Mile Road between Partello and G Drive. Our road is horrible - too many semi's travel through - throwing hot asphalt into pot holes does nothing - take a week or two and redo the whole road with something commercial grade or stop semis from using this road as a go between I-94 exit 112 & 110. They go from truck stop to truck stop.
35. Work on roads and trim brush - road sides and corners.
36. We need high speed internet access. Fiber-cable abilities.
37. Natural gas access
38. Increase law enforcement patrols.
39. Road repairs.
40. How about enforcing zoning laws on abandoned property - i.e. houses, barns, trailers (mobile homes), boats, cars, trucks, etc.
41. How about using the increases in property taxes assessments for what we were told they would be used for - see #18. Take a ride around the township. The numerous junk cars, trucks, mobile homes, boats, and falling down HAZARDOUS houses (which are filled with animals and at times homeless people) are a disgrace. Then - after your ride, visit your nearest car repair facility - see # 18.
42. less government
43. 5. Ultimately land division should be up to property owner.
44. 7. Would North Country Trail be open to other uses (off-road bicycles, etc.)
45. The nice thing about living in Marengo is the lack of the government boot on our neck. If there is a significant problem it is addressed. Not ok w/looking for problems.
46. I'd like to know what the ordinance is for cars that are no longer being used is. Our road has at least one car, some have multiple cars, that are sitting on residential property. Is it allowed because they have more than an acre and can put them off in the backyards, not visible from the street? I would love to have this resolved, if it is against out township ordinances, but fear retaliation due to being the only one on the street without a junk car.
47. Extend cable for internet or make internet possible in all areas

48. Please spend my tax dollars as if it was your own money.
49. We want to live in a rural area. We want to keep the cost of living low. We want to minimize the number of services we have to pay for or maintain. Providing "recreation" or "services" becomes a long-term commitment for things only a few local citizens are asking for. Instead of handing over "tons" of cash to the public library, we should reimburse township citizens for a paid membership (when they show a receipt). We don't want to "recruit" development - let's keep our open spaces.
50. leave well enough alone!
51. We are overruled and overtaxed with piss poor roads and overregulated
52. Better Roads. Establish North Country Trail through township. Leave people alone unless they are infringing on their neighbor's rights or properties. Let us rise above the current political it's all about me and what I want and try to see each other's view and situation and resolve our differences as neighbors with consideration for their view and situation.
53. The roads are our primary concern.
54. Keep townships regulations simply. I feel there is too much gov control already!
55. Keep Marengo rural! No need to go revenue searching via subdivisions or commercial properties. We fully support the agriculture in this township. If we wanted to be surrounded by houses, we would live in Marshall, we will take the not-as-nice roads here! God Bless the FAMILY Farm!
56. Change building permit services. Current one is bad! No answers, 2 calls different directions each time. Why does the township have 1 small office?
57. This questionnaire sounds like we in the township will be asked for money. The whole thing sounds fishy. Sounds like someone will be making lots of money from a land sale. We are on a fixed income and cannot afford anymore millage for playgrounds.
58. If I wanted to see any zoning improvements, they would be ones that restrict eye-sores such as poorly maintained property and junk cars sitting around. In my opinion if you don't like seeing farm equipment don't live in the country. Farm equipment is different than junk unless sitting for years.
59. Fix the roads please. All of them, not just the ones that township trustees and employees live on. I've had to redo suspension on 2 different vehicles in the last three years and replaced a tire and rim on a 3rd due to potholes I don't care about any plans or development until roads are fixed.

60. Everyone has a cell phone with internet STOP PAYING THE MARSHALL LIBRARY THIS IS A HUGE WASTE OF MONEY!!!! and everyone that gets paid by the township should be held accountable to do their job and be present. Punch a time clock, show up to all meetings!!! "Assistants too".
61. The township should control and not outsource its building and construction permits to building and permit services in Richland, MI. What a joke this place is! Permit delays and inadequate inspectors that find a problem every time they come back. A lot of wasted time and money when a homeowner in this township is trying to improve or better their household appearance and value.
62. If a resident looks trashy then it would be advisable to inform resident to clean up area according to township code
63. It is hard for me to respond to some of these questions without knowing about projected population growth and what demands are being made. Maybe some informative article could be sent out to township residents educating us.
64. Biggest concern is the amount of homes and property that have junk cars and other garbage in yards. Brings down property value and appearance of the community.
65. Every year our property taxes increase w/out explanation - people on fixed incomes will and are being forced to leave the township. We are, only for that reason.
66. I have been in the township since 2001. It is quiet and rural. Live and let live. I like the township and would be very disappointed to see further development here. I plan to live here as long as it is quiet and rural. If development brings more people, houses, or traffic, I will leave. Please leave it like it is. Thanks.
67. Not impressed with permit process or response.
68. Need street lamp at I-94 and Partello Road. People unfamiliar with area miss west bound ramp due to odd angle of ramp.
69. We live in a mobile home park and would love to have Marengo to supply our water and sewer instead of paying Marshall high prices to supply us.
70. Extend natural gas service. Extend wireless communication/internet
71.
  1. Improve the roads before ALL other considerations.
  2. Actually make the North Country Trail safe to be on. Widen the roadway or abolish the trail designation. As it is, the trail is a joke in Marengo Township.

72. Please fix the roads! Thank you
73. Give this check to the treasurer - thanks
74. Fix the roads - not w/ patches. Think long term use.
75. I love Marengo Township, Mar Lee School, my neighborhood.
76. This survey is a good idea. I'm glad you're trying to get opinions from residents. However, it was written with so little detail and explanation that it might be of limited value. Also, suggestion: Can we get into the 21st century and be able to pay tax bill online? And maybe even fill out surveys online?
77. You need to fix the roads with the money you have collected from taxes. Calhoun County Roads are the worst in all the surrounding counties.
78. Just that outsiders move out here, buy a postage stamp of property then think they can change what has worked well, just fine, for over my 63 years.
79. I appreciate the rural character of this township. It is why I moved here. I own close to six acres and if anything I would like a larger parcel. I prefer agriculture to development this is more commercial or multi-family in nature. Thank you for paving the roads adjacent to my home.
80. Fix the roads and we will be happier.
81. As a resident of Marengo for 4+ years, I feel that this is a great rural place to raise a family. I would hope that this remains a rural (farming) township. I do however feel that the township should consider bringing quality high speed internet to the township. I work for the City of Marshall Fibernet Department and Fiber to the home is the way to go. This would add value to the township. Many of the surrounding townships are in planning stages for high speed fiber optic internet. If the township needs more information on this subject, please call me 586-876-2106.
82. We love living in Marengo Township. Keep up the great work.
83. Our township roads are bad for the most part. The roads are beyond just pot hole fixing year after year or a partial repair (example - G Drive north between 19 Mile Road and 20 Mile Road). Most people don't mind paying for things to be done right. Our taxes go up each year and now an additional road tax but little has changed. People of the township are getting fed up with higher taxes and still nasty roads to drive on. This has gone on far too long. Where has all the money gone. Certainly not on our roads.

84. There are far too many large trucks/semi's going down 23 Mile Road than the village. They are tearing up the road and far too fast thru Marengo Village.
85. I like the idea to promote outdoor activities, but that means it has to be safe. We currently have people driving very fast on roads marked "Bike Route" and lots of beer cans on the side of the road - this behavior needs to stop no matter what but especially if we promote more biking, hiking, kayaking and trails.
86. I think the township should concentrate on infrastructure. When that is completed, it will attract new residents and businesses. Then some more rules may be necessary. I based my answers on the area that I own land. B Drive N. My land runs along the river the bridge there is in bad shape but a lot of people use the river for recreation.
87. The Township should be honest about what roads will be fixed with the tax money besides county taxes. They have never said that secondary roads are the only roads extra tax money take care the person campaigning for the money she never said that why not!! Tell the people the truth. I pay a lot of taxes already. Should not pay for everybody's road and not get the roads I live & use not to be fixed with my taxes.
88. Marengo Township needs to remain a rural area! This is what attracted my husband and me when we moved here in 1975! Wildlife and wild places are very important! Keep Marengo Township a place for wildlife and let's preserve habitat for creatures other than humans. The earth is shared by all living things. Let's protect wildlife and their habitat in Marengo Township.
89. There is HUGE revenue potential for the township to allow Regulated Medical Marijuana. Township officials should set a meeting with City of Marshall to hear how they have it regulated.  
Also look at their Fiber internet.
90. Why hasn't 19 Mile Road been "Replaced" not repaired. Why didn't the township leaders help Tommy Miller keep his County Road job - he might get A LOT more done than you people have. Why do I have to pay for drainage over by Gang Lakes - I don't think that is even the county. Did any of you even check if that is we should be taxed on that.
91. Roads are a disgrace and a hazard.
92. The numerous surrounding properties with non-functional vehicles, mobile homes, boats, and junk cars and abandoned/broken down and falling down houses is terrible, dangerous and an eyesore to the community.  
If there are rules, they should be enforced.

93. Need more road maintenance in all areas.  
More speed signs posted to help with speeders.
94. This is an AG community so all parcels should not be building sites.  
As a farmer I'd like to keep marijuana growth as a possibility for a profitable crop. As a landowner we've for too much regulation now.  
Landowners should be able to have solar or wind farms if they desire.
95. Most all has been good for the years I have owned land
96. Especially the home in the 19000 block of B Drive N where the scrappers live. We do not want any type of marijuana facilities in our township.
97. Township employees should be available more like other townships.
98. Not up on all info pertaining to questions answered to the best of my knowledge.
99. Clean up junk cars and vacated houses
100. Blight clean-up, water treatment (waste) Ban glyphosate in township.
101. Try to come up with a real questionnaire next time.
102. Street light maintenance? Are the lights checked regularly? Are residence required to notify the township when there are issues?
103. Living on 21 1/2 Mile Road north of I-94 we seem to be forgotten as to the condition of our road. It has not been resurfaced for many years and parts of it have returned to the original gravel base.
104. In the village of Marengo, we need more enforcement of pets (dogs & cats) roaming free. I do not believe I should be afraid to go out in my own yard from my neighbor's dogs barking and charging me in MY yard.
105. With current taxes so high why are the roads in such bad shape.
106. none
107. We need better blight control particularly on 18493 Homer.
108. Decrease property taxes for retirees!
109. Can we cut library money and KCC

110. Please allow Marshall city to call on provide fiber not to Marengo residents
111. We like the township as is. Marshall & Albion have more than enough recreation, entertainment, athletic fields etc. Why spend to create more & then compete? To let small houses, apartments etc. would not only change the character of our area it would reduce property values.
112. I would like to see more focus on our roads. It would also be a great idea to follow many other rural communities and partner w/business to develop a township wireless system. Rural broadband would attract more development in the residential areas.
113. Roads need to be fixed. Especially Division between Homer Road and the old compost center - beyond just "filling" the holes!
114. #1 People like lower taxes. We will deal with the roads vs increase  
#2 Mar Lee school as choice  
#3 People living out here understand it's a rural farming area. There will be tractors and it might smell. Tractors and machinery may be parked in sight.  
#4 minimum 5 acre to build will keep it rural.
115. Township roads in bad shape and needs attention.
116. Around the house on 20 Mile Road after 5 (17372 20 Mile Road) has a sharp hill to up or down and it was a sheet of ice for at least two days. Some dirt put on it would have assisted in helping to go up or down the hill. People have previously went over the bank there. Also, the road is bumpy it throws you all over on the road.
117. Keep housing lots to 1 or 2 acres or smaller. Don't make the same mistake of the 10 acres sub divide rule years ago. 1 acre was the house and 9 acres grew up in weeds and brush.
118. Why is there no options for good affordable internet service?
119. Shouldn't have to pay a tax for street lights when there aren't any on the road you reside on
120. My biggest issue with the township is the roads. They are down-right dangerous in certain spots. They are consistently bad. I think it would nice if the township could send out what they do with the tax money.
121. I'd like to see an option for residents to become certified on pot hole repair equipment there is ZERO excuses for our roads to be in this condition. Myself and many others are responsible DIY guys! I would be happy to assist in keeping our roads in better shape. It

takes no effort to say "NO" to this suggestion. What will it take for you to say "YES"? Don  
Helle 2211 H Drive N Marshall - 269-419-9971

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**MARENGO TOWNSHIP**

14021 23 MILE ROAD  
ALBION, MICHIGAN 49224

269-781-8422

269-781-9862 FAX

**MARENGO TOWNSHIP PLANNING COMMISSION**

**December 4, 2019**

As required by Section 43 of the MICHIGAN PLANNING ENABLING ACT, Act 33 of 2008, the Marengo Township Planning Commission hereby declares that they have held a properly noticed public hearing, and after much deliberation and discussion, adopted a resolution, that the newly revised draft of the Marengo Township Master Plan, dated December 2019, be approved.

Respectfully

 Secretary

Debra Huffman

Marengo Township Planning Commission

Duane Shrontz  
Supervisor

Doreen VanSickle  
Clerk

Angela Freitel  
Treasurer

David Fountain  
Trustee

Duane Hoffman  
Trustee

**MARENGO TOWNSHIP**

14021 23 MILE ROAD  
ALBION, MICHIGAN 49224

269-781-8422

269-781-9862 FAX

December 30, 2019

As required by Section 43 of the MICHIGAN PLANNING ENABLING ACT, Act 33 of 2008, the Marengo Township Board has, by resolution, asserted its right to approve or reject the Marengo Township Comprehensive Plan, and hereby declares that based upon the recommendation of the Planning Commission and after much deliberation and discussion, via resolution, that the newly revised draft of the Marengo Township Comprehensive Plan, dated December, 2019, is approved.

Respectfully



Doreen VanSickle, Clerk

Marengo Township

Duane Shrontz  
Supervisor

Doreen VanSickle  
Clerk

Angela Freitel  
Treasurer

David Fountain  
Trustee

Duane Hoffman  
Trustee