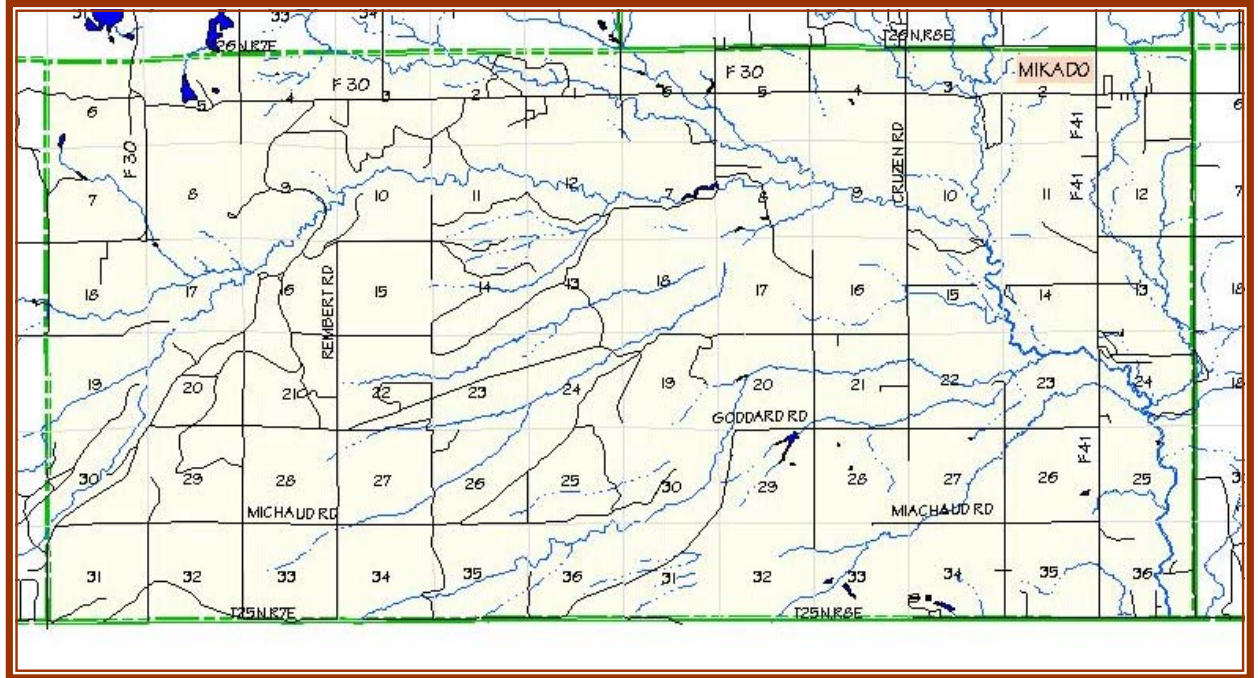


# Land Use Master Plan

## Mikado Township Alcona County, Michigan



Adopted: July 30, 2002

Prepared by: Mikado Township Planning Commission  
Members: Joel Mikazes, Chair, Alison Vick, Secretary, Violet Bethuy, Sylvia Evertt, and Wayne Odell

**With the Assistance of:**

Northeast Michigan Council of Governments  
121 East Mitchell Street  
P. O. Box 457  
Gaylord, Michigan 49735



MIKADO TOWNSHIP LAND USE MASTER PLAN

Mikado Township  
Alcona County, Michigan

Prepared for:

Mikado Township Planning Commission

Members:

Joel Mikazes, Chair  
Alison Vick, Secretary  
Violet Bethuy  
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Wayne Odell

Mikado Township Board

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MIKADO TOWNSHIP  
LAND USE MASTER PLAN

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## Chapter 1 - Introduction

### Purpose and Planning Process

The purpose of the Mikado Township Land Use Master Plan is to provide guidelines for future development within the community, while protecting the natural resources and rural township character. The Township Planning Act 168 of 1959 authorizes townships to develop comprehensive or master plans. As stated in the enabling legislation : *The purpose of plans prepared pursuant to this act shall be to promote public health, safety and general welfare; to encourage the use of resources in accordance with their character and adaptability; to avoid the overcrowding of land by buildings or people; to lessen congestion on public roads and streets; to facilitate provision for a system of transportation, sewage disposal, safe and adequate water supply, recreation and other public improvements; and to consider the character of each township and its suitability for particular uses judged in terms of such factors as the trend in land and population development.*

This plan presents background information on social and economic data, natural resources, existing community services and facilities, and existing land uses. The background information is used to identify important characteristics, changes and trends in Mikado Township. A special community workshop was held to gather input from residents and landowners. Based on information gathered at this workshop and the background data, the Township Planning Commission developed goals and objectives. These goals and objectives, along with a series of maps including soils, ownership, existing land use, and zoning, provide the basis for the Future Land Use Map. The future land use map recommends locations for various types of future development within the Township.

The Land Use Master Plan was developed by the Mikado Township Planning Commission with the assistance from the Northeast Michigan Council of Governments (NEMCOG). The plan looks at a twenty year planning horizon, with suggested revisits every five years or sooner if needed. A series of planning workshops were held over the two year period. Workshops were advertised in the local newspaper as well as the Mikado Township Newsletter. All workshops were open meetings with public welcomed and encouraged to comment on the plan.

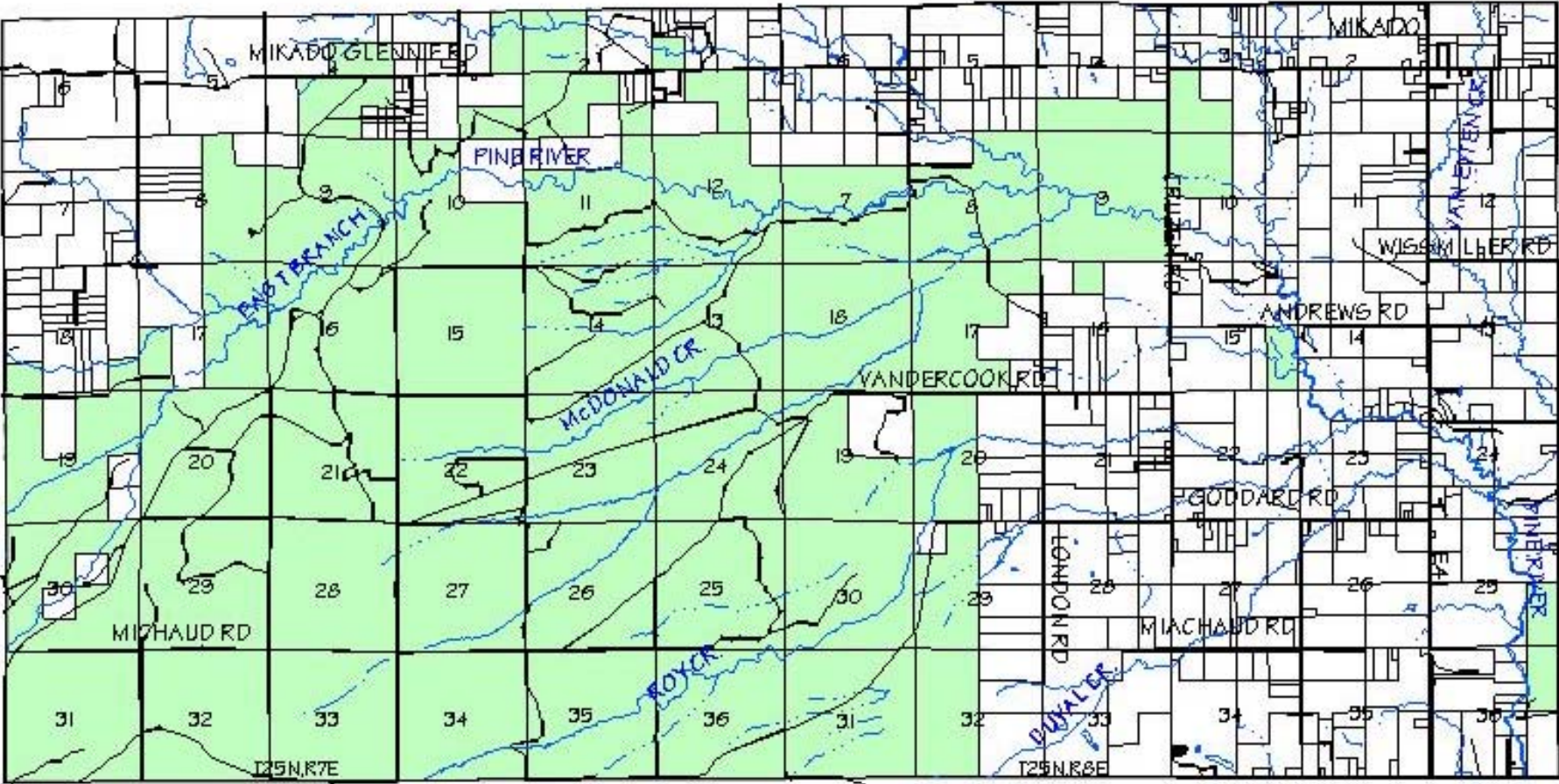
### Location and Regional Setting

Mikado Township is located in the southern part of Alcona County. The County is located in the northeastern lower peninsula of Michigan. **Figure 1.1** shows the location of the Township and County. Oscoda Township in Iosco County borders Mikado Township to the south, and Curtis Township to the west, Greenbush Township to the east and Gustin and Millen Townships to the north, which are all in Alcona County. The Township geographic area covers nearly 72 square miles (6 x 12 miles). **Figure 1.1** shows a base map of Mikado Township that depicts roads, ownership, state lands and water features.

### Brief History

The history of Mikado Township shows a chronological progression from pre-settlement virgin pine and hardwood forests to fairly intense lumbering followed by limited farming; and today a quite rural community with a mix of year round and seasonal residences that provides an

Figure 1.1 - Base Map of Mikado Township, Alcona County



abundance of outdoor recreational opportunities. People who live in the township typically work in Harrisville, Lincoln or Oscoda. The seasonal residents are either retirees who spend the summer months in the area or persons who own recreational properties "up north" and may spend weekends and vacations in the area.

Mikado celebrated its centennial in 1986; today the community is 116 years old. This brief account of Mikado history is taken from articles written by Georgia Wissmiller and W.S. Kahn. The article by Wissmiller is based on accounts of B. Daniel L. Bruce, son of Daniel D. Bruce who founded the Village of Mikado. Like in much of northeast Michigan, the virgin timber drew lumberjacks and businessmen to the region. Bruce purchased land west of Greenbush from the U.S. Government. The property, located adjacent to a railroad, was surveyed and mapped in 1884. A map of Bruce Plat and accompanying legal documents were registered that year. The following year, Daniel built the Bruce Hotel and Livery stable. With the influx of lumberjacks and families, the hotel and small community thrived. The young community was called West Greenbush. Mr. Bruce petitioned railroad officials to make the railroad crossing at West Greenbush an official stop. In 1886, with \$360 in hand, he met with railroad officials in Tawas and finally received their assurance the train would stop at the crossing.

That same year, Daniel Bruce wrote to the Postmaster General in Washington D.C. suggesting the name of "Bruce's Crossing" for the new village. There was already a town by that name in the Upper Peninsula, so a different name was chosen by the Assistant Postmaster General. The town was named Mikado after the Gilbert and Sullivan Operetta. Which is how a town in northeast came to have a Japanese name.

The area was inhabited long before the "landlookers" and lumberjacks arrived. An archeological treasure, called the Mikado Earthworks can be found in the western part of the Township. Loggers discovered the earthen remnant of an Indian village-fortification in the 1800's. According to an Article from the Harrisville Review, " Currently, all that is there to be seen is a mound of dirt, that runs in a horseshoe formation with a gully in the center. Post molds, dark stained dirt, where posts once stood, have been found along the top of this prehistoric "foundation." This indicates that the fort was palisaded, enclosed by wooden stakes. The circumference around the top of the footings is 1000 feet. The earthwork has a total enclosed area of 96,000 square feet."

Soils have always played a significant role in the development of the Township. Today, the eastern and western parts of the Township vary greatly in landscape and land cover. The pre-settlement vegetation in the western part was dominated by jack, red and white pine. The sandy droughty soils offered little hope for farming. As a result, after logging in the late 1800's the land reverted to the federal government. Much of this area is now under the jurisdiction of the U. S. Forest Service. . The Pine River Kirtland's Warbler Management Area is located in Mikado Township. This is one of seven Kirtland's Warbler management units in the Huron National Forest.

As farmers followed the loggers into the eastern part of the Township, small family farms spread across the landscape. For many decades, Mikado Township remained a quiet farm community. However, like many small farm communities in northern Michigan, the family farm based economy has transitioned to residents commuting to other communities for employment.

With increased mobility and the transition in local employment, many of the small service businesses have closed. Still residents consider Mikado as their village center.

### **The Status of Planning and Zoning in Mikado Township**

Township has exercised its legal right to establish and administer local zoning as authorized by the Township Rural Zoning Act (PA 184 of 1943.) The first zoning ordinance was adopted by the Township Board on April 28, 1966. A major revision was completed and adopted on July 22, 1983. The current zoning ordinance regulating land use activities was enacted by the Mikado Township Board on August 1, 1994. The most recent amendment was adopted on February 9, 1998. For over 18 years, the ordinance has provided guidance in regulating the location, density and standards for local development.

Mikado Township has recognized the importance and need to develop its first Land Use Master Plan. Two key issues are to provide a legal foundation for the Township Zoning Ordinance and to manage for anticipated growth within the Township. By documenting existing conditions such as environment, socio-economic, communities services, transportation, recreation, and land use within a master plan, the Township will be able to formulate appropriate land use goals and policies to guide development, and serve as the basis for enforceable zoning. The master plan will in turn be used as a basis for re-examining the Township's zoning districts and land use development controls.

## Chapter 2 - Social And Economic Characteristics

One of the most important steps in understanding the future needs of a community is an analysis of population, households, housing, income, education and employment characteristics. Most of the information presented in this chapter is derived from the U. S. Census Bureau. Data gathered from the 2000 Census has not been fully compiled and made available, therefore, information presented in this chapter reflects statistics from the 1990 and 2000 U.S. Census.

### Population Trends

The 2000 U. S. Census showed the year round population of Mikado Township was 1,043 persons (554 male and 489 female), representing a population density of 14.6 persons per square mile. In 2000, the population density for the State as a whole was significantly higher at 172.7 persons per square mile.

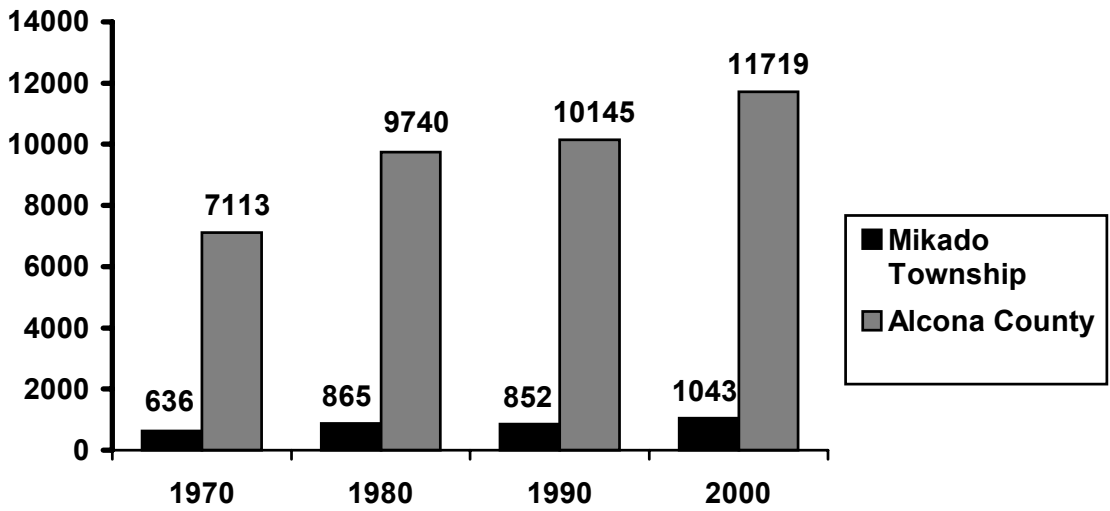
It is important to note the U. S. Census population figures do not include the seasonal population of the township. Since the census is taken in April, persons who's primary home is elsewhere are not counted in Mikado Township. The figures presented for housing characteristics show that 34.4 percent or 229 housing units are listed as seasonal, recreational or occasional use homes. Therefore, it can be assumed that the Township's resident population can significantly increase during peak periods in the summer months. Using the 2.6 persons per household for Mikado Township and the 229 seasonal homes, peak seasonal population could increase by approximately 595 persons.

Population trends for permanent residents of Mikado Township from 1970 to 2000 are shown in **Table 2.1 and Figure 2.1**. In 1970, the Township population was 636. By 2000, the population had increased to 1,043, a 64 percent increase over the 1970 population level. During the same time period, the population of Alcona County increased from 7,113 to 11,719 (65 percent increase). Between 1990 and 2000, Mikado Township was the third fastest growing community in Alcona County, both in terms of percent growth and actual numbers.

<b>Table 2.1</b> <b>Population Trends for Permanent Residents</b> <b>Mikado Township and Alcona County, 1970 – 2000</b>							
	1970	% change 1970-80	1980	% change 1980-90	1990	% change 1990-2000	2000
Mikado Twp.	636	36.0	865	-0.6	859	22.4	1,043
Alcona County	7,113	36.9	9,740	4.2	10,145	15.5	11,719

Source: U.S. Census Bureau

**Figure 2.1  
Population Trends for Permanent Residents**



**Age Distribution and Racial Composition**

A community should consider the age distribution of its population when planning for community-wide services and special services targeting certain age groups. For example, younger families typically require access to rental housing or affordable housing as first homebuyers. An elderly population may need access to public transportation, senior housing facilities, nursing homes and in-home health care.

Age distribution statistics for Mikado Township, Alcona County and the State of Michigan from the 2000 Census are compared in **Table 2.2**. Data shows the median age for Township residents is 8.5 years younger than the median age of residents of the County, and five years older than median age for State residents. Over twenty-two percent of the Township’s Population is 60 years and older. Whereas, approximately 16 percent of the State’s population and 33 percent of the County’s population is 60 years and older. Sixteen percent of the Township’s residents are in their retirement years. The 25-44 year age category is typically associated with child rearing and can equate to a higher need for schools and recreational facilities. The percent of the Township’s residents in this age category is 5.1 percent higher than Alcona County and 3.8 percent lower than the State of Michigan.

According to the 1990 U. S. Census, the racial make up of the Township and County population is relatively homogeneous. Ninety-eight percent of the County and 96.6 percent of the Township population was classified as white as compared to 80.2 percent of the State’s population. **Table 2.3** compares the Township’s racial composition to that of Alcona County and the State of Michigan. Of the 1,043 residents of Mikado Township 1008 were white, 24 were American Indian, Eskimo or Aleut and 10 were two or more races.

<b>Table 2.2</b> <b>Age Distribution</b> <b>Mikado Township, Alcona County, State of Michigan – 2000</b>					
Age Group	Twp. Pop.	Twp. %	Co. Pop.	Co. %	State %
Under 5	64	6.1	505	4.3	6.8
5-19	222	21.3	1,927	16.4	22.2
20-24	34	3.3	330	2.8	6.5
25-34	105	10.1	929	7.9	13.7
35-44	166	15.9	1,526	13.0	16.1
45-54	154	14.8	1,658	14.1	13.8
55-59	67	6.4	968	8.3	4.9
60-64	64	6.1	1,010	8.6	3.8
65 & over	167	16.0	2,866	24.5	12.3
<b>TOTALS</b>	<b>1,043</b>	<b>100.0</b>	<b>11,719</b>	<b>100.0</b>	<b>100.0</b>
Median Age	40.5		49.0		35.5

Source: Table 1, 2000 Census, U.S. Bureau of the Census, Summary File 1

<b>Table 2.3</b> <b>Racial Composition</b> <b>Mikado Township, Alcona County, State of Michigan – 2000</b>						
Race	Mikado Twp.		Alcona Co.		State	
	#	%	#	%	#	%
White	1,008	96.6	11,489	98.0	7,966,053	80.2
Black	0	0.0	19	0.2	1,412,742	14.2
Native	24	2.3	73	0.6	58,479	0.6
Asian	0	0.0	21	0.2	176,510	1.8
Other	1	0.1	7	0.1	129,552	1.3
2 or more	10	1.0	109	0.9	192,416	1.9
<b>Total</b>	<b>1,043</b>	<b>100.0</b>	<b>11,719</b>	<b>100.0</b>	<b>9,938,444</b>	<b>100.0</b>

Source: Population and Housing Summary File 1, 2000 Census, U.S. Bureau of the Census

## Disability Status

The 1990 U. S. Census contains information on the disability status of non-institutional persons. A review of this data is necessary to assess the need for services such as public transportation and in-home health care. There were twelve people, age 16 to 64 years, in the Township with a mobility or self care limitation and 68 people with a work disability. Of the 127 persons 65 years and older, living in the Township, fifteen had mobility or self-care limitations.

## Households

Census data from 2000 showed that Mikado Township had an average of 2.6 persons per household, as compared to 2.24 and 2.56 persons per household for Alcona County and State of Michigan, respectively.

U.S. Census data showed a total of 397 households in Mikado Township, of which 297 are family households and 100 are non-family households. A non-family household is a household with one person or a household with non-relatives living together. Some 64.2 percent of Mikado Township's households were classified as married couple families, whereas, married couple families made up 60.1 percent of County households, and married couple families accounted for 51.4 percent of households in Michigan.

## Income and Wealth

Income statistics in the 1990 U. S. Census actually reflect income levels for the year of 1989. The median household income for Mikado Township was \$18,409 per year. The median household income for Alcona County was \$18,013 and the State was \$31,020 per year. Median household income includes both family and non-family households. Typical of rural townships in Northeast Michigan, the median household income is nearly 60 percent of the State as a whole, but \$396 more than the County. The U. S. Bureau of Census estimates the 1995 median household income for Alcona County was \$23,818 and for the State of Michigan \$35,940.

The median family income for the Township was \$22,841. This was nearly \$2000 higher than Alcona County as a whole, \$13,811 lower than the statewide median family income. **Table 2.4** compares median household income, median family income, per capita income and poverty levels for the Township to the County and State. The per capita income (income averaged per person) was \$8,466 in Mikado Township, approximately two-thirds the per capita income for the State of Michigan.

In 1989, 23.3 percent of the families in Mikado Township were living below poverty level as compared to 17.3 and 10.2 for the County and State respectively. In the Township, families with related children under 18 years old, some 25.2 percent were living below poverty level. The percent was even higher (30.8%) for families with related children under five years old.



<b>Table 2.4 Income Statistics for Township, County and State – 1989</b>				
Governmental Unit	Median Household Income	Median Family Income	Per Capita Income	Percent of Families Below Poverty Level
Mikado Twp.	\$18,409	\$22,841	\$8,523	23.3
Alcona County	\$18,013	\$20,925	\$9,466	17.3
State of Michigan	\$31,020	\$36,652	\$14,154	10.2

Source: Table 9, 1990 CPH-5-24, U.S. Bureau of the Census

**Education**

Education is an important factor in analyzing the capabilities of the local work force and future income potential. The U.S. Census Bureau tracks educational attainment for persons 25 years of age or older. Statistics from the 1990 Census indicate that 71 percent of Mikado Township residents were high school graduates or higher, as compared to 69 percent for Alcona County and 77 percent for the State as a whole. Just under four percent of the Township residents had a bachelor's degree or higher. See **Table 2.5** for a comparison of educational attainment between the Township and the County and State.

<b>Table 2.5 Educational Attainment Township, County, And State - 1990</b>		
Place	High School Graduate Or Higher	Bachelors Degree or Higher
Mikado Township	71.2%	3.7%
Alcona County	68.6%	9.0%
State	76.8%	17.4%

Source: U.S. Bureau of the Census

**Employment**

The employment data presented in this section reflects place of residence, not location of employment. Due to limited employment opportunities within the Township, most residents work outside the community, in Harrisville, Lincoln and Oscoda, and to a lesser extent in Alpena and Grayling. The Michigan Employment Services Agency (ESA) publishes annual employment data and unemployment data on the civilian labor force. This is presented in **Table 2.6**, which compares Mikado Township, Alcona County and the State of Michigan for the years 1998-2000. The unemployment rate for Mikado Township and Alcona County ranged between 6.5 and 7.9 percent for those years, whereas, statewide unemployment rates ranged between 3.6 and 3.9 percent.

**Table 2.7** shows employment by occupation for residents of the township and county. The source of this data is the U. S. Bureau of Census, 1990 Census. These figures show that percentage-wise residents of Mikado Township are occupied in roughly the same occupational

groupings as the county as a whole. By placing the occupational groupings into the categories of "professional/administrative", "service", "manufacturing" and "farming/forestry", one finds that approximately 80 percent of the residents of both Mikado Township and Alcona County worked in one of the first three categories, while less than five percent worked in farming or forestry.

<b>Table 2.6</b> <b>Civilian Labor Force Comparisons</b> <b>Mikado Township, Alcona County, State of Michigan</b> <b>1997 – 1999</b>									
	Township			County			State (in 1,000s)		
	1998	1999	2000	1998	1999	2000	1998	1999	2000
Labor Force	475	475	450	5,150	5,100	4,950	5,029	5,136	5,201
Employ.	450	450	425	4,775	4,700	4,625	4,835	4,942	5,016
Unempl.	25	25	25	375	400	325	194	194	185
Unempl. Rate	7.1%	7.8%	6.5%	7.1%	7.9%	6.7%	3.9%	3.9%	3.6%
Note: All numbers rounded to the nearest 25. Source: Michigan Department of Career Development									

### Housing Stock and Property Values

Data from the 2000 Census shows a total of 666 housing units in Mikado Township. The breakdown of housing types is not currently available from the 2000 Census. For reference purposes, the 1990 Census identified: 449 single-family units and 121 mobile homes. No multiple-family units were counted in 1990. The mean number of rooms for Township housing is 5.4 rooms per unit. The Census Bureau's measure of possible overcrowding is more than 1 persons per room. Only 8 Township housing units, or less than two percent (1.4%), fall into the overcrowded category.

As mentioned in the discussion on population, housing characteristics for Mikado Township suggest an increased summer population. The abundant water, woodlands and wildlife have attracted people to the area, many of whom reside in the Township as seasonal and weekend residents. Over 34.4 percent of the housing units (229 units) in the Township were considered seasonal in 2000 Census. As noted earlier, The population levels in the Mikado Township, like many northern Michigan communities, greatly increases during peak summer vacation times. In contrast, 47.9 percent of the housing units in Alcona County and only 5.5 percent of the housing statewide is classified as seasonal. **Table 2.8** compares the Township, County and State, contrasting the total housing units with those designated as seasonal units. Housing stock in Mikado Township tends to be owner-occupied, with renter-occupied housing accounting for 9.3 percent of the total housing units.

<b>Table 2.7 Employment by Occupational Group and Place of Residence, 1980 – 1990</b>				
Occupation	Mikado Township		Alcona County	
	1990		1980	1990
	#	%	#	%
Executive, Administrative, & Managerial	27	8.9	273	8.4
Professional & Technical	24	7.9	405	12.4
Sales Occupation	24	7.9	313	9.6
Administrative Support	49	16.2	440	13.5
Protective Service	3	1.0	53	1.6
Service Workers, including Private Households	44	14.5	522	16.0
Farming, Forestry, and Fishing	14	4.6	169	5.2
Precision Production	51	16.8	456	14.0
Machine Operators	31	10.2	266	8.2
Transportation and Material Moving	12	4.0	195	6.0
Handlers and Laborers	24	7.9	164	5.0
<b>Total</b>	<b>303</b>	<b>100.0</b>	<b>3,256</b>	<b>100.0</b>
Source: U.S. Bureau of Census note: percentages may not add up to 100 due to rounding.				

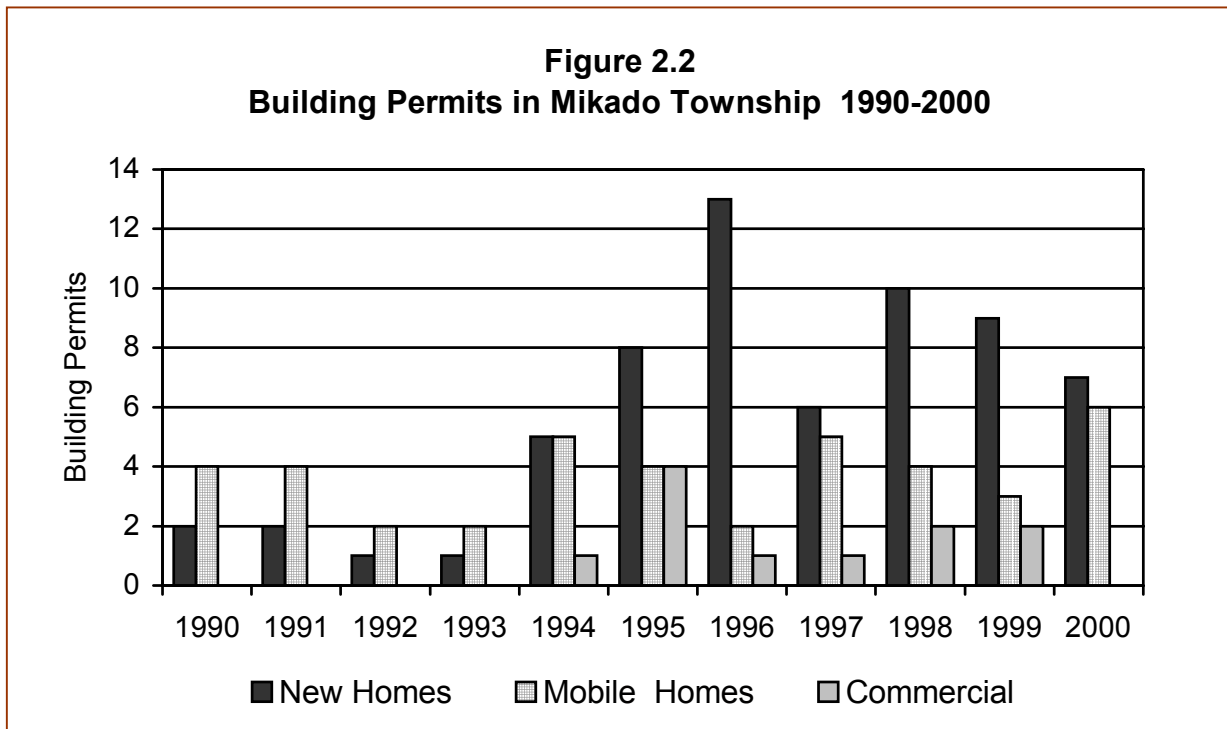
<b>Table 2.8 Seasonal Housing Characteristics Mikado Township, Alcona County and State of Michigan – 2000</b>			
Geographical Area	Total Units	Seasonal Units	Seasonal %
Township	666	229	34.4
County	10,584	5,067	47.9
State	4,234,279	233,922	5.5
Source: Table 7, Summary File 1, 2000 Census, U.S. Bureau of the Census			

Other characteristics of township property value can be obtained by analysis of State Equalized Value (SEV) figures. By law, the SEV, which constitutes a community's tax base, is equal to approximately one-half of the true market value of real property and certain taxable personal properties. The Alcona County Equalization Department compiled the information presented in **Table 2.9**. In Mikado Township, over 21 million dollars or 79 percent of the total real property SEV is classified as residential by the Equalization Department. Agricultural accounts for 13.3 percent of the Township's total real property SEV. The Mikado Township accounts for 4.0 percent of the counties total real and personal property SEV.

### Building Permits and Estimated Growth

According to the number of building permits issued, there has been a relatively steady growth in residential development in Mikado Township over the last eleven years. **Table 2.10 and Figure 2.1** shows the number of building permits issued for new homes, mobile homes, pole buildings and sheds, garages, and commercial enterprises for 1990 through 2000. A total of 64 permits were issued for new homes and 41 permits were issued for mobile homes. That amounts to an 18 percent increase in the number of housing units since the 1990 U.S. Census. Since 1995 between 11 and 15 building permits have been issued each year for residential units. Commercial development has been minimal with 11 permits issued between 1990 and 2000.

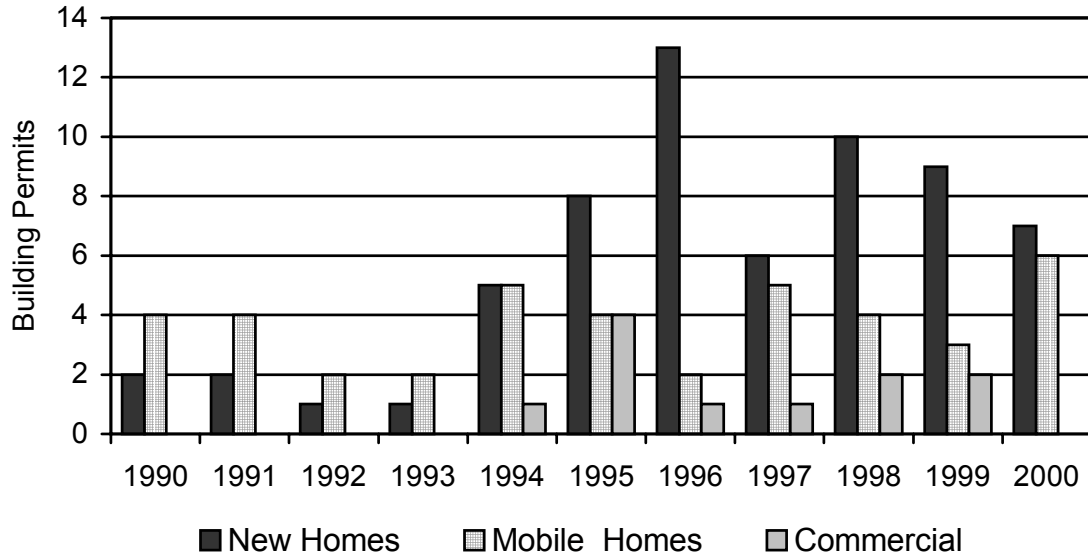
The new residential development since 1990 gives some indication of population growth since the last U.S. Census. One hundred and five housing units have been developed in the Township since 1990. Considering the 2.6 persons per household state wide average, potentially 273 persons have been added to the population.



<b>Table 2.9</b> <b>Distribution of SEV</b> <b>Mikado Township and Alcona County – 2001</b>			
Real Property	Mikado Township		Alcona County
	Amount	% of County Total SEV	Amount
Agricultural	3,583,900	8.0	42,296,003
Commercial	445,000	2.0	23,346,025
Industrial	N/A	N/A	15,486,900
Residential	21,294,700	4.0	518,720,499
Timber Cutover	1,636,400	3.0	48,595,777
Developmental	N/A	N/A	N/A
Total Real	26,960,000	4.0	648,445,204
Personal	988,300	4.0	27,424,850
<b>TOTAL SEV</b>	<b>27,948,300</b>	<b>4.0</b>	<b>675,870,054</b>
Source: Michigan Department of Treasury, State Tax Commission			

<b>Table 2.10</b> <b>Building Permits Issued</b> <b>Mikado Township, 1990 - 2000</b>					
Year	New Homes	Mobile Homes	Pole Buildings & Sheds	Garages & Carports	New Commercial
1990	2	4	2	3	0
1991	2	4	3	5	0
1992	1	2	4	4	0
1993	1	2	3	5	0
1994	5	5	8	7	1
1995	8	4	3	2	4
1996	13	2	5	11	1
1997	6	5	10	5	1
1998	10	4	10	5	2
1999	9	3	9	8	2
2000	7	6	12	9	0
Source: Alcona County Building Department					

**Figure 2.2**  
**Building Permits in Mikado Township 1990-2000**



## **Chapter 3 - Community Services and Facilities**

Key factors that contribute to the quality of life of a community are the type and variety of services available to residents and visitors. Unlike more populated communities, smaller rural communities do not have the financial resources to provide many of the services that would normally be considered essential. In the case of fire and ambulance, many rural communities work cooperatively with adjacent communities to provide essential services.

This chapter of the Master Plan will identify the types and extent of services available to residents and businesses in Mikado Township. Although these services may be sufficient for the needs of the current population, future development may increase the demand to upgrade or expand the services and facilities to maintain a satisfactory living environment.

### **Water and Sewage Disposal**

Mikado Township does not provide public water or sewage disposal systems for Township residents. The residents and business owners must rely on on-site private wells for domestic drinking water needs and private on-site septic systems for wastewater disposal. District Health Department # 2 regulates and maintains a permitting system for private wells and septic systems. Two important determinants for siting a septic system are soil types and steepness of slopes. Chapter 4 - Natural Resources discusses the soils of the Mikado Township.

### **Waste Disposal**

Residents and business have two options for disposing of their garbage. Waste Management and Travis Sanitation offer trash pick-up service. Persons can also haul their trash to transfer stations in Iosco County, and the Hubbard Lake Road Transfer Station in Alcona County. The Whitefeather Landfill in Pinconning and the Montmorency-Oscoda-Alpena Landfill in Loud Township, Montmorency County are used for final disposal of garbage generated in Mikado Township.

A county coordinated effort called "Alcona Clean-up Day" is cosponsored by Mikado Township. The Township contributes \$1,500 to the clean-up day that occurs in early May. Volunteers collect metal, tires and appliances. There are two salvage yards in the Township.

Recycle Alcona County (RAC) is a non-profit, volunteer based organization, has been offering county residents the opportunity to recycle household waste for approximately ten years. A drop-off service is available the second Saturday of each month at the Lincoln Recreation Center in Lincoln. Donations, along with the sale of recyclable materials, fund the operation of the recycling program. Approximately four tons of recyclable materials are collected and processed each month. The following items are presently collected: #1 & #2 plastics, cans and tin, clear, green and brown glass, Styrofoam, #6 polystyrene, brown paper grocery bags, box board, corrugated cardboard, newspaper, magazines, and white office paper.

## Utility Services

Due to the large amount of public land and internal parcels (parcels in the center of a section that does not abut a public road), utility services are lacking in some areas of the township. The costs of providing telephone service to isolated residences can be prohibitively high. Since these landowners must pay the cost of running the lines, some have chosen not to bear the expense, instead relying on cellular telephones.

Michcon provides natural gas service within the community of Mikado, and north and south along County Road F-41. Cable television service is provided by Charter Communications within the "village proper."

Verizon Phone provides telephone service to the largest geographic area of the Township. A small area around Bean Hill is serviced by Centurytel. Due to the costs of extending telephone line across private lands and large tracts of public lands, large areas in the Township do not have telephone service.

Consumer's Energy provides electricity to the developed areas within the Township.

## Transportation

The transportation network consists of county primary and secondary roads; seasonally maintained, unimproved public roads; and private roads.

The primary road network is made up of County Road F-41, F-30 (Mikado-Glennie Road) and Kings Corner Road east of F-41. Paved local roads include Cruzen and Wissmiller Roads and segments of Goddard, Alvin, Michaud and Vandercook Roads. The balance of the transportation network are gravel, dirt and two-track roads including public and private roads. Primary and local roads are under County jurisdiction, and are maintained by the Alcona County Road Commission.

Money for maintaining county roads comes from state and local sources, including Mikado Township. The Township is working under a four year capital improvements road plan. A 2 mil road millage generates approximately \$38,000 each year for road work. The Township pays 50 percent of the cost of upgrading roads to a paved surface. F-41 has been upgraded to a Class "A" road. All other roads have seasonal weight restrictions during "spring break-up." There are designated seasonal roads (not maintained from October to May) in the Township. However, sections of a road may be plowed upon special request from landowners.

Another major transportation issue in the Mikado Township is the repair and upgrading of bridges. Nine of the 13 bridges in the Township have been upgraded or replaced. The Township contributes 5 percent , up to \$15,000 for bridge replacements.

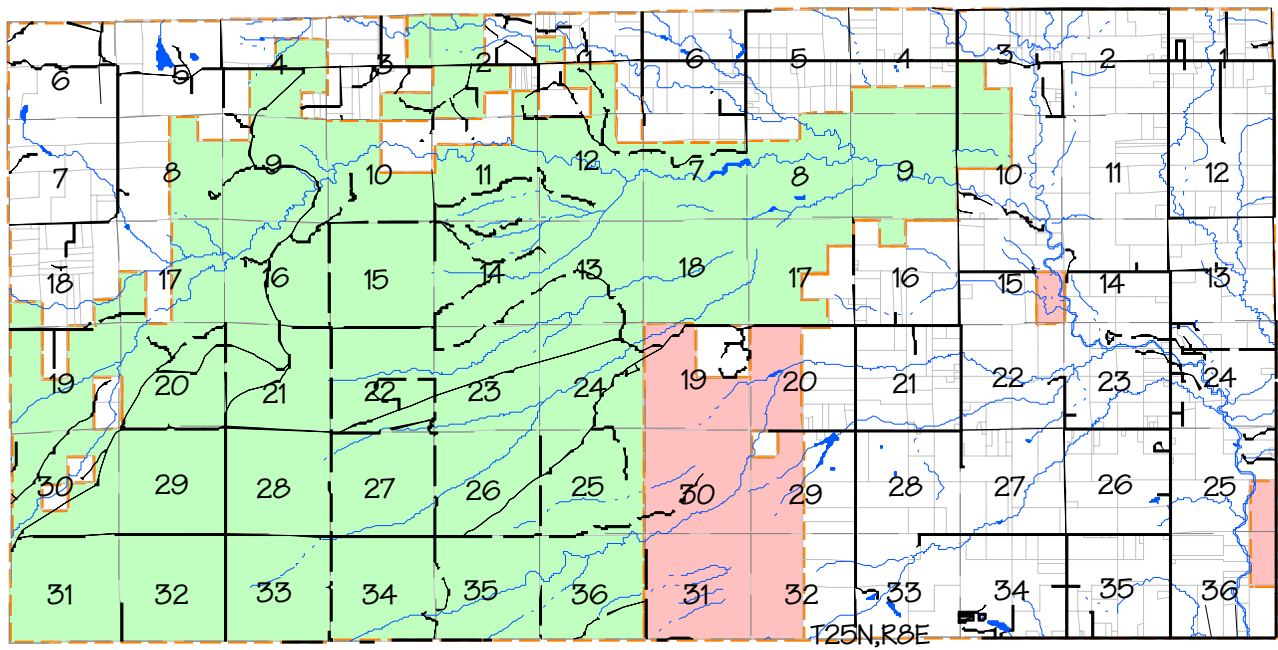
There is no county-wide dial-a-ride bus service available in Alcona County. However, Thunder Bay Transportation, based in Alpena, provides limited specialized transportation services in the County.



Regional air service is available at Alpena County Regional Airport in Alpena, M.S.B. Airport near Midland and Cherry Capital Airport in Traverse City. Harrisville has an airport facility for private planes.

**Public Lands and Buildings**

The Mikado Civic Center and the Township Fire Hall are the only public buildings in the Township. The Mikado Civic Center was dedicated in 1978. The Mikado Area Development Corp. led the efforts to raise needed funds to construct the civic center. The \$80,000 raised locally, combined with considerable donated labor, enabled the Township to construct the building without federal grants, local levied taxes or CETA funds. This is a fine example of a community pulling together to help itself. The amount and uses of the public lands in the Township will continue to play significant roles in the character and future of the community. Approximately 52 percent of the land in the Township is publicly owned. **Figure 3.1** is a map depicting public and private ownership. The largest public landowner is the U.S. Department of Interior. Some 32.7 square miles or 46 percent of the Township are under jurisdiction of the U.



**OWNERSHIP TYPE**  
 STATE OF MICHIGAN  
 PRIVATE  
 USA

Figure 3.1: Public Lands

S. Forest Service and are part of the Huron-Manistee National Forest. The Huron Shores Ranger Station located in Oscoda oversees management of the U.S. Forest Service land in Mikado Township. The State of Michigan owns 4.5 square miles of land in the eastern one half of the Township. These lands are under the jurisdiction of the Forest Management Division of the Michigan Department of Natural Resources.

## **Schools Libraries and Museums**

Mikado Township is part of two school districts. Students in the Alcona School District attend K-12 classes in Lincoln. The Alcona School District is part of the Alcona Montmorency Alpena Intermediate School District. Students within the Oscoda School District attend classes in Oscoda. The Oscoda School District is located in the Iosco Intermediate School District.

Kirtland Community College (KCC) located in Roscommon and Alpena Community College (ACC) located in Alpena, are two-year institutions serving the higher education needs of area residents. Alpena Community College's main campus is located in City of Alpena. Their Huron Shores Campus in Oscoda serves residents in and around Iosco County. Spring Arbor offers classes at the Huron Shores Campus, as well, high school students can take college level classes at the campus. ACC offers two-year degrees, one-year certificates, and customized training. The college offers Associate in Arts, Associate in Science, Associate in Applied Science and Associate in General Studies Degrees. Additionally, the World Center for Concrete Technology has an associate degree concrete technology program and the Blockmakers Workshop program at ACC's campus in Alpena. Alpena Community College is also a member of the Michigan Community College Virtual Learning Collaborative and offers selected courses online to students who have difficulty attending classes on campus.

Kirtland Community College offers associate degrees and certificate programs in automotive, business, cosmetology, criminal justice, health occupations, industrial technologies, and office information systems as well as associate/transfer degrees in arts, fine arts, business, administration, criminal justice, computers and science.

A full service branch of the Alcona County Library is located in the Mikado Civic Center. The Alcona County Library system is part of the Northland Library Cooperative. The cooperative has a regional book catalog and offers inter-library book loans between member libraries. Reference staff are available at the library cooperative main office to assist users at all member library locations. The Mikado Branch is open Monday and Tuesday from 12:00 to 4:00 and Wednesday and Thursday from 3:00 to 7:00. Along with kids through adult reading materials, internet access is available on computers provided by a Gateway grant program. The township provides space, electricity and heat to the Mikado branch library. The Alcona County Library system is funded in part by a county-wide millage established in 1994.

There are no museums located in Mikado Township.

## **Churches and Cemetery**

The Mikado Township Cemetery is located on F-30 east of Mikado in Section 1 of T.25 N.-R.8E. There is adequate space available on the existing property to expand the cemetery.

St. Raphael's Catholic Church and Calvary Baptist Church are located in Mikado Township. Residents also drive to adjacent communities to attend church services.

## **Public Safety**

Law enforcement protection for Mikado Township is the responsibility of the Alcona County Sheriff Department and the Michigan State Police. The Alcona County Sheriff Department is located in Harrisville. State Police Posts are located in Alpena with a substation in Lincoln.

The Mikado Township Fire Department's coverage area is 90 square miles. Along with the entire geographic area of the Township, 18 square miles of Gustin Township is covered through a contractual arrangement. Mikado Fire Department also provides mutual aid to Greenbush Township, Village of Lincoln, Curtis Township and Oscoda Township.

A millage (.5 mills) generates funds to cover costs associated with operation of the fire department. The Mikado Township Fire Department has a 1979 Ford Tanker, 1972 GMC Tanker, 1968 Pumper fire engine, and one brush truck. Mikado has applied to the Federal Emergency Management Agency (FEMA) for funding to replace the 33 year old pumper fire engine and 25 self contained breathing apparatus. The Township Fire Department has a 1986 Ford ambulance that is used as a first responder unit. Advanced life support service is provided by Alcona County EMS. The countywide enhanced 911 emergency service, operated from the Alcona County Sheriff Department, is available for all county residents.

### **Medical Facilities**

There are no medical facilities located in Mikado Township. Clinics, doctor and dentist offices are located in other communities such as Oscoda, Tawas, Harrisville, Lincoln and Alpena. The Alcona Health Center is located in Lincoln and the VA Health Center is located in Oscoda. For health care services not available at these facilities, residents travel to Alpena General Hospital in Alpena, Grayling Mercy Hospital in Grayling, Tollfree Memorial Hospital in West Branch, Tawas St. Joseph Hospital in Tawas City and Munson Medical Center in Traverse City.

District Health Department #2 is often able to fill health care needs of the community, which are not available or affordable elsewhere. The Health Department service area includes Alcona, Iosco and Oscoda Counties. Programs offered by the Health Department fall under three categories: home health care services, environmental health services and personal health services.

Northeast Michigan Community Mental Health provides support services to developmentally disabled persons as well as persons needing mental health services. The Northeast Michigan Community Mental Health service area covers Alcona, Alpena, Montmorency and Presque Isle Counties.

### **Recreational Facilities**

Bruce Park is a Township park located in the community of Mikado. This park receives minimal usage and maintenance. A ball field adjacent to the Township Civic Center is maintained by Mikado Area Recreation. The ball fields located on Township property off Barlow Road had been closed, although the community is planning to reopen the ball fields in 2001-2002.

The US Forest Service operates a primitive campground on the South Branch of the Pine River. The facility has 11 campsites, pit toilets, hand pump water, and a picnic shelter with grills, tables and parking. The campground is open Memorial Day to Labor Day. There is a nominal fee for camping, day use is free. The countryside nearby is considered prime viewing habitat for the endangered Kirtland Warbler. A snowmobile trail head is located in Section 19 of T.25N.-R.8E. on U.S. Forest Service Property. The trail runs south and west connecting to a larger regional network of state snowmobile trails.

The considerable amount of public land does offer residents and visitors ample area for a wide range of outdoor recreational activities. Persons wishing to pursue the sport of fishing can access the Pine River and its many tributaries such as Van Etten Creek, Duval Creek, Grey Creek, Roy Creek, McDonald Creek, McGillis Creek, Gimlet Creek, Bryant Creek, Wallace Creek, Kurtz Creek and Samyn Creek. There is one privately owned lake in the Township.

## Chapter 4 - Natural Resources

### Introduction

The woodlands, open spaces, wildlife, water, and rolling hills are several key resource values that draw people to both recreate and live in the Township. Abundant public lands offer access to thousands of acres of recreational lands for hunting, hiking, wildlife viewing and snowmobiling. Several small creeks and the Pine River provide opportunities for fishing, boating and water sports.

A rural landscape, abounding with views of farmland and forestland, typifies the community character of Mikado Township. Farm and forest lands are important to the local economy; recreational use and production of forest and farm goods bring dollars into the Community. Many long time visitors decide to move to the area upon retirement. These renewable yet priceless resources warrant special considerations when planning for future growth.

The protection and wise use of these natural resources is central to maintaining a sustainable community. Along with planning for the built-up infrastructure like roads and utilities, a community needs to plan for the green infrastructure; the forests, wetlands, farmland and water. Development, without consideration of carrying capacity of the land, can have long term negative impacts on the resources. When planning for future growth, the community must identify environmental constraints, such as wetlands, steeply sloped areas, ecological corridors and ground water recharge zones. This chapter will analyze the physical environment to assist local officials in developing the desired future of the Township. Natural resources addressed include climate, geology, topography, soils, water, vegetation and wildlife.

### Climate

The climate is yet another reason why people are drawn to the area. Typical of northern Michigan, the distinct four seasons offer an ever changing landscape. Long snowy, cold winters; and moderately warm summers are separated by a cool, green spring and a cool colorful fall. Located in the northeastern part of the northern lower peninsula, the eastern boundary of the Township is less than five miles inland from Lake Huron. Given this geographic location, the weather is influenced by the lake moderating effect of Lake Huron.

According to the USDA Soil Survey of Alcona County, the average annual precipitation is 29.46 inches (includes water equivalent of snowfall). Precipitation is heaviest during the summer months with 60 percent of the annual precipitation from April through September. The average annual snowfall is 49.5 inches. Records show a long term average of 93 days when there is at least one inch of snow on the ground. Of course, the number of days varies greatly from year to year. The average daily temperature ranges from 67.9 °F for the month of July to 20.0 °F during January. The average mid-afternoon relative humidity is 61 percent. Since humidity levels are highest at night, the average relative humidity at dawn is 83 percent.

## Geology

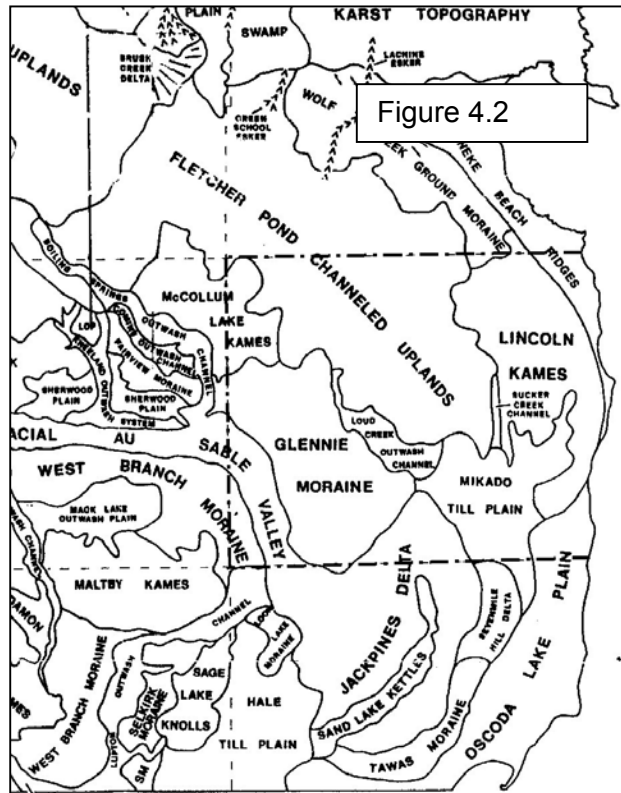
The rolling hills, river valleys, swamps and lakes were created by the retreating continental glacier some 12,000 years ago. Beneath this thick mantle of the glacial deposits lays a foundation of layered sedimentary bedrock. This section will describe the glacial landforms or quaternary geology and the underlying bedrock geology.

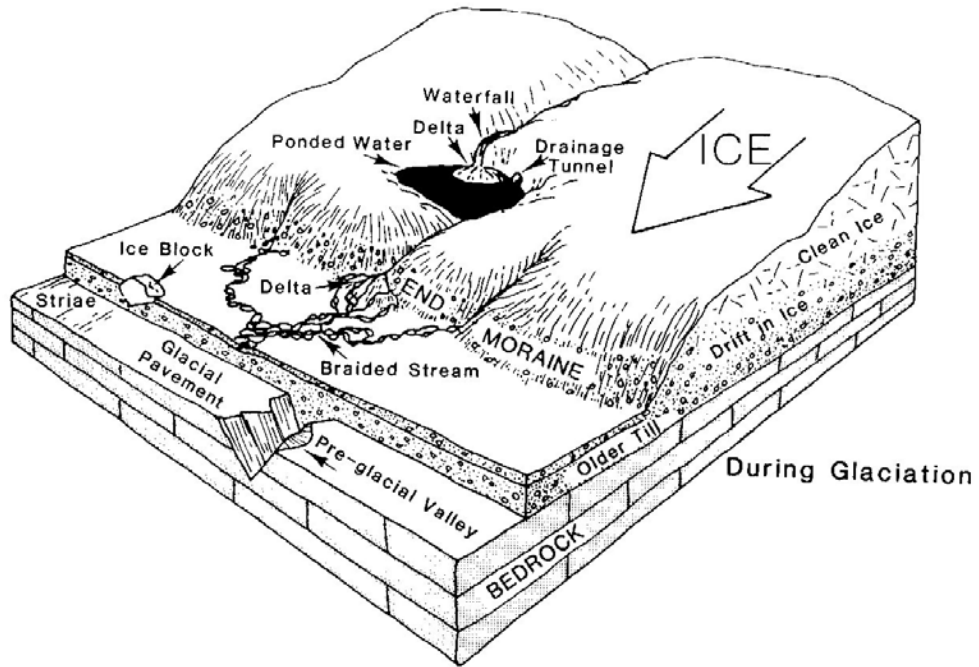
Starting some 2 million years ago, during the Pleistocene era, continental glaciers formed in the Hudson Bay area. Several times, over this two million year period, the massive sheets of ice built up and inched their way south across what is today Michigan. The massive ice sheets, more than one mile thick, advanced in a southerly direction, bulldozing their way across the landscape. The glacier pushed material in front of it, incorporated rocks and soil into the debris laden ice; and scraped, ground and broke apart the sedimentary bedrock of the Michigan Basin.

Each advance and retreat of the continental glaciers took tens of thousands of years. This reoccurring process shaped and reshaped the land; obliterating and then creating hills, valleys, rivers and lakes, swamps and marshes. The last glacial period, called the Wisconsin era, created the landscape we know today. The glacier left behind boulders, rocks, cobble, sand, gravel, silt, clay and loam. In some areas the material was deposited in unsorted masses called till plains, ground moraines and end moraines. Water flowing from the melting glaciers also sorted materials, creating outwash channels, sand deltas, kames and eskers. Fine materials, captured in the fast moving glacial meltwater, settled to the bottom of expansive glacial lakes creating lacustrine clay and silt plains. **Figure 4.1** shows the formation of glacial landforms.

According to a map prepared by W. A. Burgess and D. F. Eschman (**Figure 4.2**), titled "Landform Units in Northeastern Lower Michigan," Mikado Township is dominated by a sand delta and till plain, both created by the glacial meltwaters.

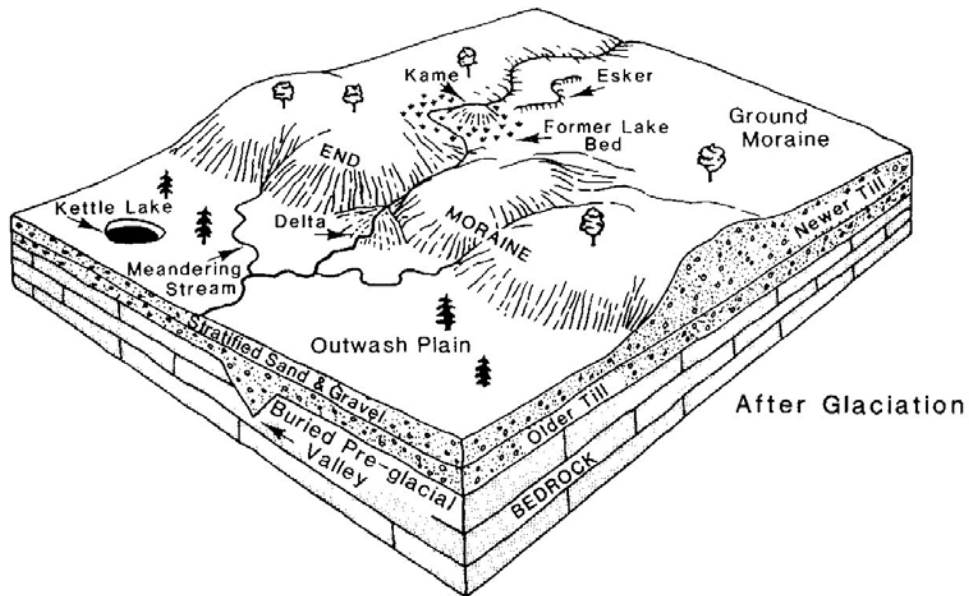
At the front of the massive retreating glaciers, large streams originated from the melting ice. The debris laden water carved through moraines and outwash plains creating wide drainageways and outwash channels. The AuSable River follows one of those large glacial river valleys. As the continental glaciers melted, water flowed across the landscape creating landforms and pooling into the expansive post glacial lakes. These emerging lake basins were the beginnings of our Great Lakes. During different periods, the post glacial great lakes were both much higher and lower than the lake levels we have grown accustomed to in recent times. Geologists have identified and named the different post glacial great lake stages.





During Glaciation

*Features originating at a glacier front occur in a definite order.*

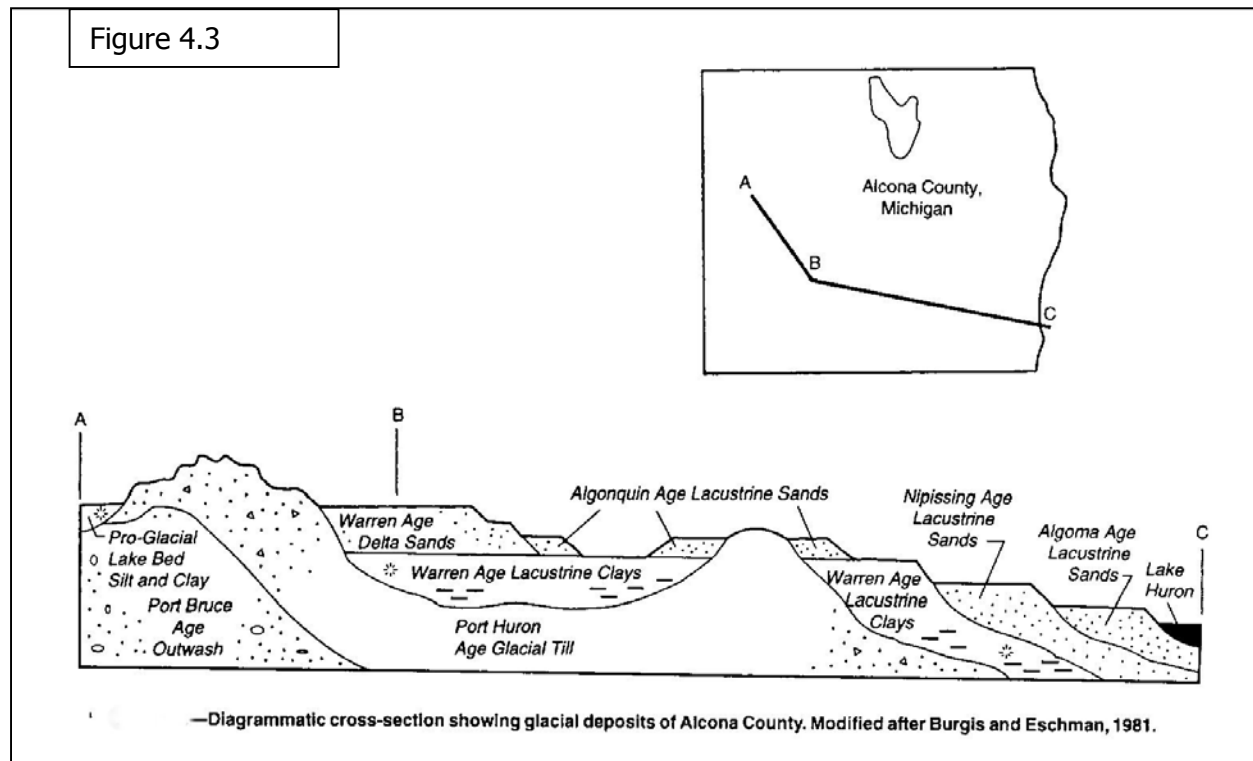


After Glaciation

*Landforms of continental glaciation are unmistakable.*

Figure 4.1

**Figure 4.3** shows the different stages of the glacial great lakes Warren, Algonquin, Nipissing and Algoma. Landforms and soils in eastern Alcona County was heavily influenced by these different lake stages. Glacial Great Lake Warren formed at the front of the melting Huron glacial lobe around 12,000 years before present and was the most extensive, flooding much of the land area of Mikado Township.



The west central part of Mikado Township is dominated by a sand delta. The ancient shoreline of Lake Warren was 850 feet above sea level as compared to 577 feet above sea level of Lake Huron. In other words, the lake level of Lake Warren was 273 higher than Lake Huron! As the debris laden meltwaters of the large glacial AuSable River emptied into Lake Warren, the coarse sands settled out first. This created a sand delta called the Jackpines Delta, the one of the largest glacially formed sand deltas in Michigan. This delta extends southward covering much of the north central part of Iosco County. The delta is characterized by broad, nearly level plains, dissected by widely spaced streams and creeks. The soils are excessively drained to somewhat excessively well drained sandy soils.

The eastern part of the Township is called the Mikado Till Plain. When the water slowed to a near standstill in Lake Warren, the fine materials, clays and silts settled to the bottom. According to the Alcona County soil survey, the lake plains are characterized by nearly level to undulating areas dominated by moderately well drained to poorly drained loamy soils. At the transition of the higher sand deltas and the lower lake plains the soils are somewhat poorly drained to very poorly drained sandy and mucky soils.

The Glennie Moraine extends into the northwestern part of Mikado Township. During some periods, the continental glacier's retreat stagnated, that is to say, the ice at the face of the glacier melted as fast as it advanced southward from the polar ice cap. The debris laden, glacial ice then deposited large amounts of materials in one locale. Acting like a large conveyer



belt, the materials piled up at the front of the glacier forming moraines or glacial hills. There were periods when the retreating continental glaciers re-advanced southward, and like a huge bulldozer, it pushed the previously deposited materials into larger hills. These are called push moraines.

Beneath the glacial deposits, hundreds of feet below the surface, is sedimentary bedrock that was created during the Late Mississippian ages of the Paleozoic Era. The bedrock was formed in ancient seas which covered the area some 310- 345 million years ago. The shallow marine seas deposited layers of silt, clay, sediments, marine animals, plants, coral, and other calcareous materials. These deposits formed shale, limestone, and dolomite bedrock. The upper layer of bedrock in the township is Coldwater shale. Other bedrock formations beneath the glacial overburden include Sunbury shale, Berea sandstone, Bedford shale and Antrim shale. Antrim shale contains rich deposits of natural gas. In recent years, intensive exploration has resulted in numerous producing wells throughout the region.

## **Topography**

The topography ranges from nearly level to steeply rolling hills. In the northwest part of the Township, within the Glennie moraine landform, the terrain is rolling to steep, knoblike hills and pothole depressions. The highest elevations (900 feet above sea level) are found in this area. There is a gradual drop in elevation in a south and easterly direction towards Lake Huron. The direction of the flow of water in the rivers is evidence of this general gradient to the east and south. The lowest elevation (600 feet above sea level) is found where the Pine River flows out of the southeast corner of Mikado Township in Section 36.

In the west central part of the Township, in the Jackpines delta landform, the terrain is gently sloping to the east, with elevations ranging from 840 to 800 feet above sea level. Streams and creeks flow in steep sided ravines that cut 70 or more feet into this nearly level sand plain. At the eastern edge of the Jackpines Delta, there is a steep scarp with a 100 feet drop in elevation over a one half mile distance. The elevation changes from approximately 800 feet to 700 feet above sea level. At the base of the slope, begins the Mikado Till Plain. The topography is nearly level to undulating. The elevations range from around 700 feet above sea level to 600 above sea level; a drop in elevation of 100 feet in 5 to 7 miles. The stream and creek valleys are wide and do not cut as deep into the landscape as they do in the Jackpines Delta.

The elevations above sea level of the ancient shorelines of Great Lakes Warren, Algonquin and Nipissing are 850 feet, 680 feet and 600 respectively as compared to the 577 feet above sea level of Lake Huron.

## **Soils**

When planning for types and intensity of future land uses, soil types and slopes are two important factors that determine the carrying capacity of land. The construction of roads, buildings and septic systems on steeply sloped areas or areas with organic and hydric soils require special design considerations. In addition, costs for developing these sensitive areas are greater than in less constrained parts of the landscape. If developed improperly, the impacts to natural resources can be far reaching.

The Natural Resource Conservation Service completed a detailed soil survey of Alcona County. A digital or computerized version of the soil survey maps was acquired from the Michigan Department of Natural Resources, MIRIS program. Using information contained within the published soil survey book, a series of maps will be presented that depict hydric soils, slopes 18 percent and greater, soils with building limitations and soils with septic system limitations.

#### Hydric Soils and Steeply Sloped Areas

**Figure 4.4** is a color thematic map that classifies hydric soils and soils on steep slopes. Lower density and less intensive development should be directed to these areas with severe building constraints. Hydric soils are saturated, flooded or ponded during part of the growing season and are classified as poorly drained and very poorly drained. Hydric soils have poor potential for building site development and sanitary facilities. Wetness and frequent ponding are severe problems that are difficult and costly to overcome. Sites with high water tables may be classified as wetlands and a wetlands permit would be required to develop these areas.

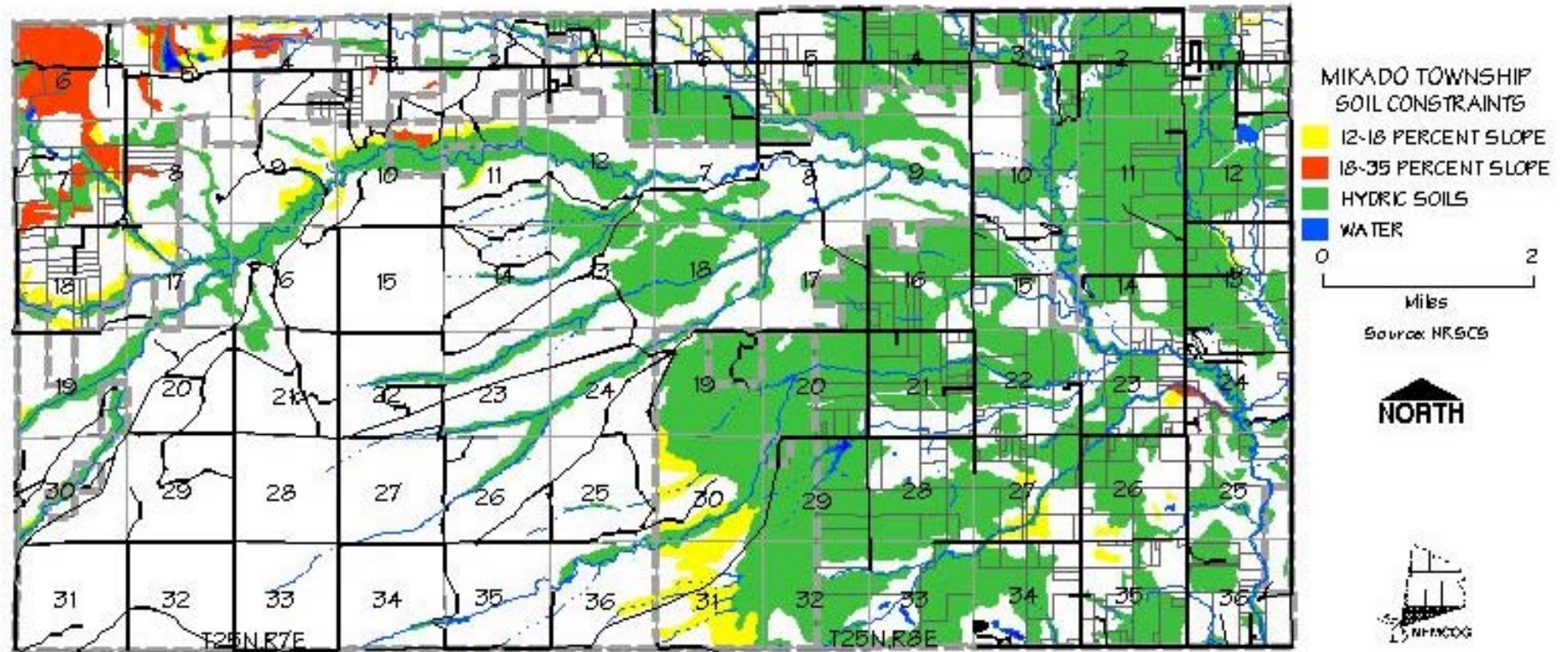
Less than 17 percent of the Township's surface area is mapped as hydric soils with a high potential for wetlands. The hydric soils are mainly located adjacent to streams and creeks. This connectivity of riparian wetlands and surface water features can be seen throughout the landscape. There are extensive hydric soils areas in Sections 12 and 13 of western half and Section 1, 4, 5, 9, 12 and 13 of the eastern half of Mikado Township.

Hills and steeply rolling terrain may provide opportunities for spectacular views of the landscape. However, steeply sloped sites have severe building constraints, are more difficult and costly to develop. Maintenance costs tend to be higher on steeply sloped terrain. Special design standards such as erosion control measures, limiting size of disturbed areas, retaining natural vegetation, re-vegetation, slope stabilization and on-site retention of water run-off from impervious surfaces would all serve to minimize resource impacts. According to information presented in the Alcona County Soil Survey areas with slopes 18 percent and greater are minimal and are concentrated in the northwest corner of the Township. Steep slopes can also be found along creek and stream valleys on U.S. Forest Service Lands.

#### Building Site Development

The USDA soil survey of Alcona County rates soils for various uses such as building site development and identifies the limiting factors such as steep slopes or high water table. The rating system is slight, moderate and severe limitations. Areas with well drained soils and slopes less than 10 percent tend to have slight limitations for building development. Areas with slopes greater than 18 percent, high water tables and organic soils have severe limitations. Based on criteria established by the Natural Resource Conservation Service (NRCS), extensive areas with severe constraints are found in the eastern half of the Township. This is part of the Mikado till plain, a glacial lake plain. A general soil map prepared by the NRCS shows these areas as somewhat poorly drained and very poorly drained sandy and mucky soils, and moderately well drained to poorly drained loamy soils. Lands with severe constraints are located along stream corridors, in wetlands and steeply sloped areas of the western half of the Township.

Figure 4.4  
Hydric Soils and Steeply Sloped Areas



## Septic Systems

Using a computer mapping system, soils maps have been color coded to show areas with moderate to severe septic system limitations as defined by the USDA Natural Resource Conservation Service. Criteria include depth to water table, wetness, filtering capacity and ability to perk water. **Figure 4.5** is a septic system limitation map. Generally, the western portions of the Township contain sandy soils with severe limitations due to poor filtration of septic effluents. This is a critical issue when the water table is close to the surface or when high density development occurs. Limiting types and density of development or making public water and sewer available for high density development are likely the best options for protecting the groundwater resources in these areas. The eastern parts of the Township are dominated by clay/loamy soils and high water tables. These environmental factors will often require the construction of mounded septic systems. This has been a particular issue within town of Mikado, where these environmental factors combined with small lot sizes has presented difficulties with siting septic systems.

## **Water Resources**

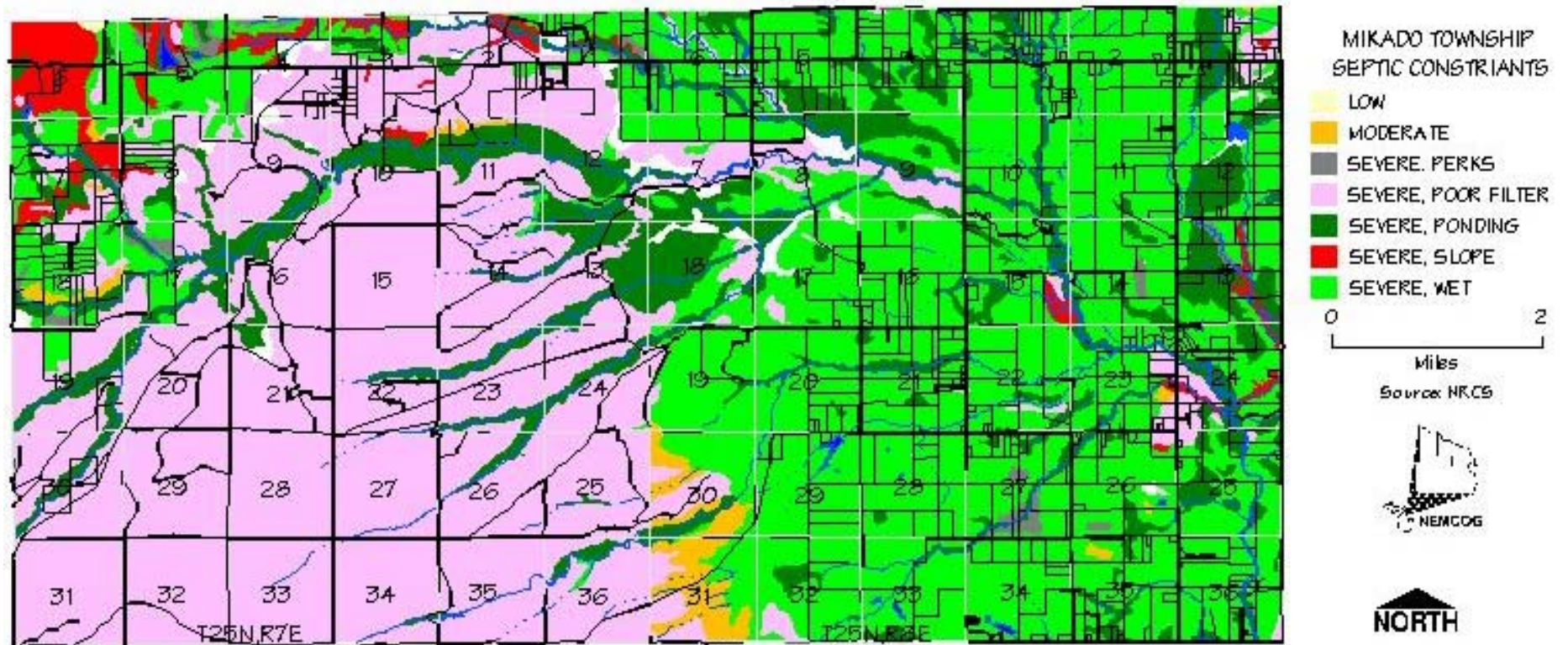
One of the most valuable and most sensitive natural resource in Mikado Township is water. Maintaining high quality groundwater and surface water is vital to the long term sustainability of the community. Residents of the Township must rely on individual wells for drinking water. Streams and lakes provide scenic values and recreational opportunities for residents and visitors. The water resources provide critical habitat components for a wide range of fish and wildlife species. Most importantly, these resources extend far beyond the Township boundaries, as a result, impacts to these resources can have far reaching implications.

### Groundwater

Two factors used to evaluate groundwater are the quantity and quality of the water. In much of the Township, the thick mantel of glacial till contains underground aquifers that provide residents with sufficient water quantities. Areas where the underlying glacial deposits are clay to great depths, groundwater availability is a limiting factor in community growth. There have been cases in Sections 27, 28, 33 & 34 in the eastern half of the Township that potable water supplies are not obtainable. In general, Mikado Township has good ground water quality. Though quite variable, high levels of iron and calcium can be found in some wells.

The vulnerability of drinking water aquifers to surface contamination is high in the Township due to highly permeable soils. A review of the *Aquifer Vulnerability to Surface Contamination in Michigan Map* prepared by the Center for Remote Sensing and Department of Geography at Michigan State University shows the vulnerability classification as highly permeable soils over highly sensitive drift lithology within the Jackpines Delta and Glennie Moraine landform areas. The area known as the Mikado Till Plain is classified as moderately and slowly permeable soils over least sensitive drift lithology and moderately permeable soils over unknown drift. Therefore, in Mikado Township, water quality is potentially more of a limiting factor than water supply. For example, the combination of highly permeable soils, shallow wells, on-site septic systems and dense residential development can result in high nitrate levels in drinking water.

Figure 4.5  
Septic System Constraints

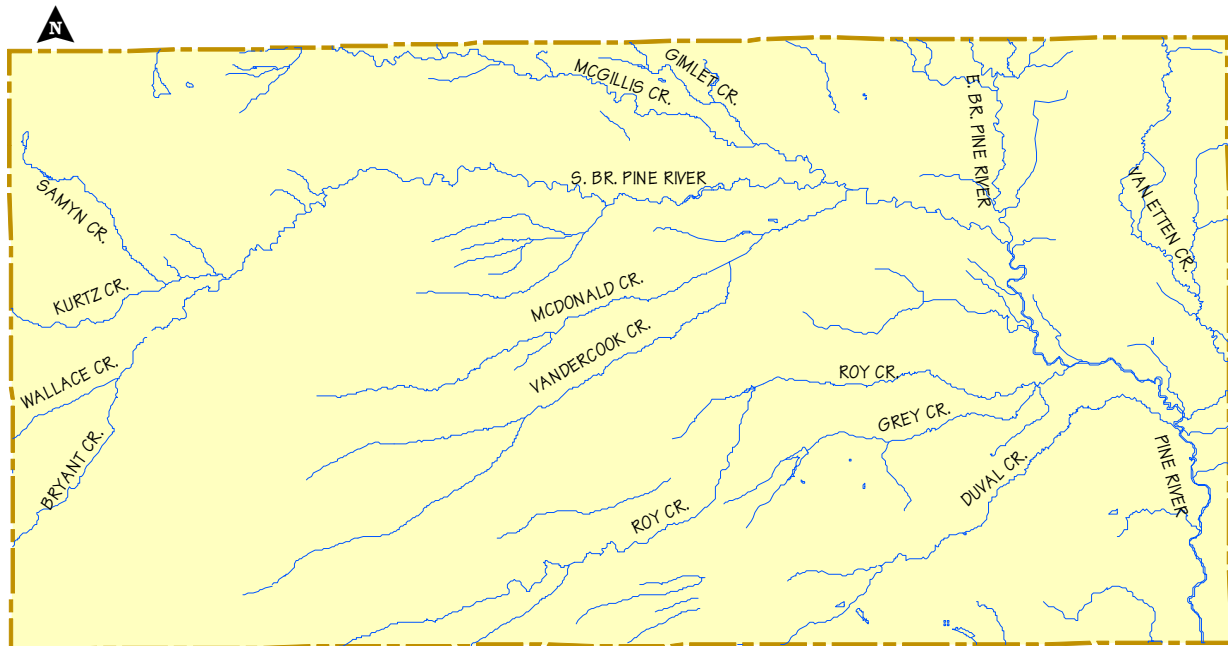




## Surface Water Resources

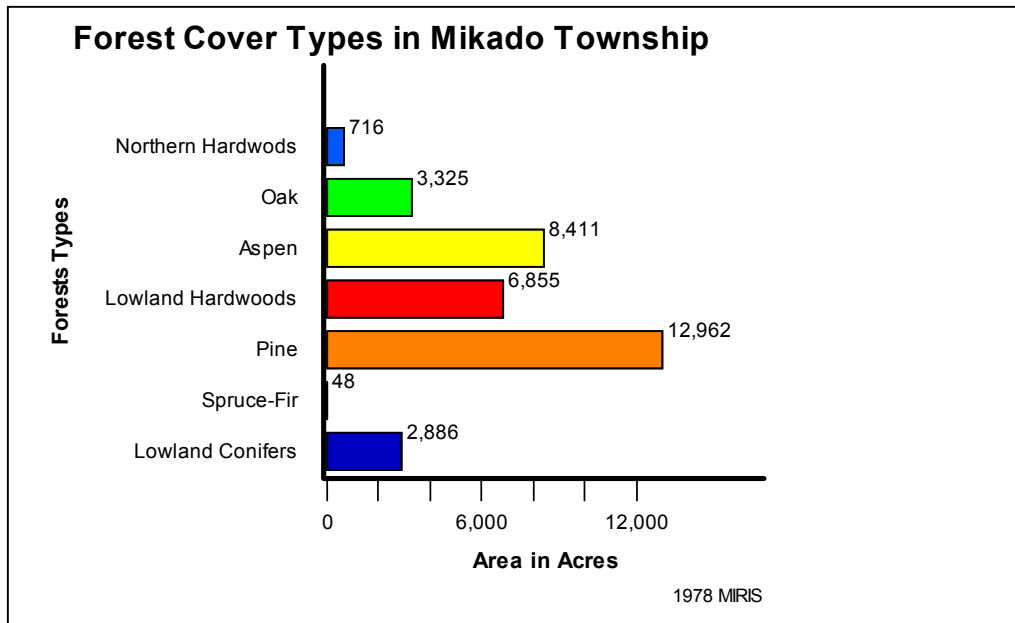
In the Great Lakes Region, rivers were the main thoroughfares of the pre-European inhabitants. The indigenous people used the Pine River for long distance trips and transporting large cargoes. These same rivers brought the "landlookers" and lumberman from the Great Lakes coastal communities to the interior of expansive, uncut forests. In turn, these water highways transported the raw materials to the coastal communities and sawmills, hungry for old growth pine logs.

Mikado Township is located Pine River/Van Etten Lake subwatershed in the AuSable River Watershed. **Figure 4.6** is a map that shows the water resources and watersheds in the Township. The Pine River splits into a south branch and east branch in Section 10 of T.25N.-R.8E. Tributaries of the Pine River include Van Etten Creek, Duval Creek, Grey Creek, Roy Creek, McDonald Creek, McGillis Creek, Gimlet Creek, Bryant Creek, Wallace Creek, Kurtz Creek and Samyn Creek. There is one privately owned lake with no public access.



## Forests and Wetlands

Conifer and hardwood forests are the dominant plant communities found in Mikado Township. Approximately 77 percent of the Township is covered with forests. Tree species vary depending upon the soils, moisture and past activities such as logging, fires and land clearing. For example areas with sandy soils and a history of wildfires support dense stands of jack pine; critical habitat for the Kirtland's Warbler. According to the MIRIS Land Cover/Use Inventory, the most prevalent forest type is jack pine, covering 37 percent of the forestland. Aspen forests account for nearly 25 percent of the woodland area. **Figure 4.7** is a chart that depicts the forest types and acreage according to the 1978 MIRIS Land Cover/Use Inventory.



Jack pine forests are the dominant forest type growing on the lacustrine sand delta appropriately called Jakcpines Delta. The draughty, low fertility sand soils supported pre-settlement jack pine forests, that were perpetuated by wildfires. White pine can be found in the creek valleys that dissect the sand delta.

Jack, red and white pine trees are found in the pine forest category. Bigtooth aspen, quaking aspen, white birch, red maple and red oak are the primary tree species found in the aspen-birch type. Red oak, white oak and northern pin oak are the primary species growing in the oak forests. Northern hardwoods includes species such as sugar maple, red maple, American beech, basswood and yellow birch.

Poorly drained, lowland areas support northern white cedar, tamarack, balsam fir, black spruce, eastern hemlock, white pine, balsam poplar, trembling aspen, paper birch, black ash, speckled alder and shrub willows. Northern white cedar dominates the wetland areas where there is good lateral water movement and the soils are high in organic content.

These lowland forests are typically located adjacent to water features and function as riparian forests and water quality buffers. The network of lowland forests, associated with rivers and creeks, also function as wildlife corridors and are the backbone of large regional ecological corridors. Nonforested wetland types include lowland brush, marshes and bogs. Forested and nonforested wetlands are a finite resource in the township. Land use planning activities should focus on protecting and preserving these limited and critical resources.

**Wildlife Habitat**

Within the Township, there are a variety of wildlife habitats, ranging from upland forests to flowing cold water streams bordered by marshes, lowland brush and floodplain forests. The significance of these resources extends beyond Mikado Township. The U.S. Forest Service manages extensive areas of jack pine forests to provide critical habitat for nesting Kirtland’s Warblers. Habitat for wildlife that require wetlands such as marshes and cedar swamps is



extremely limited. Land use planning should focus on protecting the finite resources. As with protecting the forest resources, a three pronged approach using local regulations, technical assistance, and landowner education is the best approach to long term protection of the natural resources in the Township.

The Huron National Forest manages jack pine stands for Kirtland's warbler habitat. The Pine River Kirtland's Warbler Management Area is located in Mikado Township. This is one of seven Kirtland's Warbler management units in the Huron National Forest. Approximately 15,300 acres of Jack Pine are managed in this unit, of which, 8,900 acres are in the western part of the Township. The Kirtland's Warbler require young jack pine stands for nesting cover. As a result, the U.S. Forest Service harvests and regenerates an average of 242 acres each year.

Squirrels, black-backed woodpeckers, fox, and numerous species of song birds utilize pine forests for cover and food sources. The gray jay, pine grosbeak, evening grosbeak, red crossbill, purple finch, boreal chickadee, and pine siskin frequent upland conifer stands during the winter months. Many species of wildlife also use the upland conifer forest for nesting and feeding. The black-backed woodpecker nest in hollowed out tree trunks. The long-eared owl, solitary vireo, red crossbill, black-throated green warbler and evening grosbeak nest in the canopy, while the porcupine, long-tailed shrew, deer mouse, woodland jumping mouse and lynx nest beneath the ground or debris. This cover type also offers opportunities for viewing migratory birds in the spring and fall. These species include the golden-crowned kinglet, ruby-crowned kinglet, Swainson's thrush, blackburnian warbler, magnolia warbler, bay-breasted warbler, Canada warbler, hermit thrush and winter wren.

Many woodland creatures use the aspen forest for nesting and feeding. Species such as the least flycatcher, red-eyed Vireo, rose-breasted grosbeak, black-billed cuckoo and American redstart nest in the tree canopy. Ground nesting species such as the ruffed grouse, veery, snowshoe hare, and white tailed deer use aspen forest types. A few species of wildlife that nest under ground or in debris include the eastern chipmunk, long-tailed weasel, marbled salamander, ringneck snake, milk snake and smooth green snake. Birds and mammals that nest in cavities of trees include black-capped chickadee, yellow-bellied sapsucker and northern flying squirrel.

Northern hardwood forest provide seasonal and year round habitat for many birds and mammals. Some species of birds found in northern hardwood forests are black-capped chickadee, yellow-bellied sapsucker, white-breasted nuthatches, ruffed grouse, oven bird, sharp-shinned hawk, broad-winged hawk, red-eyed vireo, scarlet tanager, black-throated blue warbler, and blue jay. The northern grosbeak can be seen in northern hardwoods only during the winter months. Migratory birds such as the blackburnian warbler can be seen in the spring and fall. Mammals include gray squirrel, northern white tail deer, northern flying squirrel, eastern chipmunk, woodland jumping mouse and gray fox.

A closed canopy northern hardwood forest growing on rich soils tend to be cool and offer damp little pockets during the summer months. Northern dusky, red-backed, and Wehrle's salamanders can be found in old rotting stumps and logs. If standing water is present, the Jefferson's and spotted salamander, Copes gray tree frog and wood frog can be found.

Conifers provide important winter (thermal) cover for wildlife, particularly, when located next to winter food sources. The gray jay, pine grosbeak, evening grosbeak, red crossbill, purple finch, boreal chickadee, and pine siskin frequent upland conifer stands during the winter months. The black-backed woodpecker, long-eared owl, solitary vireo, red crossbill, and black-throated green

prefer pine forests. The porcupine, long-tailed shrew, deer mouse, woodland jumping mouse and lynx inhabit pine forests. This cover type also offers opportunities for viewing migratory birds in the spring and fall. These species include the golden-crowned kinglet, ruby-crowned kinglet, Swainson's thrush, blackburnian warbler, magnolia warbler, bay-breasted warbler, Canada warbler, hermit thrush and winter wren.

Farmland and upland openings provide needed habitat for many birds such as red tailed hawks, eastern kingbird, loggerhead shrike, American kestrel, eastern bluebird and eastern screech-owl that feed extensively in open areas. A great number of animal species nest on the ground. The short-eared owl, common nighthawk, killdeer, upland sandpiper, horned lark, vesper sparrow, Savannah sparrow, grasshopper sparrow, bobolink, eastern meadowlark and eastern cottontail nest on the ground. Shrews, woodchucks, ground squirrel, field mice, red fox, voles, and badgers along with the eastern hognose snake, smooth green snake and milk snake are field dwellers.

Riparian forests adjacent to streams and lakes provide critical habitat for many species of wildlife and reptiles. The land and water interface is a long narrow, sometimes meandering, edge habitat. In Mikado Township and throughout Michigan, natural, undeveloped lakeshore habitat is one of the most endangered habitats. There is a continuing trend for lake lot owners to clear brush, aquatic weeds, dead trees and live trees that interfere with a wide-open view of the water. The native vegetation is replaced with well manicured and chemically treated lawns down to the waters edge. This practice not only degrades critical wildlife habitat but also impacts water quality by diminishing the riparian zone's capacity to filter nutrients and ability to stabilize shoreline erosion.

Birds that use floodplain habitat for feeding and nesting include the red shouldered hawk, barred owl, kingfisher, northern oriole, red-headed woodpecker, pileated woodpecker, woodcock, wood duck and great blue heron. Deer, raccoon, northern flying squirrel, water vole, mink and river otter also frequent these areas. As well, numerous species of turtles, frogs, snakes and salamanders newts can all be found in river/flood plain areas.

## **Ecological Corridors**

Prior to logging and land clearing during the late 1800's, this area was covered with old growth hardwood and pine forests. The pre-settlement forests were rich ecosystems that stretched across the northern Lower Peninsula of Michigan. The backbones of these ecological corridors were the many rivers, creeks and intermittent drainages, along with their associated wetlands and riparian forests. The Pine River and its many tributaries are key ecological corridors within the AuSable River Watershed.

The wetlands and riparian forests adjacent to the rivers and creeks are links in a long green chain, a web of ecological corridors within the Pine River Watershed. These corridors are part of a larger network of ecological corridors consisting of the creeks, streams, wetlands and upland forests within the AuSable River Watershed Ecological corridors or "green infrastructure," can be likened to a highway system. All segments of the highway must be connected and in working order for the highway system to properly function. If segments are degraded or missing then the highway will not function to its fullest potential. The same holds true for ecological corridors, when segments are degraded or fragmented, the system will not function properly. In other words, activities on a given piece of property can have implications that reach far beyond the ownership boundaries.

## Chapter 5 - Existing Land Use

Prior to determining future land uses and developing a future land use map, a community must have an accurate assessment of existing land uses. This chapter presents information on both the types and location of existing land uses. The process identifies both urban built-up land uses such as residential and commercial, along with natural land cover types like farmlands, forests, and wetlands. As a result the final map presented in this chapter is a hybrid that combines land cover and land use.

### Land Division Patterns

As development occurs, larger tracts of land are generally broken down into smaller parcels. Therefore, studying the existing pattern of land divisions is one way to analyze the status of land use and development. Land division patterns for Mikado Township are discussed below.

Approximately 52 percent of the land in the Township is publicly owned. Some 32.7 square miles (46 percent) of the Township are under jurisdiction of the U. S. Forest Service, while the State of Michigan owns 4.5 square miles of land in the eastern one half of the Township. Most of the private ownership is in tracts that are 20 acres and larger in size. Smaller tracts of private land, 10 acres or less in size, can also be found in Mikado Township. Pine River Estates, Village of Mikado, Minthorn Addition to Village and Four Seasons are four subdivisions located in the township. The Village plats date back to the early 1900's. As with other parts of northern Michigan, private ownership is being divided into smaller tracts of 10 acres or less.

### Existing Land Use Characteristics

The NEMCOG mapped existing land use in the Township in July of 2001. The map of existing land use, shown as **Figure 5.1**, illustrates the distribution of land uses throughout the Township. Michigan Resource Information Systems (MIRIS) land cover/use classification categories were used to map the existing land use. The map represents an update of the 1978 MIRIS land cover/use map. The MIRIS map was updated with 1998 aerial photographs and extensive field checking (conducted in July of 2001). The updated information was then computerized to produce the existing land use map and statistics. **Table 5.1** presents the land uses, showing the number of acres and percent of the Township in each of the land use categories. Each of the land use categories is discussed later in this chapter.

One important land use trend was noted during the MIRIS land cover/use map update. There has been an increase in low density residential development on both large and small tracts throughout the township. These are typically occurring on parcels two acres and larger.

#### Residential

As can be seen on the Existing Use Map and table, residential use ranks sixth in the amount of land currently in this use. Residential use occupies more than two percent (1,077 acres) of the land in the Township. Residential development is concentrated along county roads in the eastern part of the Township and within the northern tier of sections across the remainder of the community. Single family residential accounts for all of the residential development in the Township.

### Commercial

Commercial areas are found in the community of Mikado and are concentrated around the intersection of Mikado-Glennie Road and County Road F41. Most of the commercial uses are service and retail. Lands used for commercial purposes comprise less than one tenth of one percent of the Township's area.

### Industrial/Extractive/Transportation

Land in this use category covers less than one tenth of one percent or 28 acres of the Township. This category includes several sand and gravel pits and a private airport (Section 12).

<b>Table 5.1</b> Existing Land Use Statistics Mikado Township		
<b>Land Use Category</b>	<b>Number of Acres</b>	<b>Percent of Township</b>
Residential	1077	2.4
Commercial	23	Less than 0.1
Industrial/Extractive/Transportation	28	Less than 0.1
Institutional/Recreational	80	0.2
Agricultural	3,510	7.7
Non-forested Uplands	3,477	7.6
Upland Forests	24,973	54.7
Lowland Forests	10,068	22.0
Wetlands	2,365	5.2
Water	79	0.2
<b>TOTAL</b>	<b>45,680</b>	<b>100</b>
Source: Michigan Resource Inventory System and NEMCOG photo interpretation, field verification and map updating.		

### Institutional/Recreational

This category includes institutional uses such as churches, Township Cemetery and the Mikado Civic Center. Developed recreational facilities were mapped as part of this category. Recreational facilities are Bruce Park , a ball field adjacent to the Civic Center and ball fields located off Barlow Road, all in section one of the eastern half of the Township . A private recreational facility is located in Section 34 of the eastern half. A U.S. Forest Service campground is located in Section 16 of the western half of the Township. This category

accounts for 80 acres or 0.2 percent of the Township area.

As noted earlier, some 52 percent of Mikado Township area is in public ownership. While these areas were not classified as recreational, the considerable amount of public land does offer residents and visitors ample area for a wide range of outdoor recreational activities. For example, persons wishing to pursue the sport of fishing can access the Pine River and its many tributaries such as Van Etten Creek, Duval Creek, Grey Creek, Roy Creek, McDonald Creek, McGillis Creek, Gimlet Creek, Bryant Creek, Wallace Creek, Kurtz Creek and Samyn Creek.

### **Agricultural**

Agricultural lands currently comprise approximately 3,510 acres or 7.7 percent of the Township. Farming activities include hay production, pasture land and row crops. In comparison to the 1978 MIRIS Land Cover Inventory, there is less land being farmed. However, generally the land is converting to a less intensive use of open lands and not being converted to subdivisions and commercial uses.

### **Non-forested Uplands**

The non-forested land category is the fourth most prominent land cover type in the Township. This category consists of herbaceous open and shrub land. As shown in **Table 5.1**, 3,477 acres or more than 7.6 percent of the Township is in the non-forested category. A majority of the non-forest areas are old farm fields.

### **Upland Forests**

The upland forested lands are the most predominant land cover in the Township and accounts for 54.7 percent or 24,973 acres of the Township. Of the forested lands, the most prevalent forest type is jack pine. Jack, red and white pine trees are found in the pine forest category. Draughty, low fertility sandy soils in the western half of the Township supported pre-settlement jack pine forests, that were perpetuated by wildfires. Today, the forest type is perpetuated by management activities of the U.S. Forest Service. Other forest types include aspen-birch, oak and northern hardwoods. More information on these forest types can be found in Chapter 4.

### **Lowland Forests and Wetlands**

Wetlands include land that has sufficient water at, or near, the surface to support wetland or aquatic vegetation. These areas are commonly referred to as swamps, marshes and bogs. The wetland category comprises non forested types such as lowland brush (tag alder and willow) and wet meadows. Non-forested wetlands account for 2,365 acres or 5.2 percent of the surface area.

Lowland forests grow on soils with a seasonally high water table and are often classified as wetlands. Lowland forests, include areas that support lowland hardwoods and conifers, such as northern white cedar, black spruce, balsam fir, elm, red maple, ash and aspen species. Lowland forests occupy 10,068 acres or 22 percent of the Township area. Two of the most important functions of wetlands are water quality protection and ecological corridors. As can be noted on the Existing Land Use Map, the major wetland areas are adjacent to rivers and creeks. The network of wetlands receive surface water and subsurface water discharge, creating the many streams and creeks which in turn flow into the area lakes. The interconnected resources exemplify how activities distant from major water bodies can still have an impact on the water quality.

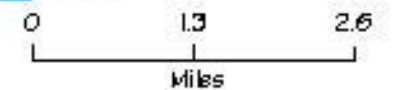
**Surface Water**

Open water comprises less than 0.2 percent of Mikado Township. Delap Lake as well as several small ponds are included in this category.



MIKADO TOWNSHIP  
EXISTING LAND COVER/USE

- RESIDENTIAL
- COMMERCIAL
- INDUSTRIAL/EXTRACTIVE
- INSTITUTIONAL/RECREATIONAL
- FARMLAND
- UPLAND OPENINGS
- UPLAND FORESTS
- LOWLAND FORESTS
- WETLANDS
- WATER



COMPLETED: JULY 2001



## **Chapter 6 - Goals and Policies**

The purpose of this chapter is to establish the goals and policies that will guide future development within Mikado Township. In developing community goals and policies, it is important to analyze existing community characteristics such as: social and economic conditions, services and facilities, environmental conditions, and existing land use. Preceding chapters of this master plan have documented the above characteristics.

An equally important step in developing goals is community input. The Township held a workshop on September 25, 2001 to gather input for establishing long and short term community goals and policies. Thirty people attended the visioning workshop. The group identified assets to protect and problems to address. In addition, the participants were asked to develop a vision of the community 20 years into the future. A full listing of the workshop comments is included in Appendix A.

### **Mikado Township Assets to Preserve**

Participants in the workshop noted that Mikado Township is blessed with an abundance of high quality natural resources. Resources include forests, wetlands, farmland/open space, rivers, wildlife and fish. These resources were the driving forces behind the early settlement and today are still important to the local economy and quality of life. The rural character of forest lands, farmlands, U. S. Forest Service lands and low density residential development create a landscape with considerable open space. The unincorporated village center of Mikado is a focal point of the residents. The history of Mikado as well as the historic structures are deemed worthy of preserving. Community facilities and services, like the Mikado civic center, fire department, library and newsletter, are important to the quality of life and are a source of pride. Community organizations, such the Mikado Area Development Group, Mikado Goodfellows, churches and American Legion Post, continue to help the community in many ways. The considerable amount of public lands are seen as both an asset and a problem. Irrespective of this, open communication with the U. S. Forest Service and Department of Natural Resources is paramount. A list of assets to preserve is presented in Appendix A.

### **Mikado Township Problems to Address**

Based on comments from participants of the workshop, it is clear that problems do exist in Mikado Township. These problems include loss of farmland, lack of community identity, ground and surface water quality, private water wells and septic systems, road maintenance, limited Township financial resources, and blight in residential areas. The village center needs to be improved with streetscaping, sidewalks, and improved parking facilities. Excessive speeds and safety issues exist in the village center. There is a need to designate appropriate areas for commercial and light industrial development. However, the lack of public water and sewer will limit the size and intensity of these developed areas. There were environmental concerns about poorly functioning septic systems and poor water quality in some streams. There is a lack of recreational opportunities for youth in the community. While the public lands provide a wealth of outdoor recreational opportunities, there are no organized efforts to promote these to tourists nor are there facilities such as camping, hotels, and restaurants to accommodate visitors. Participants felt the zoning ordinance needs to be updated, and there is a need for



consistent enforcement and better local support for zoning violations and other ordinances. A list of problems to address is presented in Appendix A.

## **Mikado Township in the Year 2022**

**Visioning** is a process to help community members imagine, describe and attain a preferred future for their community. Participants were asked respond to the following visioning exercise. To encourage a free flow of ideas, answers were not constrained by present situations. Participants had opportunities to present their ideas in an open, informal setting.

*Imagine you have friends or relatives visiting in the year 2022. You decide to take them for a tour to show off the wonderful community in which you live. You take a drive through countryside; admire the beauty of the landscape and marvel at the development; you stop along the Pine River for a picnic. Much of what you see and hear pleases you, and some activities surprise you. Describe the 2022 future that you envision. Consider the physical environment (residential, commercial and industrial development); the natural resources (forests, water, open space and farmlands); and community facilities and services.*

### Summary of Participants Comments

The community is dominated by a rural landscape, with large tracts of forest lands and small active farms. The village center of Mikado has had a face lift, with streetscaping including sidewalks, street lights, and defined parking areas with landscaping. Motorists, once again, feel as if they are driving through a thriving community. Except for the village center and platted subdivisions, much of the residential development is low density. A variety of housing types are available, including single family and multiple family housing. Homes are screened with trees and other native vegetation, so newer development isn't apparent to traveling motorists. Residents take pride in their homes and the structures and grounds are well kept and neat. Apparently, the blight ordinance has worked to clean-up the community.

Commercial development has occurred within and adjacent to the village center. Vacant buildings are once again being used, and several new structures have been built. There is a café and drug store, along with a small branch bank and health care services. There is still a mix of paved, gravel, dirt and seasonally maintained roads. However, cooperative efforts over the years have resulted in establishing well maintained paved and gravel roads in the township.

There is an abundance of public lands and public access to fishing and hunting areas. Use of the public lands has increased for both recreation and wildlife viewing, as people search for escapes from the hustle and bustle of everyday life. Because of the abundance of nature, Mikado has become known as a great place to visit and live. A community recreation brochure and map are being distributed. There has been so much interest in camping, that there is talk of constructing a campground, either public or private, on the Pine River. Use of the Forest Service campground has greatly increased. The township has maintained the ball fields and playgrounds, as well as Bruce's Park has been redeveloped. Non motorized recreation trails are used by bikers and hikers in the summer and x-country skiers in the winter. A snowmobile trail connects Mikado to a larger regional network.

The Mikado Civic Center is still a focal point of the community, it is well maintained and used for many community occasions. Community organizations have once again risen to the occasion and built a small youth center, connected to the new library. Students working at the new library have developed a community web site. Kahn's General store has been preserved and turned into a museum and welcome center. Volunteers have compiled a history of the area, including photos, local artifacts and personal accounts.

## **Community Goals and Policies**

After reviewing the community input and considering the existing conditions background information, the planning commission established Goals and Policies. These goals and policies will provide guidance to both Mikado Township Planning Commission and Township Board.

### ***Planning and Community Development***

*Goal: Guide future development in a manner that will protect existing development; preserve rural community character; enhance the village center, and conserve natural resources and environment, yet meets the long-term needs of the community.*

Policies:

- Control the location of new development by designating appropriate areas for new residential, commercial, industrial and resort/recreational land uses.
- Establish landscape requirements for new development, such as appropriate setbacks, retention of green space, buffer zones between differing land uses, screened parking areas, and roadside landscaping.
- Develop open space residential and commercial development design standards to preserve scenic views, rural character, farmland, meadows, woodlands, steep slopes and wetlands with a target of preserving 50 percent of the land within a development.
- Improve regulations and standards to protect the community against high noise levels and exterior lighting glare.
- Implement access management standards for commercial development along the primary corridors within the Township which include F-30 and F-41.
- Develop a waterfront overlay district in the zoning ordinance that will set forth special requirements and standards for development in these sensitive areas adjacent to streams.
- Establish standards that regulate the placement and size of cellular, communication and transmission towers.
- Enforce junk/blight ordinance to work towards improving the quality of housing and protecting property values.

- Develop a Township ordinance that will regulate size and location of signs and billboards to minimize clutter, confusion, aesthetic degradation, and limit traffic hazards.
- Enforce all Township ordinances in a consistent and fair manner.
- Amend the site plan review process to assure consistent application of the zoning ordinance.
- Through the zoning ordinance, encourage new commercial development to have a consistent appearance, use landscaping and buffers, and share parking with adjacent businesses, and limit access points onto county roads.

### ***Government***

*Goal: Provide services in an efficient, environmentally responsible and caring manner to meet the needs of the residents, property owners, business people and visitors.*

Policies:

- Ensure a responsible fiscal policy and budget process to finance the Township government.
- Promote intergovernmental and regional cooperation on issues of mutual concern.
- Work cooperatively with adjacent townships in providing guidance and input on zoning decisions that impact the Township.
- Continue to work with adjacent communities to provide emergency services to Township residents
- Maintain communication with the Department of Natural Resources and U. S. Forest Service to provide input into the usage and management of the public lands in the Township.
- Promote the involvement of volunteers in the government process.
- Utilize the proactive master planning process as a check and balance on decision-making.

### ***Infrastructure and Community Facilities***

*Goal: Improve the Township's transportation systems, community facilities, and public utilities to accommodate the needs of residents and visitors.*

Policies:

- Develop a capital improvements plan to address the long term needs for road improvements, fire hall, civic center, and community recreation.

- Pursue funding sources to design and implement a streetscaping project in the village center that will create a continuity of appearance. Design should consider curbs, designated parking, street lights, landscaping, and sidewalks.
- Support the expansion of the Mikado Library branch of the Alcona County Library.
- Continue to maintain and make improvements to the Mikado Civic Center, including establishment of a youth center.
- Continue to maintain and, when necessary, expand the Mikado Cemetery.
- Encourage the efficient use and maintenance of existing roadways and infrastructure.
- Work with the Alcona County Road Commission to plan for upgrading of roads, maintenance of existing roads, and vehicular and pedestrian safety at intersections and on roadways.
- Direct development to areas with existing infrastructure and where infrastructure is not adequate require developers to fund the upgrading of infrastructure to support proposed new development.
- Develop standards for private roads and shared road access.
- Support the expansion of public transit to better serve the needs of senior citizens and other transit dependent Township residents.
- Encourage utility companies to provide electric and telephone service to township residents.

### ***Residential Land Uses***

*Goal: Allow for suitable housing opportunities for all income levels and age groups, including year-round residents and seasonal residents.*

#### **Policies:**

- Designate areas appropriate for all types of residential development including single family, multi-family, elderly housing, condominium, low to moderate income rental complexes, and extended care facilities.
- To preserve open space and vital natural resources, encourage the development option of clustered single-family housing, in buildable portions of the Township.
- Encourage new residential development to be sited in a manner that protects the rural character and scenic views by maintaining proper setbacks and providing landscaping screening as appropriate.
- Discourage large scale residential development in the absence of documented demand for such development.
- Encourage existing housing stock and neighborhoods to be kept in good repair, appearance, usefulness and safety.

- Require adequate buffers and transition areas between residential and non residential uses to maintain property values and visual attractiveness.
- Preserve the integrity of existing residential neighborhoods by protecting them from intrusion of incompatible uses through the township zoning ordinance.

### ***Commercial Areas and Activities***

*Goal: Promote a varied business environment, and encourage retention, expansion and enhancement of businesses to meet the needs of residents and tourists, while preserving the natural environment and rural character of the community.*

Policies:

- Support the existing commercial areas. Guide new commercial development into a designated hub, through the master plan and zoning ordinance; while discouraging linear strip development along primary county roads.
- Develop and utilize innovative planning and zoning techniques, such as clustering, shared parking, access management, and landscaping to regulate commercial development along primary county roads.
- Increase safety and reduce the visual impact of signs and billboards, by controlling their size, number, illumination, and configuration.
- Make parking (public and private) needs a consideration for all expansions and new development.
- Require landscape buffers where commercial uses are adjacent to residential uses.
- Regulate home occupations and home based businesses to assure compatibility with existing residential areas.

### ***Industrial Land Uses***

Industrial parks are located in the adjacent communities of Lincoln and Oscoda. The facilities provide necessary utilities and services, and have sites available for industrial type operations. Furthermore, analysis of soil conditions on the natural resource section found soils to be poorly suited for septic fields. Given existing industrial parks in adjacent communities and the lack of public water and sewer service in Mikado Township, the community does not support large scale industrial development.

*Goal: Encourage and establishment of new light industries to diversify the local economy and to create more stability and self-sufficiency for the community.*

Policies:

- Ensure that industrial uses are developed in an environmentally sensitive manner, are harmonious with the existing community and are located in areas identified in the future land use plan.
- Encourage light industries and high tech industries that do not pollute the air, soil, or water nor offend because of noise, odor, or visual impact to locate in zoned industrial areas within the Township. Due to the lack of public water and sewer, these industries should not require high water usage or generate large amounts of septage.
- Require landscape buffers where industrial uses are adjacent to other land uses.
- Ensure that extractive development takes place in an environmentally sensitive manner. Require landscape buffers around extractive operations to screen adjacent properties and public roadways. Establish criteria for reclaiming extractive areas after the operation is complete.

***Recreation and Public Lands***

*Goal: Preserve and improve access to public lands and water, recreational trails and public parks for the enjoyment of residents, visitors and future generations.*

Policies:

- Develop a Township Recreation Plan that identifies and prioritizes needed community recreational facilities.
- Secure funding to make improvements to Bruce’s Park. Investigate outside funding sources such as DNR recreation grants, donations, and foundations.
- When appropriate, purchase additional property adjacent to the Township hall, to expand the outdoor recreation areas with playground equipment and ball courts.
- Pursue outside funding sources, such as grants for land acquisition and recreational development.
- Retain and improve public water access sites for residents, seasonal residents and visitors.
- Facilitate the designation of a snowmobile route connecting the community to the regional snowmobile network by working with the Crawford County Road Commission, Crawford County Sheriff Department, US Forest Service and the Michigan Department of Natural Resources.
- Support the expansion and creation of non-motorized recreation trails such as x-country ski trails, bike trails and horse riding trails on both public and private lands.

- Through zoning and review procedures, proposed subdivisions, site condominiums, planned unit developments, commercial and industrial developments should be encouraged to provide or participate in the development of neighborhood parks.

### ***Natural Environment***

*Goal: Protect and preserve the natural environment by protecting groundwater, surface water, environmentally sensitive areas, highly erosive areas, woodlands, wetlands, open space, fish and wildlife.*

Policies:

- Encourage a land use pattern that is oriented to the natural features and water resources of the area. Evaluate type and density of proposed developments based on soil suitability; slope of land; potential for ground water and surface water degradation and contamination; compatibility with adjacent land uses; and impacts to sensitive natural areas like wetlands, greenways and wildlife corridors.
- Limit and control the density and type of residential and commercial development adjacent to lakes, ponds, streams, and wetlands.
- Maintain greenbelt areas adjacent to lakes, ponds, streams, and wetlands through development of a greenbelt section in the zoning ordinance.
- Implement groundwater protection and stormwater management regulations in the zoning ordinance, while encouraging the continued natural use of wetlands as groundwater recharge, stormwater filtering and stormwater holding areas.
- Limit development on steeply sloped areas. Require erosion control measures where construction is permitted. Require slope stabilization and revegetation on disturbed slopes or in extraction areas.
- Limit development on poorly drained soils, and soils with severe limitations for septic systems.
- Consider the adoption of a septic system maintenance ordinance to protect and improve water quality.
- Preserve topography such as slopes, valleys and hills by limiting the amount of cut and fill during site development.
- Encourage the integration of wetlands, woodlands and meadows into site development as aesthetic and functional features.
- Encourage the retention of agricultural lands, forest lands and ecological corridors through available mechanisms such as open space and farmland agreements, forest stewardship programs, and conservation easements, as well as zoning incentives.

- Encourage the use of native plant species and naturalized landscape designs, where appropriate, to enhance the communities' existing character.
- In recognizing the importance of trees in the suburban environment, encourage the retention of existing native trees and the establishment of street and shade trees in residential neighborhoods and commercial developments.

### ***Agricultural Land and Open Space***

*Goal: Recognize the importance of agricultural lands as open space within Mikado Township.*

Policies:

- Maintain and provide for the preservation of farmland and woodlands where feasible, including tree farming and specialty crop farms.
- Discourage the conversion of farmland into other more intensive uses. Recognize farmland as contributing to the scenic and rural character of the Township.



## Chapter 7 - Future Land Use Recommendations

According to the US. Census Bureau, there has been a small, but steady growth in population since the 1960's. Development associated with this growth has generally been low-density single family residential. While residential growth is occurring in Mikado Township, according to the 2001 land use inventory, over 97 percent of the land area was classified as forest, farmland, non-forest open space, and wetlands. Less than three percent of the Township's land was used for urban related purposes, including extractive, commercial, industrial, utilities, institutional/recreational and residential development.

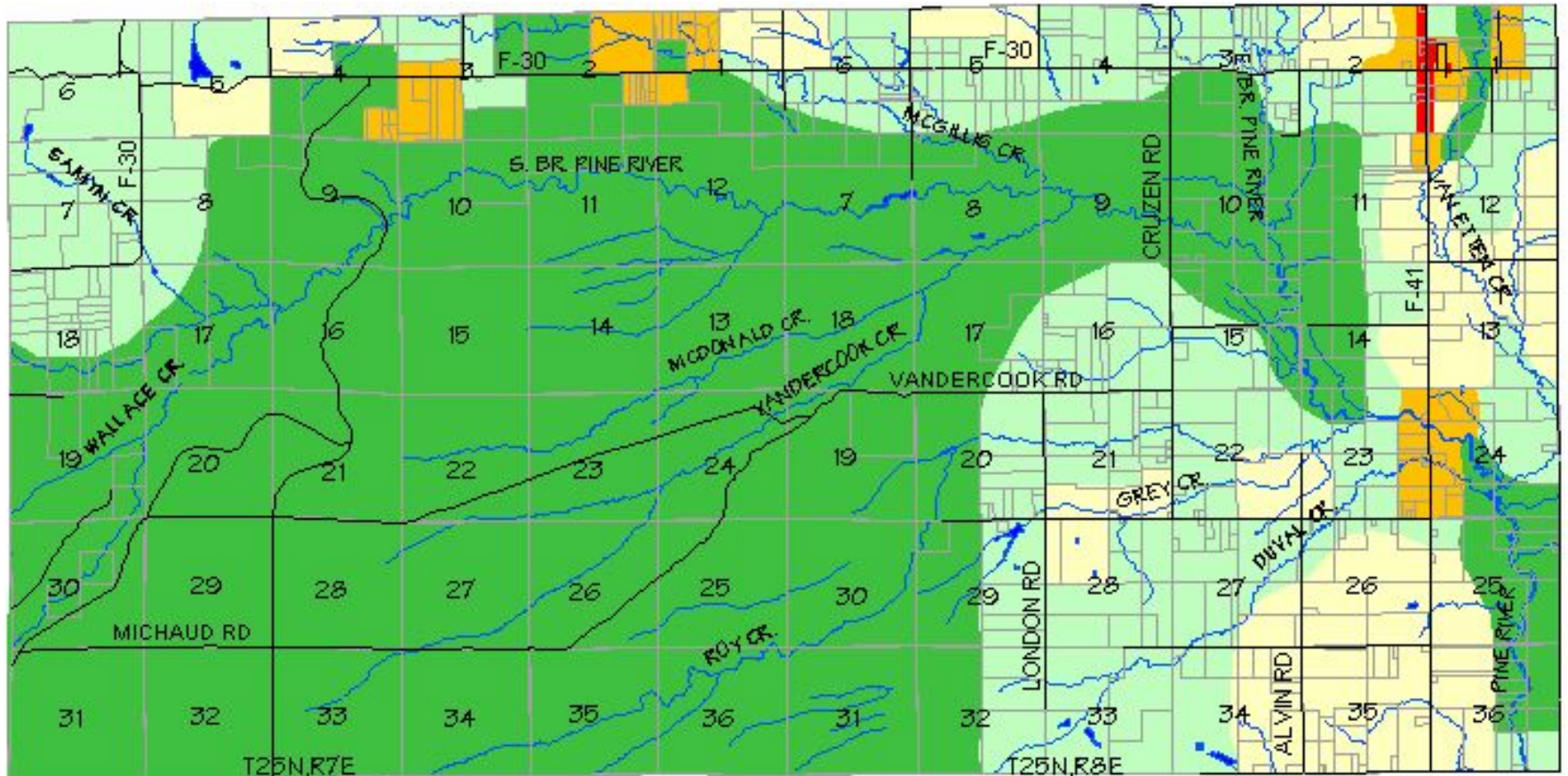
The final critical step in completing a Master Plan is to determine the types, location and intensities of development that will occur over the next twenty years. With the establishment of a Future Land Use Plan, Mikado Township intends to ensure that existing land uses such as residential, commercial and industrial can continue; that irreplaceable resources such as water, wetlands and forestlands and farmlands will be protected; and that reasonable growth can be accommodated with minimal land use conflicts or negative environmental impacts.

The Township Planning Commission with public input and assistance from NEMCOG developed future land use recommendations for Mikado Township. Recommendations are based on an analysis of several factors including: social and economic characteristics, environmental conditions, existing land uses, available community services and facilities, existing patterns of land divisions, current zoning and community goals and objectives.

### Land Use Planning Areas

Listed below are the six different future land use planning areas. **Figure 7-1** is the Future Land Use Map of Mikado Township, which depicts the locations of future land use planning areas. This section will provide explanations of each land use planning area, including purpose, recommended development density and, compatible uses.

- Resource Conservation
- Forest Recreation
- Agricultural
- Medium Density Residential
- Village Commercial
- Light Industrial



**Mikado Township  
Future Land Use**

- Agriculture
- Forest Recreation
- Medium Density Residential
- Resource Conservation
- Village Commercial

Draft: March 2002



## Natural Resources

### **Resource Conservation**

Mikado Township recognizes that the presence of wildlands contributes significantly to the quality of life and the rural character, which is valued by the Township residents. Locations recommended for this category include much of the western half and approximately one third of the eastern half of the Township.

The Resource Conservation category includes all of the U.S Forest Service and Michigan Department of Natural Resources lands and large tracts of privately owned lands forest lands. Huron National Forest's Pine River Kirtland's Warbler Management Area is located in this area. One of seven Kirtland's Warbler management units in the Huron National Forest, the Pine River Unit covers 8,900 acres in the western part of the Township. Segments of the Pine River and its many tributaries flow through the area. Road access is limited and consists primarily of seasonally maintained county roads.

The Resource Conservation areas should be protected from intense development without denying private property owners reasonable economic use of the land. Primary uses to be encouraged in this category include hunting, fishing, skiing, hiking, camping, wildlife management and forestry management. This plan encourages the retention of contiguous resource areas, river greenbelts, wetlands, scenic areas and wildlife habitat.

The Resource Conservation category is designed to provide protection to environmentally sensitive areas, while allowing for very limited and low intensity development to occur. This development would be consistent with recreational and conservation uses. A development density of one dwelling per 20 acres is recommended for the category. Low density residential development (one house per 20 acres) would be allowed. Under a special use permit, properties located along primary county roads could have one house for every ten acres. To protect sensitive areas and maintain larger tracts available for other uses, clustering based on density equivalents (one house per twenty acres) should be encouraged.

The plan further recommends incorporating open space development options, river set-backs, native vegetation greenbelts, waterfront overlay zones, access management, and landscaping requirements into the Zoning Ordinance. This future land use plan recognizes that existing parcels within the planning area may be less than the recommended minimum lot size. The plan does not intend to restrict the construction of new residences or continued residential use of these existing parcels.

### **Forest Recreation**

The Forest Recreation category is the second most extensive land use category recommended for the Township. The areas are concentrated in the eastern half and along the northern border of the Township. Many of the large tracts either have seasonal residences or are vacant. Locations recommended for this category are shown on the future land use map, **Figure 7-1**.

This category encourages the continuation of resource management and wildlands recreation activities. The plan recommends this category accommodates single family dwellings at an average density of one unit per two to five acres. Larger residential lots provide privacy and tend to maintain ecological integrity of the natural resources.

With the exception of County Roads F 30 and F 41 and portions of Kings Corner, Cruzen, Wissmiller, Goddard, Alvin, Michaud and Vandercook Roads; the transportation network is mainly gravel base, secondary county roads, The Township intends to work cooperatively with the Alcona County Road Commission to maintain and improve the road network. However, there are no intentions on upgrading the gravel road network to a paved road network. No municipal water or sewer service will be available. Buffers or physical separation from incompatible uses (commercial and industrial) are necessary when Forest Recreation areas are located next to more intensive development. The plan further recommends incorporating open space development options, river set-backs, native vegetation greenbelts, waterfront overlay zones, access management, and landscaping requirements into the Zoning Ordinance

Along with low density residential uses, forestry activities associated with timber and wildlife management would be considered compatible in this area. Other uses include vacation homes, hunting camps, parks, and playgrounds.

Under the special approval process in the Township's zoning ordinance, recreational camps and clubs (recommended on ten acres or more) and golf courses and resorts (recommended on twenty acres or more) would be allowed with site plan approval by the township planning commission. Additionally, gravel pits with site reclamation plans, saw mills, retail commercial enterprises related to recreational activities and home occupations would be allowed under the special approval process, provided the activity is compatible with surrounding neighborhoods.

This future land use plan recognizes that existing parcels within the planning area may be less than the recommended minimum lot size. The plan does not intend to restrict the construction of new residences or continued residential use of these existing parcels.

### **Agricultural**

Mikado Township recognizes the presence of farmland contributes significantly to the scenic and rural character valued by the Township residents. The Agricultural land use designation is intended to encourage the continued existence of farms in the Township. The nine designated areas are primarily located in the eastern portion and along the northern border of the Township, as shown on the Future Land Use Map, **Figure 7-1**.

This category encourages the continuation of farming in the Township. Farm dwellings and agricultural accessory buildings are allowed, as well as crop production and raising of livestock normally associated with farming activities. The plan recommends this category accommodates single family dwellings at an approximate maximum density of one unit per five to ten acres. Plant nurseries, greenhouses, bed and breakfast inns, churches, and forest and wildlife preserves are also allowed.

Special uses may be allowed if they are designed to be compatible with the primary uses. Where compatible with surrounding uses, private clubs, veterinary services, human care facilities, mobile home parks, golf courses, publicly owned buildings and publicly owned parks would be allowed with an approved site plan under the special approval process.

With the exception of County Roads F-30 and F-41, and portions of Kings Corner, Cruzen, Wissmiller, Goddard, Alvin, Michaud and Vandercook Roads, the transportation network is mainly gravel base, secondary county roads. The Township intends to work cooperatively with the Alcona County Road Commission to maintain and improve the road network. No municipal

water or sewer service will be available. Buffers or physical separation from incompatible uses (commercial and industrial) are necessary when Agricultural areas are located next to more intensive development. The plan further recommends incorporating open space development options, river set-backs, native vegetation greenbelts, waterfront overlay zones, access management, and landscaping requirements into the Zoning Ordinance

## Residential

### **Medium Density Residential**

The Medium Density Residential development category is primarily designed to accommodate single-family dwellings on lots with a minimum size of one half acre. The medium density residential category is intended to preserve existing residential development where land has already been subdivided into smaller lots and to expand specific areas for future residential growth adjacent to F-30 and F-41.

Principal uses would include single family dwellings and two-family dwellings. Special uses may be allowed if they are designed to be compatible with the residential setting. Other uses to be considered include home occupations contained within the dwelling; mobile home parks; bed and breakfast facilities; churches and associated structures; parks and playgrounds; schools and libraries; community buildings and publicly owned buildings; public utility buildings; and publicly owned and operated parks. The township should require site plan review and special approval for all uses other than individual single and two family homes. Development regulations within waterfront areas should be designed to address Township residents' concerns regarding water quality and streamside protection.

Older platted subdivision areas contain lots created prior to implementation of the Mikado Township Zoning Ordinance. These lots-of-record are smaller than minimal lot sizes in current residential zoning requirements. Future development regulations should recognize these conditions and provide for the reasonable continuance of their use and character. Renovation and redevelopment of existing streamside properties is expected to continue as seasonal residences are replaced by year round homes. The renovation and redevelopment should be sensitive to the protection of native vegetation greenbelts.

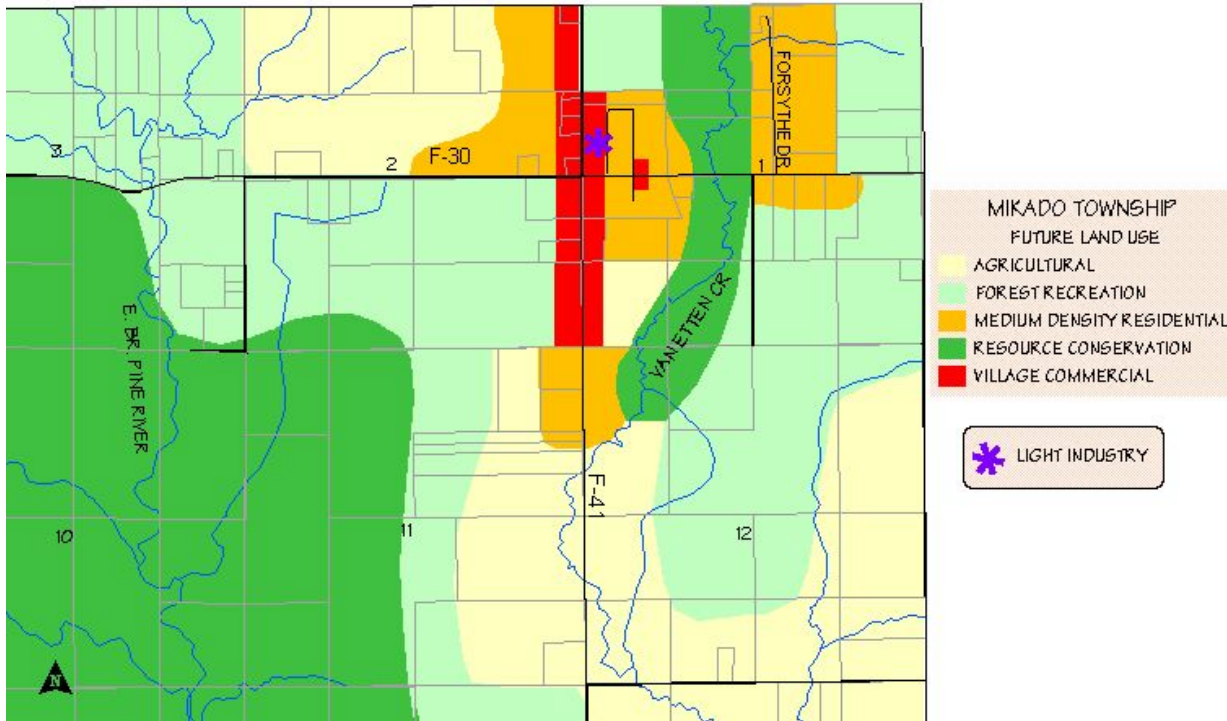
Due to a lack of public water and sewer service available, higher density residential uses, such as apartments, townhouses, condominiums, mobile home parks, convalescent or nursing homes and manufactured home developments should be restricted. If adequately engineered wastewater disposal systems are included as part of the design, higher density development can be considered.

It is also important to note that under state law, manufactured homes are allowed in any residential area if the structure meets all requirements set for site-built homes. Additionally, a manufactured home development would be compatible with the multiple-family portion of the residential area. However, given the soil limitations for septic system drain field operation, compact mobile home parks could not be accommodated unless adequately engineered wastewater disposal systems are included as part of the design.

Commercial and Industrial

**Village Commercial**

While much of the commercial services for Mikado Township are met by facilities located in the Harrisville, Oscoda and Lincoln, the Township wishes to set aside an area to accommodate additional local commercial uses. The Township recognizes the importance of maintaining the community identity of Mikado. A small commercial center serving the needs of Township residents, tourists and persons passing through on F-30 and F-41 is important to retaining the community identity. The designated area is located along F-30 and F-41 within the area considered the "Town" of Mikado.



The Village Commercial category is designed to accommodate small scale retail, service and some public service uses. Due to a lack of public water and sewer service, higher density and large scale development is not recommended in the township. This area incorporates existing residential and commercial uses. The existing commercial uses are primarily retail and service types of uses. Allowed uses in commercial zones would include retail and service stores, professional offices, banks, schools, restaurants, taverns, fraternal organizations, and rental units. Use requiring special approval would include gas stations, auto repair businesses, auto sales and service, drive-in food and drink establishments, veterinary service and hospital (not including kennels), motels and residences within a commercial establishment.

Efforts should be undertaken to improve the appearance of the commercial center. The townships intends to pursue funding sources to develop and implement a streetscaping plan. The plan may include tree planting, street lighting, curbs, parking lots, landscaping and sidewalks. Ordinances to regulate blight and building conditions in the business district should be enforced.

It is recommended the Township adopt regulations for site plan review, access management, sign, billboard and landscaping to maintain traffic safety and minimize any negative visual impacts of development along the main roads. It is further recommended the Township implement zoning that allow for cluster commercial development that would share driveways and parking lots, and create pedestrian friendly environment, while maintaining open space, protecting sensitive areas and minimizing visual impacts.

### **Light Industrial**

Industrial parks are located in the adjacent communities of Lincoln and Oscoda. The facilities provide necessary utilities and services, and have sites available for industrial type operations. Furthermore, analysis of soil conditions on the natural resource section found soils to be poorly suited for septic fields. Given existing industrial parks in adjacent communities and the lack of public water and sewer service in Mikado Township, large scale industrial development is not accommodated in this plan. A small industrial future land use area is located in the northeast corner of the Village Mixed Use area and is shown as a purple asterisk. The industrial future land use category is designed to provide sites for wholesale activities, warehouses, retail operations that require large outside storage areas, and light manufacturing operations. Operations are subject to performance standards relative to impacts on the community. This district is compatible with a business district, but not compatible with residential districts without a required buffer.

### **Special Issue Areas**

#### **Roads**

Money for maintaining county roads comes from state and local sources, including Mikado Township. The Township is working under a four year capital improvements road plan. A 2 mil road millage generates approximately \$38,000 each year for road work. The Township pays 50 percent of the cost of upgrading roads to a paved surface. The Township intends to work cooperatively with the Alcona County Road Commission to maintain and improve the road network. However, there are no intentions on upgrading the entire gravel road network to a paved road network.

Another major transportation issue in the Mikado Township is the repair and upgrading of bridges. Nine of the 13 bridges in the Township have been upgraded or replaced. The Township contributes 5 percent, up to \$15,000 for bridge replacements. Work should continue on upgrading the bridges, setting a high priority for bridges on the critical bridge list.

#### **Waterfront Residential**

To preserve the scenic beauty, property value and environmental integrity of areas adjacent to rivers and streams, the plan recommends developing a "Waterfront Overlay Zone" designation along sections of the Pine River and its major tributaries. With such a specialized designation it will be possible to develop residential standards specific to the unique environment found in waterfront areas. Development regulations within the waterfront residential area should be designed to address Township residents' concerns regarding water quality and shoreline protection. Compatible land uses are one single-family dwelling on each lot and parks and playgrounds.

Structures should be sited 65 feet from the ordinary high water level of the streams and rivers in the overlay zone. Maintenance of up to 35 feet native vegetation protection strips should be required; landowners on developed lots should be encouraged to re-establish native vegetation greenbelts. The recommended minimum lot size is 30,000 square feet and the minimum lot width on the water is 100 feet. However, many older platted subdivisions in waterfront areas contain lots created prior to implementation of the Mikado Township Zoning Ordinance. These lots are typically smaller than minimal lot sizes in current residential zoning requirements. Future development regulations should recognize these conditions and provide for the reasonable continuance of their use and character.

Keyhole development or high-density second-tier development with shared private waterfront access may be allowed with restrictions to limit density and development size. Keyhole development may increase the threat of shoreline erosion, surface pollution, increased noise and conflicts between lake users.

### **Water and Sewer**

According to information obtained from the USDA Soil Survey, much of the township has severe limitations for septic system drain fields. The limitations include depth to water table, wetness, poor filtering capacity and ability to perk water. The analysis of soil constraints can be found in Chapter 4 of this plan. Due to a lack of public water and sewer service, higher density residential uses, such as apartments, nursing homes and manufactured home developments as well as higher density commercial and industrial development should be restricted. If adequately engineered wastewater disposal systems are included as part of the design, higher density development can be considered.

The Master Plan did not include a detailed study of septic systems in the community of Mikado. However, given the high water table and fine soils, localized problems are likely. The cost of developing a public sewer system would be prohibitive. This plan encourages upgrading of individual septic systems to mounded or secondary treatment systems. The Township should also pursue funding sources to assist landowners with upgrading septic systems or possibly developing cluster systems where appropriate.

### **Streetscaping Planning Area**

During the visioning workshop and subsequent planning commission workshops, the community identified streetscaping as a priority. The area identified as needing streetscaping renovation is at the village crossroads covering an area one-quarter mile north and south on F-41 and one mile east and west on F-30. Both the design and implementation of streetscaping projects are very costly endeavors. It is recognized the Township could not complete such a project with its current budgetary constraints. In order to complete this needed project; the township will explore supplemental funding sources such as grants, loans, volunteer donations, and special assessments.

### **Open Space Development**

Methods which other communities have employed to help protect and preserve privately held forest and farm lands, while protecting a landowner's economic investment include the Purchase of Development Rights (PDR), conservation open space development standards, clustering requirements for residential uses and tax breaks or incentives for continuing forestry and farming use. The conservation open space residential and commercial development design standards are effective means to preserve scenic views, rural character, farmland, meadows,



woodlands, steep slopes and wetlands with a target of preserving 50 percent of the land within a development. It is recommended that these alternatives be investigated for possible application in Mikado Township, as a way to balance economic rights with wildlands preservation goals.

### **Community Facilities**

With the assistance of community organizations and hundreds of hours of donated time, the Township has been able to develop the Mikado Civic Center and recreational facilities. The strong sense of community and working together for the common good attitude will surely achieve similar feats in years to come. This plan supports community efforts to further develop recreational facilities such as ball fields and community facilities such as a museum or expansion of the library. Mikado Township should pursue state and federal funding to help develop facilities. Grants typically require matching funds, a requirement that will be easy to meet given past fund raising efforts.

## **Chapter 8 - Plan Adoption and Implementation**

### **Public Hearing**

A public hearing on the proposed Master Plan for Mikado Township, as required by the Township Planning Act, Act 168 of 1959 as amended, was held on July 30, 2002. Section Nine of the Act requires that thirty days notice of public hearing be given in two publications at least two weeks apart and not less than seven days before the hearing. Notice of the public hearing was published in a local newspaper. A copy of the public hearing notice is reproduced at the end of this chapter.

The purpose of the public hearing was to present the proposed master plan and to accept comments from the public. In addition to the Planning Commission members, the Zoning Administrator, Township Board Members and general public attended the meeting.

The public hearing began with a brief explanation of the planning process and plan development by NEMCOG planning staff. During the hearing, maps of existing land use, color-coded USDA soils maps, opportunities and constraints map and proposed future land use recommendations were presented.

### **Plan Adoption**

The Mikado Township Planning Commission formally adopted the master plan on July 30, 2002.

### **Legal Transmittals**

Michigan planning law requires that the adopted Master Plan be transmitted to the Township Board. The plan must also be submitted for review and comment to the county planning commission, if one exists or the Northeast Michigan Council of Governments. Copies of these transmittal letters appear at the end of this chapter.

### **Plan Implementation**

The Master Plan was developed to provide a vision of the community's future. It will serve as a tool for decision making on future development proposals. The plan will also act as a guide for future public investment and service decisions, such as the local budget, grant applications, road maintenance and development, community group activities, tax incentive decisions, and administration of utilities and services.

According to the Township Rural Zoning Act, comprehensive planning is the legal foundation of a zoning ordinance. Section Three of the Act states: "The zoning ordinance shall be based on a plan designed to promote the public health, safety and general welfare; to encourage the use of lands in accordance with their character and adaptability, and to limit the improper use of land; to conserve natural resources and energy; to meet the needs of the state's residents for food, fiber, and other natural resources, places to reside, recreation, industry, trade, service, and other uses of land; to insure that use of the land shall be situated in appropriate locations

and relationships; to avoid the overcrowding of population; to provide adequate light and air; to lessen congestion of the public roads and streets; to reduce hazards to life and property; to facilitate adequate provision for a system of transportation, sewage disposal, safe and adequate water supply, education, recreation, and other public requirements; and to conserve the expenditure of funds for public improvements and services to conform with the most advantageous use of land resources, and properties."

### Zoning

The zoning ordinance is the primary tool for implementing Mikado Township's Master Plan. The Mikado Township Board enacted a zoning ordinance regulating land use activities in 1968. Major revisions were completed in 1983 and 1994. This plan recommends the Township zoning ordinance should be reviewed to ensure the ordinance is consistent with the goals and the future land use plan. At that same time the zoning ordinance should be reviewed to assure it conforms to current State regulations. Amendments may include redefining zoning districts and district boundaries, changing minimum lot sizes and considering permitted uses and special uses in zoning districts. Amendments should consider developing standards for site plan reviews, cellular and transmission towers, landscaping and screening, greenbelts and water quality buffers, home occupations and home-based businesses, signs and billboards, access management on county primary roads, and parking requirements.

### Grants and Capital Improvement Plan

The Master Plan can also be used as a guide for future public investment and service decisions, such as the local budget, grant applications and administration of utilities and services. Many communities prioritize and budget for capital improvement projects, (such as infrastructure improvements, park improvements, etc.). A Capital Improvements Program (CIP) typically looks five years into the future to establish a schedule for all anticipated capital improvement projects in the community. A CIP includes cost estimates and sources for financing for each project. It can therefore serve as both a budgetary and policy document to aid in the implementation of a community's master plan.

### Recreation Plan

The Mikado Township or Alcona County must have a current DNR approved Community Recreation Plan to be eligible for recreation grant funding. Background information presented in this Master Plan update would serve as part of a township recreation plan. Additional work would include developing information on existing recreational facilities within the Township and the region, recreation goals and an action program for existing and proposed facilities. The DNR approved Recreation Plan would cover a five year planning period. Grant funds would be pursued for recreation projects identified in the Master Plan and Community Recreation Plan. Project may include improvements to the ball fields, expansion of indoor and our recreation facilities, bike and hiking trails, and public access onto the river and streams.

Legal Notice

Mikado Township Planning Commission  
[Minutes from public hearing]

Copy of  
Transmittal letter  
To  
Mikado Township Board

Copy of  
Mikado Township Board Endorsement of Plan

Copy of  
Transmittal letter  
To  
Northeast Michigan Council of Governments



## **Appendix A Community Input From Goal Setting Workshop**

List of comments from the Mikado Township sponsored goal setting workshop. The workshop was held on September 25, 2001 at the Township hall. The workshop was attended by 30 persons. The below comments are listed by categories, and do not represent any prioritization issues or concerns.

### **Community Assets to Protect**

#### PLANNING AND DEVELOPMENT

Farmland and old farmsteads  
Existing residential areas  
Subdivisions that are already built  
Preserve larger tracts of land  
Open space  
Village Center

#### COMMUNITY FACILITIES/INFRASTRUCTURE

Civic Center and playground area  
Fire Department  
Library Branch  
Mikado Cemetery  
Township newsletter  
Ball park/pavilion  
Fire and rescue services  
Post office  
Quality roads  
Two-tracks

#### COMMUNITY

Mikado Area Development Group  
Mikado Goodfellows  
American Legion Post 254  
Churches

#### COMMUNITY CHARACTER

Sense of community/working together  
People working together for common goals  
Small town atmosphere, look and feel  
High quality of living (clean air and environment)  
Kroners orchards and berry fields  
Historic homes and buildings – should be identified with plaques and could be listed with  
History of the Mikado area  
Kahn's General Store  
Historic Farm Houses and Historic Businesses  
Indian settlement

NATURAL ENVIRONMENT

Beauty of the countryside/farms and forests  
Forests and wetlands  
Natural areas  
National Forests and State Forests  
Farmlands  
Access to public lands  
Wildlife and fish  
High quality river corridors

RECREATION AND PUBLIC LANDS

Recreational outdoor areas  
Ball fields and playgrounds  
Water access  
Pine River access  
Snowmobile trails  
Access to hunting areas  
Fishing sites along the rivers  
Fishing and hunting areas  
Recreational trails

**Community Problems to Address**

PLANNING AND DEVELOPMENT

Idle farm land and farmland split into tracts 10 acres and larger should still be zoned and assessed as agricultural  
Need to limit time when garbage can site at curbside in front of homes  
No more burning at St. Vincent DePaul or other residences  
Cutting of grass and weeds in town  
Put limit on growth of town – need to be kept small  
Junk cars  
Trash in forests

GOVERNMENT

Farmland is taxed for residential not agriculture  
Don't change lands being farmed into forest assessment classifications  
Need to increase tax base for support services  
Need to encourage areas for more dollars to be spent in Mikado Township

INFRASTRUCTURE,

Problems with private septic systems  
Abandoned wells  
Lack of sewer system in Mikado  
Parking areas are limited and unmarked  
No sidewalks in town  
Roads and bridges need to be maintained  
Lack of organized parking areas at post office and other businesses in town  
Lack of safety lighting on bridges  
Need more street lighting

#### COMMUNITY FACILITIES

No emergency shelters for hazards  
Larger library with extended services and high speed internet access  
No medical facilities

#### COMMUNITY SERVICES

Lack of public transportation  
Lack of local internet access  
Brown-outs  
Two phone exchanges in the Township  
Need more pay phones  
Township residents by two different post offices  
Safety problems at F30 and F41 intersection  
Lack of speed limit enforcement on F41 in town  
Insufficient amount of police protection  
Excessive traffic speeds  
Speed limit in town too fast – traffic light at intersection of F41 and F30  
Lack of enforcement of speed limits through town

#### COMMUNITY CHARACTER

Lack of town theme  
Town looks poverty style  
No streetscape to have consistent theme and welcome to community  
Streets in Mikado too dull - no decorating or plants and flowers  
No continuity to demonstrate that we are a town and not a group of scattered businesses. For example street lamps, matching flower boxes, decorations and flags on street poles  
No recycling opportunities in Mikado

#### RESIDENTIAL LAND USES

Junk cars in yards  
Too much junk in peoples yards  
Dilapidated buildings  
Low quality housing and poor quality mobile homes  
Property is being used just for storage  
Run down homes with junk in yards  
Run down homes with junk cars  
No retirement living – independent or assisted care facilities

#### COMMERCIAL AND INDUSTRIAL

No industrial park  
Lack of economic growth  
Need to clean up commercial yards of businesses in town  
No dedicated commercial zone in downtown without residential homes  
Lack of businesses and jobs  
Lack of motels and campgrounds  
Lack of eating places

#### RECREATION AND PUBLIC LANDS

No youth center/Lack of community activities for youth

No youth activities and recreation, bike trails and BMX trails  
Bruces Park needs to be improved  
Activities and places for young children  
Snowmobile access from Stout Road to town  
No local maps available or on tourists sites  
No attractions for out-of-towners to enjoy  
No bicycle paths or pedestrian walkways  
No designated snowmobile access trail from Stout Road to town and no designated snowmobile parking area  
Nothing to occupy the youth of the township  
Need better playground facilities

#### NATURAL ENVIRONMENT

No awareness of forest being cut or rivers drying up  
Sediments in the rivers degrade water quality  
Poor water quality of some rivers and creeks  
Drink water problems both quantity and quality  
Preserve all natural resources – don't trade away wetlands  
Water wells problems with water quality and quantity  
Van Etten Creek needs to be cleaned  
Open space on land - not to disappear – don't get crowded  
Dumping in the woods and old dump sites

#### COMMUNITY

No smoking at bingo nights  
Lack of ownership of school system township is split by two school systems  
Information or welcoming center to inform new comers and tourists of available local and neighboring business services and community assets such as historical sites, camping and fishing areas, local organizations and their functions  
Mikado is not on maps  
No bulletin board in town showing map of community and activity areas  
No scouting programs  
No community involvement  
Historical sites not listed  
Kahn General Store needs to be fixed up

## **Mikado Township in the Year 2022**

### PLANNING AND DEVELOPMENT

A mix of large and small tracts of land

### RESIDENTIAL AREAS

Energy efficient structures with solar and wind power

### COMMERCIAL AND INDUSTRIAL DEVELOPMENT

Small industrial park

No X-rated businesses

Industry with good jobs such as high tech

Family café and drug store

Banking and health care services are in town

No fast food restaurants

### NATURAL RESOURCES

Kids swimming in Van Etten Creek

Abundant wildlife of all types

Abundant nature

A clean unpolluted town

Farms and farmland

Abundant public and private forest lands

Still farms

Open lands

### COMMUNITY SERVICES

More churches

Signage directing people to important sites

Map in the community with location of key sites such as businesses and recreation areas

Welcome center

Internet site with web page

Day care center

Bus system that is county wide

ATM machine at the bank

Civic organizations still play an important role

### INFRASTRUCTURE AND COMMUNITY FACILITIES

The Mikado Civic Center is a different color

Sewer system in the community

Nice library

School next to the library

Youth center

Post office with bigger parking lot

Our kids are in Alcona County Schools

Good roads and bridges

An east west freeway servicing this part of the state

Fire department with new clean equipment

Speed control

Stop light at the F-41 and F-30 intersections

VILLAGE CENTER

Clean and well kept village center

Streetscaping with limited access

Towns that say "Welcome" businesses have a theme, continuity of appearance

Sidewalks in town

A lot of people walking in the community

Good parking facilities in town

No high rise buildings

RECREATION AND PUBLIC LANDS

Still have national and state forests

Bike paths in town and leading into the federal forests

Picnic areas and parks on rivers

Walk to nearby parks

Active recreation areas with ball fields and playgrounds

Groomed x-country ski trails that are used as bike trails in the summer

Campgrounds

COMMUNITY CHARACTER

Welcome group for new residents and businesses

Kahn General Store is preserved and turned into a museum

History is preserved

Mikado Days festival

Future Land Use Area	Acreage	Maximum Density	Primary Uses	Special Uses
Resource Conservation	27,966	1 unit / 20 acres or 1 unit / 10 acres	Hunting, fishing, skiing, hiking, camping, wildlife management and forestry management	
Forest - Recreation	11,332	one unit per two to five acres	Low density residential uses, timber and wildlife management, vacation homes, hunting camps, parks, and playgrounds.	Recreational camps & clubs, golf courses, resorts, gravel pits, saw mills, retail commercial enterprises related to recreational activities and home occupations.
Agriculture	4,861	one unit per five to ten acres.	Farm dwellings and agricultural accessory buildings, crop production and raising of livestock, single family dwellings, plant nurseries, greenhouses, bed and breakfast inns, churches, and forest and wildlife preserves are also allowed.	Private clubs, veterinary services, human care facilities, mobile home parks, golf courses, publicly owned buildings and publicly owned parks
Medium Density Residential	926	One unit per 1/2 acre	Single family dwellings and two-family dwellings.	Home occupations contained within the dwelling; bed and breakfast facility; churches and associated structures; parks and playgrounds; schools, libraries; community buildings and publicly owned buildings; public utility buildings; publicly owned and operated parks. Farms on parcels ten acres or more.
Village Mixed Use	400	One unit per 15,000 square feet to roughly two acres	Mix of residential, commercial and some public service use. retail and service stores, professional offices, banks, schools, restaurants, taverns, fraternal organizations, and rental units	Gas stations, auto repair businesses, auto sales and service, drive-in food and drink establishments, veterinary service and hospital (not including kennels), motels and residences within a commercial establishment. Community uses such as parks, churches, schools, libraries or cemeteries, in addition to home occupations (utilizing space inside the dwelling unit), mobile home parks and bed and breakfast facilities
Industrial	35	One unit per 10 acres	Wholesale activities, warehouses, retail operations that require large outside storage areas, and light manufacturing operations	