

Master Plan

Pierson Township

Montcalm County, Michigan

Adopted April 29, 1993

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As of April 29, 1993

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CHAPTER 1

INTRODUCTION AND EXECUTIVE SUMMARY

This is the first Master Plan to be adopted by Pierson Township. The preparation and adoption of this Plan is responsive to significant changes occurring within the Township. This Master Plan has been adopted by the Pierson Township Planning Commission under authority granted in the Township Planning Act, Act 168 of 1959, as amended.

PLANNING CONTEXT

Defining the Master Plan

Changes occur in every community whether or not planning occurs. The Master Plan for Pierson Township sets forth a rational means of guiding what goes where and when. More specifically, this plan presents extensive data regarding the Township. Using this data and views of Township officials and residents, planning recommendations are set forth as a guide to future decision-making.

The Master Plan includes a set of policies and planning recommendations to guide future change in Pierson Township. Implementing this plan can achieve the following:

- Protections of property values by providing proper land use locations and mix.
- Advance public health, safety and general welfare.
- Prevent “urban” problems by way of properly timed, orderly growth and change.
- Proper allocation of public funds to areas of greatest need.
- Presentation of valuable natural environments and wise use of resources.
- Maintaining a good quality of life for ourselves and our children.

Following adoption, the Master Plan is the official guide for future development decisions, both public and private.

How to Use the Master Plan

The Master Plan is the foundation for all private land use decisions and public investments. The Township Planning Commission, Board of Trustees, all other governmental agencies, residents and business people should refer to the Plan prior to proposing and/or making decisions regarding physical development of public improvements within Pierson Township.

How Does the Master Plan Affect Me?

Every landowner has aspirations of using the land for specific use. The Master Plan, while a policy document and not regulatory, does set forth a detailed future land use scheme for Pierson Township. As such, the Plan does determine future land use likely for every land owners’ parcel. Anyone intending to acquire land, home or business within Pierson Township should review this Plan in terms of what use(s) are planned for the site and neighborhood.

The Master Plan does act to limit land owner use options. For example, areas planned to continue as agriculture will not support manufacturing, nor would a commercial repair facility be located in an area planned for residential use. For this reason, landowners are indeed affected.

How Was the Master Plan Prepared?

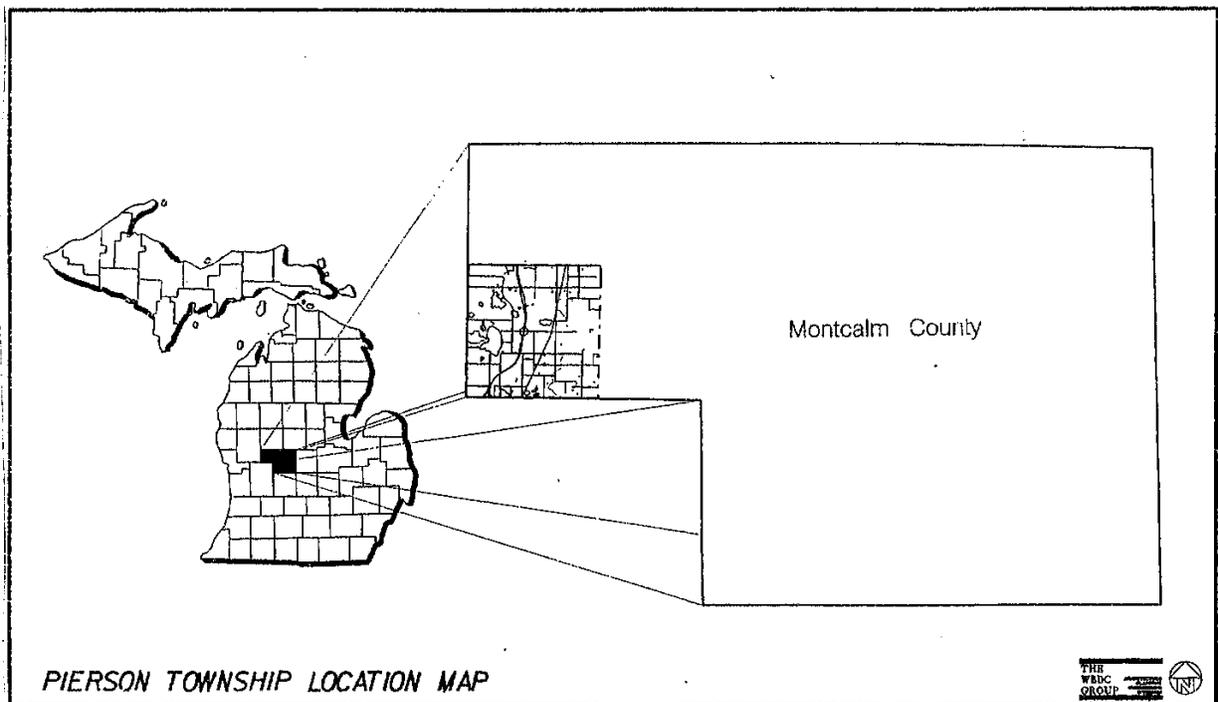
The Pierson Township Planning Commission and its planning consultants collected extensive data concerning the Township, much of which is reviewed in this Plan. Once this information was analyzed and trends identified, the Planning Commission held a well advertised public workshop at which ideas, goals, problems and opportunities were presented to and received from residents.

Alternative concepts were prepared concerning future physical development in Pierson Township. The Planning Commission discussed and evaluated alternatives at several public meetings. A final draft Master Plan was prepared representing a consensus opinion. Following public hearing on April 29, 1993, the Master Plan was adopted by the Pierson Township Planning Commission.

Regional Factors

Pierson Township is located a convenient 30 mile-drive north of the Grand Rapids Metropolitan area. This factor has spurred housing development west of US-131 in the Township's "lakes district". This single factor will drive development pressure for new housing, especially in the picturesque western half of the Township.

Montcalm County's agricultural business economy is significant both in terms of local employment and value of agricultural output. The areas of Pierson Township west of US-131 and in the northwest portion of the Township are very important to the County's agriculture.



EXECUTIVE SUMMARY OF THE MASTER PLAN

To help the reader in the review of this document, the following excerpts from the Master Plan provide a brief summary of the major proposals in the Plan. Please refer to the text of the Plan proposals (Chapter IX) and the Implementation Strategy (Chapter X) for the details content of the Master Plan.

Background Information

Initially, the Master Plan described existing conditions in the Township, Providing chapters on geographic and Historical Background, Community Character, Community Facilities and Transportation, Natural Features and Existing Land Use. This analysis pointed out some basic and important information:

- For the most part, the character of the Township west of US-131 is significantly different than the land area east of the Freeway. More specifically, the land east of US-131 is characterized by relatively level land, rural in character, limited tree cover, and agriculturally oriented as to land use.
In contrast, the land west of the freeway is characterized as more residential in character, many lakes, much higher ground and heavily wooded. It is little wonder that most the residential development has occurred in the lake areas of the Township.
- The Township has continued to grow in population during the 80's from 1,701 to 2,177 in 1990, or an increase of 11.6 percent. The median age is increasing while the persons per household decreased slightly.
- Over 31 percent of the housing units are seasonal, an increase from 22 percent in 1980.

Goals and Objectives

A set of goals and objectives were developed to form the framework by which the Plan proposals were developed. Assisted by citizen input through public workshops, the Planning Commission formulated the following goals: (See details of the text for the related objectives following each goal)

- Develop an appropriate land use policy which is oriented to preserving those important assets expressed by residents.
- Develop strong police and fire protection.
- Develop a Future Parks and Recreation Program for the Township.
- Develop a program to assure surface and groundwater quality.
- Develop a vehicular transportation system to assure safety, efficiency and ease of maintenance.
- Preserve and enhance those open water and wet land areas as wildlife habitat and recreation areas in relation to County and State laws.
- Develop commercial areas at appropriate locations to enhance land use compatibility rather than conflict with other uses.

- Protect waterfront areas from intense development.
- Protect the prime farmland in the Township from urban encroachment.

The Master Plan Elements

The following listing outlines the major proposals in the Master Plan. This section is followed by perhaps the most important Chapter of the Plan – Implementation Strategies.

- Develop general residential density limits to guide future zoning decisions.
- Initiate cluster housing development to preserve open space, wildlife habitat and recreation opportunities.
- Establish low density residential development as the primary residential density in the Township.
- Develop minimum standards for single mobile homes on single family lots in the Township.
- Develop minimum square foot requirements for dwelling units in the Township.
- Review and change as necessary, setback standards from waterfront areas, lot coverage, sewer hookup requirements, multiple access to waterfront areas for residential uses, storage policies along waterfronts, etc.
- Develop a management plan for all public lake access areas.
- Develop access management standards for the design of driveways along transportation corridors, particularly where commercial development may occur.
- Consider corridor planning to prevent future traffic and land use problems from occurring, particularly for existing and future commercial areas.
- Study the feasibility of straightening some county roads in the Township for greater efficiency.
- Improve the intersection of Dagget Road and Pierson Road to provide for CR 522 as the through road.
- Continue the monitoring program at the Sanitary Landfill to assure ground water is not becoming contaminated.
- Investigate the feasibility of sanitary sewer extensions from the Village of Sand Lake to areas of the Township.
- Develop a major recreational facility adjacent to the Township Hall to serve Township residents.
- Develop a parks and recreation plan to determine more specific recreation needs in the Township.
- Create a Planning Commission as opposed to a zoning commission.

- Include the Planning Commission in the review process regarding the allocation of monies for road improvements.
- Amend/rewrite the Zoning Ordinance and Map to provide regulations more in keeping with the recommendations of the Master Plan.
- Develop a regular communications procedure to keep residents as well as the press informed concerning activities in the Township.
- Develop a Capital Improvements Program.
- Assess and improve where needed a program for police and fire protection to assure efficient protection in the Township, including possible establishment of a volunteer fire department.
- Implement a fire and police protection information program for residents through general information.
- Improve 911 response time by opening a dialogue with the Montcalm County Sheriff's Department.
- Recommended changes in the Zoning Ordinance including but not limited to the following: site plan review, special use permits, planned unit development,, specifics on the operation of the Board of Appeals; parking and loading regulations, signs, definitions and general organization of the Zoning Ordinance.

Implementation Strategies

Perhaps the most important section of the Pierson Township Master Plan is a description of the proposals accompanied by important implementation considerations such as priorities, general time frame, the need for zoning changes, the need for inclusion of the proposal in a capital improvements program, and finally, identification of those responsible for implementation. This last chapter should be reviewed thoroughly to understand the importance of the Master Plan document.

CHAPTER II

THE GEOGRAPHIC AND HISTORIC BACKGROUND OF PIERSON TOWNSHIP

In order to understand Pierson Township as it is today and attempt to project how it will be in the future, it is necessary to consider its geographic setting and factors influencing its development over time.

The Geographic Setting

Highway US-131 divides Pierson Township into distinct halves. The Township's west half is a diverse terrain of lakes, woodlands, wetlands and steep slopes. The lake areas (Big Whitefish, Little Whitefish, Bass Lake, etc.) are a result of glacial and fluvial deposition from the great ice age. The land rises 40 to 60 feet east and west of the lakes. The Cannonsville Road interchange at elevation 977 is the highest point in the Township. The lakes provide a variety of recreational uses and, where practicable, the shorelines have developed into permanent and seasonal residential dwellings. Lowlands adjacent to the lakes are poorly drained wetlands and unsuitable for traditional agriculture or any type of development. Following clearing by early settlers, some areas of poorer soils have reverted to scrub second growth timber.

In contrast, the east portion of the Township is predominately farmland, the noticeable exception being the large wetland historically called Bear Swamp and the wetland areas near Long, Crooked, and Round Lakes. Overall, land east of US-131 is mostly level and suitable for agriculture. A network of well defined County drains aids farming activity.

Climatic conditions in the Township are provided below as reported by the weather station in Greenville:

January Average Minimum:	14° F/-10° C	Average Maximum	29° F/-2° C
July Average Minimum:	58° F/14° C	Average Maximum	84° F/29° C
Growing Season:	140 Days		
Days below 0° F or -18° C:	10	Average Annual Rainfall:	33 in./84 cm.
Days above 90° F or 32° C:	14	Average Annual Snowfall:	55 in./140 cm.

Pierson is located approximately thirty miles north of the Grand Rapids metropolitan area. This relationship has contributed to the steady rate of growth (approximately 30% per decade) the Township has experienced in the past thirty years. Pierson is approximately 160 miles from Detroit, 190 miles from Chicago and 260 miles from Indianapolis. US-131 provides a convenient, direct route to Pierson Township with Big Whitefish Lake just west of the Exit 114 interchange. The lakes, the wooded areas, and the rolling terrain all account for the attractiveness of the area.

Considering its geographic relationship to Grand Rapids and continued population growth, the Township must consider how it can best control the economic and social forces that emanate from Kent County and the associated impact on natural features and the quality of life that attract people there.

Historical Background

The following text is from The History of Montcalm County written in 1916 by John Dasef. The text is presented as originally written. This maintains the flavor of the author's writing style which, in itself, provides a glimpse of Township character at the turn of the century.

“Pierson was the eleventh township formed in the county and is situated in the northwestern part, in that section which originally, when the county was first organized, consisted of townships 11 and 12 north, ranges 9 and 10 west. This territory later was divided and formed the townships of Reynolds, Winfield and Maple Valley, thus reducing Pierson to its present limits. Pierson was officially organized on February 17, 1857, but the original petition for the erection of this township has been misplaced and the names of the original signers cannot be given. It is also noteworthy that there is no record made on the minutes of the board of supervisors for the erection of this township. The last minutes for this board are dated on January 7, 1857, and the next meeting is dated October 11, 1858, thus skipping the meeting which organized this township. As reduced to its present limits it is bounded on the north by Reynolds, on the east by Maple Valley, on the south by Kent County and on the west by Newaygo County. It was named after the family name of Martin Pierson, as several members of that family were its first settlers. The best farming lands in this township are situated in the southern and northeastern part. In the eastern part is a low and wet portion of land, covering the greater part of a number of sections and extending northwest towards Wood Lake, which is situated in section 15. This lower land is usually known as Bear Swamp, and takes its name, presumably, from a large bear which had its retreat there and is supposed to have escaped the hunters for a number of years – but this is more or less traditional. The western part of the township contains a system of lakes which are drained by a branch of the Tamarack River.

EARLY SETTLEMENTS

In the year 1852 Stephen R. Pierson settled in the township of North Plains, Ionia County. He was a native of Ontario County, New York. Two years later, influenced by favorable reports from him and a gentleman from Cortland, Michigan, two other brothers, David and Orson Pierson, and their father, started from New York with a team of horses, by which they journeyed to Buffalo, where they took passage to Detroit, Michigan. Upon reaching that place they again had recourse to their team, and drove through to the home of this brother in Ionia County. As government or State lands were the object of their visit, they came to town 11 north, range 10 west, and entered one hundred and sixty acres on section 27 and 28. Although other tracts were soon entered, it is thought to have been the first entry made in the township. They built a cabin, twenty by twenty-two feet in dimensions, one story high, with a roof sloping one way, the ceiling being so low as to allow a man scarce room to stand erect in. This cabin stood on the farm of Orson Pierson, and was the first built in this township.

On the 14th of December, 1854, George M. Pierson, having sent on some household goods, with a wife and four small children, left his home in New York and set out on his journey to join the settlement commenced by his brothers in Michigan. Kalamazoo was at that time the nearest railroad station. They, therefore, took the stage at that place, and Grand Rapids being the end of the line, made the rest of the journey in a lumber wagon. The cabin of his brother, being the only one in the township, was already filled to overflowing. The new party increased the company to eighteen. A wagon box served as one bed,

while those not so fortunate were stowed away as best they could be. The different families, however, soon built cabins on the land which they at once secured.

In the latter part of January, 1855, Milford Pierson was born, being the first white child born in Pierson Township. George M. Pierson built the next cabin in the township. Having no team, the work of clearing, which he soon began, was necessarily slow and difficult. In addition, he was compelled to spend much of his time away from home in order to procure the necessaries of life. When he moved into his cabin it had neither door nor window – blankets, hung before the openings, serving for this purpose. The snow lay several feet deep. On the 6th of March, Charles M. Pierson was born, being the second child in the township.

During the first winter, George M. Pierson made shingles, which he hauled to Rockford and sold for ten shillings per thousand, and at the same time paid five dollars per hundred weight for flour; but the woods abounded in game, deer especially being abundant, and from this source supplies were secured.

Round Lake, also, on the southeast quarter of section 33, as well as the larger bodies of water more remote from the settlement, abounded in schools of fish, which, with little trouble, could be secured at all times. George M. Pierson during the greater part of the time for five years was absent, except during Sunday, his work being about sixteen miles distant. He carried home on each successive Saturday night provisions for his family the week following. He dug up the ground with a mattock, and on that ground raised one hundred bushels of corn and sixty bushels of potatoes. The first year a large bear carried off a hog to the woods and devoured it while Mr. Pierson was absent from home. Six others were lost in the same way.

At the time of settlements the nearest trading post was Rockford. Mrs. G. M. Pierson resided in the township eight years before visiting a dry-goods store. Her sister, Polly Malvina Peck, who came to the township with her and lived here during the first years of its settlement, moved to the south part of the State. Their father, Thomas Peck, came to Pierson some years later and settled on section 27, and there he resided until his death. The first death in Pierson was that of a young man named Fish, who was accidentally shot by Hardy Cram. He was interred in the farm owned by George Pratt, from which he was removed to the cemetery at a later day.

The first wedding in Pierson was in 1856, when Isaiah Alley and Naomi Barker were married. Squire Panches, of Nelson, officiated. Dr. Daniel Shook was the first resident physician. He was born in Dutchess County, New York, and after practicing in his native county and Canada, settled in the north part of Pierson in the year 1862. He moved to Coral in 1877.

Caleb Rice was one of the first settlers in the north part of Pierson. He was born in New York, whence he came to this township in the fall of 1855. His father, Amos L. Rice, entered the southwest quarter of section 12, in February 1856. Rufus Reed entered the west half of the southeast quarter of section 2. Soon after Mr. Rice had built his cabin his son-in-law, G. M. Pratt, came to the township. He chose a location on section 5 and commenced to erect a mill, which he subsequently sold to Harvey Porter, who completed it some years later. It was the first grist-mill in Pierson Township.

VILLAGE OF PIERSON

The village of Pierson is located on land entered by David S. Pierson and Dexter Clark, who were for many years residents of the township. When the Grand Rapids & Indiana railroad was completed through Pierson, this village and another in the north part of the township were laid out. Neither attained any special importance or size.

O.H. Richmond opened the first store in Pierson, in 1867. The building which he erected stood on the southwest corner of the northwest quarter of section 27. This building was destroyed by fire.

In 1868, C.O. Taylor built a hotel, usually known as the Taylor House. Some years later he built an addition and then sold it to Otis Buck.

Dr. H.F. Kilborn was a native of Canada, and came to Pierson in 1869. He was the first physician in the village, but remained only a short time, when he removed to New York. Drs. D. Everett, H.D. Holden and Col. D. Johnson followed. The Pierson hotel was built by Richard Gage. In 1870 McConnell & Sons, of Elkhart County, Indiana, built a saw-mill at this place. It turned out, on an average, three millions of feet per year. In 1877 this firm erected the Empire Flouring Mills, of Pierson, at a cost of ten thousand dollars. It had a capacity of seventy-five barrels of flour.

Pierson was platted and laid out on October 18, 1870, for David S. Pierson, John L. Shaw and Dexter Clark, proprietors, by William Thorton, surveyor. This was the largest lumber center in Pierson Township, but of the history of the town from the time it was platted up to the present is merely a restatement of the history of any lumber town or camp during the time when the limber industry was at its zenith. This was a prosperous village, but when this business was exhausted the prosperity of Pierson waned. At present Pierson is a small village. It is a station on the Grand Rapids & Indiana railroad and the business interests of the town consist of three stores and two elevators. It is a small trading point where the people in the south part of the township can do their trading, although it is too close to Howard City to draw very extensively. At present it has a population of seventy-five.

OTHER VILLAGES

Pierson Township bears the honor, if that it might be called, of having the largest number of towns within its territory. In all there have been five towns platted and laid out in this township, namely: Pierson, Maple Hill, Sand Lake, Wood Lake, and Whitefish Lake. All of these, with the exception of Whitefish Lake, are located on the Grand & Indiana railroad.

Maple Hill, which lies in the southwest corner of section 2, was platted on October 22, 1870, for Caleb B. and William Price, proprietors, by Edward H. Jones, surveyor. This was the location of a saw-mill, which did a lucrative business for many years, but as far as the village goes, it never attained a great size. A store was kept for the accommodations of the employees of the mill and this had a fairly good trade at that time. There is one store located in Maple Hill now, but the major percentage of the business in this part of the township is carried on in Howard City.

Wood Lake lies to the south of Maple Hill, in the southeast corner of section 15, on the lake which bears the same name. This town, or village, was platted on March 21, 1870, for Henry M. Carpenter, Proprietor, by Edward H. Jones, surveyor. Wood Lake, which is now called Hiram, never attained any great prominence in the township. It now contains only an ice house for the storage of ice taken from Wood Lake. There are only a few dwellings left, and it is served by the rural route from Howard City.

Whitefish Lake, which is the largest resort in Montcalm County, was platted and recorded at two different times, namely: October 4, 1906, and August 14, 1907. The former plat was made for James A. and Mary A. Skinner. Both of these plats were surveyed and laid out by J. F. Daoust, surveyor. Whitefish Lake resort lies on the east side of Whitefish Lake, in section 20, and two miles west of Pierson is the nearest railroad station. During the summer, crowds of picnickers, camper, and persons desiring quiet and rest for a few weeks visit this resort.

Sand Lake has its major portion in Kent County, although one plat has been made and recorded in this county, but this part of the town does not attain prominence enough to deserve a lengthy discourse in this chapter.

Noticeable changes have occurred in Pierson Township since the preceding history was written in 1916. The automobile's widespread popularity has led to new and improved roads and highways. Consequently, the trucking industry's emergence has led to the decline of local railroads such as Grand Rapids and Indiana which no longer serves the Township. US-131 is the primary route to Pierson Township and the convenience it provides to Pierson-Grand Rapids commuters has contributed to Pierson's double digit growth since 1960.

The Township's lakes are still used for fishing, but as a recreational pursuit as opposed to a means of survival. The lakes provide other recreational opportunities such as water skiing, swimming, sailing, and hunting. The combination of lakes and convenient access from US-131 has encouraged seasonal and permanent residences in Pierson Township resulting in escalating land values.

Wildlife and wildlife habitat have also adjusted to growth and change. Although a large portion of the Township remains wooded, primarily in the western half, much of the eastern half has been cleared for agricultural purposes. Deer, in particular, adjust well to rural residential development. Typically rural residential development involves large lots (usually 5 acres or larger) which leaves significant amounts of existing tree cover untouched. Deer utilize sparse wooded areas and tree lines for travel corridors, cover and a food source. Row crops and vegetable gardens also provide deer with a food source. With recent mild winters, deer populations have increased substantially in recent years.

CHAPTER III

COMMUNITY CHARACTER

Population

Historic Trends

Pierson Township has experienced steady population growth in the past 30 years (31.2% average rate of growth, 1960-90). The transportation linkage provided by US-131, proximity to the Grand Rapids/Kent County job market, and the lakes and waterfront property has no doubt contributed to Pierson's growth rate. Pierson Township is the most easily accessed township (via US-131) in Montcalm County from the Grand Rapids area. Therefore, people working in Kent County who prefer Pierson's rural character can have both by utilizing the convenience provided by US-131.

In contrast, the County growth rate peaked during the seventies and averaged 14.1% from 1960-90. Table 1 shows the historic population of Pierson Township and Montcalm County.

TABLE 1
Historic Population
Pierson Township/Montcalm County

Year	1960	1970	1980	1990
Pierson Township Population	964	1,261	1,701	2,177
Percent Change Previous 10 Years	-	+30.8%	+34.9%	+28.0%
Montcalm County Population	35,795	39,660	47,555	53,059
Percent Change Previous 10 Years	-	+10.8%	+19.9%	+11.6%

Source: US Census, 1960-1990

Seasonal Population Variation

The current population figure for Pierson Township (2177) reflects those residents who were either residing in the Township on April 1, 1990 (census day), or those seasonal people who list Pierson Township as their primary place of residence. Seasonal residents are either "snowbirds", residents who spend the winter months in a warmer climate and summers in Michigan, or residents of Michigan or neighboring states who currently spend a limited amount of time in the Township.

While the percentage of seasonal residents may not be a significant issue in most communities, the seasonal variation in Pierson's population is large enough to be considered for the implications related to long range development planning. The Census lists 31% of the housing in Pierson Township as seasonal. In 1990, the average persons per household in Pierson Township was 3.00. Thus, the peak summer seasonal population could increase by 1,082 persons for a total population over 3,200. This aspect of the population, and its effects on the Township economy, will be discussed later in this report.

Population by Age

One important aspect of population is a comparison of age groups. Table 2 illustrates the 1990 age distribution of the Township population, compared to Montcalm County and the State of Michigan. Most notably, the Township has a high percentage of its population in the >5, 5-17 and 25-44 age groups compared to the County and State. Pierson's 0-17 and 25-44 age groups are similar in number, which is not uncommon. The high percentage of school age children is significant as they will become the Township's next generation of workers and parents. The key variable in retaining future generations is the availability of jobs in Pierson and nearby communities.

In the 18 to 24 year age category, Pierson is significantly lower than State and County percentages. These young adults have either pursued higher education or entered the job market. The closest colleges and universities are Alma College in Gratiot County, Central Michigan University in Mt. Pleasant, Ferris State University in Big Rapids, and Montcalm Community College in Sidney; all outside of the Township. Regarding employment opportunities, careers in farming and agriculture are possibilities, but the Township has a very limited commercial/industrial base. Montcalm and Kent Counties offer greater career choices and opportunities for young people wishing to live in the Township.

In the 45 to 64 age categories the Township is below, but similar to, the County and State. After age 65 the percentage of Township residents falls significantly below State and County levels. This may be due to southward migration, lack of suitable retirement housing options, the need for better nearby medical facilities, or a higher than average death rate.

Population by Age Group, 1990

Table 3 shows that the proportion of young people (% under 18) declined significantly during the seventies and stabilized in the eighties. Meanwhile, the median age has increased, perhaps indicating that the Township has retained a sizable portion of its young people from the sixties. This argument is further strengthened considering the percentage of seniors (% over 65) decreased during the seventies and experienced just a 1.2% increase in the eighties.

TABLE 2
Population by Age, 1990
Pierson Township/Pierson Village/Montcalm County

	Township	County	State
Age	Percent	Percent	Percent
5 & Under	9.3%	7.7%	7.6%
5-17	24.3%	20.9%	18.8%
18-20	3.2%	4.1%	4.8%
21-24	4.3%	5.2%	6.0%
25-44	33.3%	31.1%	32.1%
45-54	9.1%	10.0%	10.2%
55-59	3.8%	4.4%	4.3%
60-64	4.0%	4.4%	4.3%
65 & Over	8.8%	12.4%	11.9%
Total	100%	100%	100%

Source: US Census, 1990

The Township’s increasing median age is consistent with trends seen throughout most of the United States. This can be a cause for concern because of the resulting effects on the Township’s ability to provide community services for an aging population. Table 2 indicates that the Pierson Township population on average is younger overall than either Montcalm County or the State of Michigan. Pierson’s percentage of elderly persons (over age 65) is noticeably less than the County and State.

There are many issues which can be identified from analyzing the age breakdown of population. In Pierson Township, the following conclusions have resulted from this analysis:

TABLE 3
General Age Characteristics

	Pierson Township - 1970	Pierson Township - 1980	Pierson Township - 1990	Montcalm County – 1990	State - 1990
Median Age	25.3	27.5	30.7	32.3	32.6
% under 18	40.7%	32.7%	33.6%	28.7%	26.5%
% over 65	10.7%	7.6%	8.8%	12.4%	11.9%

Source: US Census, 1990

There are many issues which can be identified from analyzing the age breakdown of population. In Pierson Township, the following conclusions have resulted from this analysis:

- The strong percentage of young adults (age 25-44) and their children (age 0-17) suggests continued growth for the Township. Whether the Township can cultivate and enhance its economic base will determine, to a large degree, if the Township will remain a bedroom community to Montcalm and Kent Counties.
- The low proportion of the population between the ages of 18 and 25 is indicative of a local economy which is not diverse enough to accommodate new entrants into either the skilled or unskilled labor force.
- Although the Pierson Township lakes area appears to be a desirable location for retirement, the percentage of residents age 65 and over drops considerably compared to the County and State. Are escalating real estate costs for lake front homes excluding retirees? Are retirees leaving Pierson for milder climates or does the Township experience a higher than average death rate? Perhaps all of this suggests a need for desirable and affordable housing, transportation services and other public services used by elderly residents that will encourage them to remain in Pierson Township.

Persons per Household

Persons per household figures tell us much about the types of families residing in the Township. If the persons per household number is high (i.e. over 2.8), it may be assumed that there are many families with children still living with parents. If the number is low (i.e. less than 2.4), it may be concluded that many small households are present. Small households are often associated with retirees persons or families where children no longer reside at home. In Pierson Township, the high persons per household number corroborates a lower-than-average median age to suggest a younger community. This is also substantiated by Table 3 above.

**TABLE 4
Persons per Household, 1970-1990**

	Pierson Township - 1970	Pierson Township - 1980	Pierson Township - 1990	Montcalm County – 1990	State - 1990
Persons per Household	3.5	3.1	3.0	2.8	2.6

Source: US Census, 1970-1990

TABLE 5
Population by Race

Community	Total	White	Black	Hispanic Origin	Other
Pierson Twp.	2,177	2,132	1	22	22
Percent	100%	97.9%	.05%	1.0%	1.0%
County	53,059	51,216	960	888	342
Percent	100%	96.5%	1.8%	1.7%	0.65%
State	9,295,297	7,756,086	1,291,706	201,596	45,909
Percent	100%	83.4%	14.0%	2.2%	0.5%

Source: US Census, 1990

Population by Race

Pierson Township is a predominantly white community. Almost 98% of the Township, 99.5% of the village and 96.5% of the County population is white compared to 83% for the State of Michigan. A small percentage of Pierson Township residents are of other origins.

Educational Levels

High school education levels for Pierson Township residents are comparable to the County and State figures. The percentage of college graduates for the Township and County is approximately one-half of the State rate. This is indicative of a local economy based on agricultural, commercial, and manufacturing which requires fewer college educated workers.

TABLE 6
Educational Levels, 1990

	Pierson Township	Montcalm County	Michigan
Percentage of High School Graduates	72.9%	73.4%	76.8%
Percentage of College Graduates	8.9%	8.2%	17.4%

Source: US Census

Economic Profile

Labor Market

The labor market in Montcalm County has traditionally been tied to agricultural and manufacturing trades. Nearly 29% of the total 22,042 employed persons in the County work in manufacturing with large percentages also involved in retail trade (18%) and services (20%). The number of Montcalm County residents employed by the service industry, which includes tourism and other seasonal activities, increased by 43% between 1979 and 1989. This overall employment profile depicts a base which has been severely hurt by recent turns in the State's economy. Manufacturing-based local economies throughout Michigan are dealing with cutbacks and layoffs. This directly affects the retail trade industry, as residents have less expendable income. The service industry, while showing increases in employment, often provides low-paying, seasonal jobs which do not attract the young adults of Pierson.

The number of farms in Montcalm County, as reported in the Montcalm County Community Analysis, has declined 13% between 1982 and 1987, falling from 1132 farms in 1982 to 980 in 1987. This has been accompanied by an insignificant (0.8%) decline in the total land in farms for the county between 1982 and 1987 due primarily to an increase in the average farm size from 213 acres to 243 acres. This data is consistent with Statewide trends where the number of farms decreased by 12.3%.

TABLE 7 – Principal Employers in Montcalm County, 1991

Employer	# of Employees	Products
Greenville Products, Greenville	2000	Refrigerators
Hitachi Magnetics, Edmore	700	Misc. magnetic, ceramics
Federal Mogul, Greenville	575	Engine bearings
Hi-Q Mfg., Lakeview	260	Wiring devices
R.J. Tower, Greenville	210	Metal stamping
Northland Refrig., Greenville	150	Comm./household refrigerators
Printco, Greenville	140	Printing services
Double D Plastics, Greenville	130	Plastic products
Howard City Paper,	100	Headers for paper rolls
Greenville Tool & Die, Greenville	90	Tools, dies, jigs, fixtures
United Technologies, Greenville	90	Plastic injection molding
Master Unit Die Prod., Greenville	84	Tools, dies, jigs, fixtures
Wright Plastics Products, Sheridan	70	Plastic injection molding
Kalfact Plastics, Greenville	67	Plastic injection molding
Kysor Industrial, Greenville	50	Plastic products
L.P.I., Greenville	50	Finishes, powdered coatings
Parker Hanifan Brass, Lakeview	50	Brass fittings
U.S. Leisure Products, Cedar Lake	50	Molded & extruded rubber
Spud-Pack of Michigan, Edmore	40	Custom potato packing
Crystal Refining, Carson City	25	Petroleum refining
Total Employees:	4,931	

Source: County Profiles of Michigan, 1992

Tables 7 and 8 present a detail of Principal Employers and Employment by Industry for Montcalm County. Although these numbers provide a profile of Montcalm County as a whole, they may not translate well to Pierson Township. It must be emphasized that Pierson Township has 31% seasonal residents compared with 12.6% in the County. This seasonal population is, most likely, not involved with the same local labor markets as the permanent residents.

Pierson’s economy suffers from an inadequate local base. Commercial and light industrial development should be encouraged as a means of increasing the tax base and providing year-round jobs, but somehow such change should be balanced by the need to preserve the environment that attracts people to Pierson in the first place.

The US-131/Cannonsville Road interchange provides a logical location for commercial and industrial development. This interchange is centrally located, provides convenient access to potential development sites and is highly visible with good traffic volumes.

TABLE 8 – Employment by Industry in Montcalm County, 1989

	<u>Employment (Number of Employees)</u>	
	1979	1989
Total Employment	18,615	22,042
Components by Type:		
Wage and Salary	14,809	17,127
Proprietors	3,806	4,915
Farm	1,370	1,125
Nonfarm	2,436	3,790
Industry		
Farm	1,890	1,527
Nonfarm	16,725	20,515
Private	14,262	17,832
Agric./For./Fish	132	399
Mining	55	49
Construction	822	868
Manufacturing	5,474	6,289
Non-Durable Goods	---	---
Durable Goods	---	---
Transp. And Utilities	318	376
Wholesale Trade	716	413
Retail Trade	2,905	3,919
Fin./Ins./Real Estate	694	1,042
Services	3,146	4,477
Government	2,463	2,683
Federal	129	138
Military, Civilian	102	125
State and Local	2,232	2,420

No figure given indicates confidential information or fewer than 10 employees. Pierson Township employers are likely to be included in this small employer category.

Source: Montcalm County Economic Profile, Industrial Development Division, University of Michigan and the Michigan Department of Commerce.

Per Capita Income

Pierson Township’s per capita income is higher than Montcalm County’s, although both are lower than the State. Pierson Township’s per capita income figure may benefit from resident’s who work in Kent County.

Increases shown in per capita income 1980 to 1990 does not mean real incomes have doubled in the state. Income figures must be inflation-adjusted to show increase or decrease in purchasing power.

In addition, when looking at the Pierson Township numbers, the Census is based on the year round population. If per capita incomes for the seasonal residents were factored in, the Township’s income would most likely increase.

**TABLE 9
Per Capita Income: 1980, 1990**

	Pierson Township	Montcalm County	Michigan
1980	NA*	\$7,450	\$7,688
1990	\$10,661	\$10,081	\$14,154

Source: US Census, 1980-1990

* Not Available

Poverty Statistics

Generally, in 1989, Pierson Township residents were less likely to be living below the poverty level than residents in the rest of Montcalm County (8.5% of families below poverty level in Pierson Township, versus 12.6% in Montcalm County), and less likely than in the State as a whole (10.2% in 1980).

**TABLE 10
Household Income Distribution, 1990
Pierson Township**

Range	Less than \$10,000	\$10,000- \$14,999	\$15,000- \$24,999	\$25,000- \$34,999	\$35,000- \$49,000	\$50,000- \$74,999	\$75,000 Plus
Percent*	15.9%	7.9%	26.0%	21.2%	19.0%	7.6%	2.4%

Based on 680 Households in the 49339 Zip code *

Source: CACI, The Sourcebook of Zip Code Demographics, 1990

Percentage of Families with Income in 1989 Below Poverty Level:

Pierson Township: 8.5%

Pierson Village: 13.0%

Montcalm County: 12.6%

State of Michigan: 10.2%

(Poverty statistics are calculated by the Census Bureau and are based on the average national income and cost of living figures. Generally, the poverty level is assumed to include all of those households, individuals or families with incomes ten percent or more below the median income. That is, if the median income is reported to be \$10,000, all households with incomes less than \$9,000 would be identified as living in poverty. For statistical purposes, the poverty thresholds are computed at the national level only. No attempts are made by the Census Bureau to adjust these figures for State, County or local variations. For this reason, the numbers presented in this report should be used only for comparison of State, County and township data.)

The above information reflects only those persons who responded to the 1990 Census. Almost 31% of Pierson’s population is seasonal and may be included in the tabulation for other communities.

Housing Characteristics

Value

The housing supply in Pierson Township is generally of very high quality, with a mix of historic summer cottages and year-round homes in lake-oriented communities, farmsteads and new construction scattered throughout the Township. Table 11 compares the 1990 median value of specified owner-occupied single-family homes in the Township with adjacent townships, the County and State.

The median value in Pierson Township was substantially higher than the median value in Montcalm County, but lower than the State of Michigan. This is due to waterfront homes in the Township and the higher values of waterfront property. It may also be partly attributable to the growing desirability of the area as residence for persons working in Grand Rapids. Comparison of the median value data for neighboring Townships supports the argument that land values and housing are strongly influenced by waterfront sites.

Table 12 summarizes 1990 Census data concerning the value of specified owner-occupied homes in the Township, with percentage comparisons between Pierson Township, Montcalm County and the State overall. The value of Pierson’s housing stock falls between those for the County and State in all price ranges, with Pierson’s housing values more closely approaching the State. In the County, 64% of the housing stock is valued below \$50,000 compared with 48% in the Township and 38% Statewide.

TABLE 11
Median Value of Owner-Occupied Housing, 1990
Pierson Township and Surrounding Communities

Community	Median Value
Pierson Township	\$51,200
Maple Valley Township	\$39,700
Reynolds Township	\$35,500
Winfield Township	\$53,300
Montcalm County	\$42,600
State of Michigan	\$60,600

Source: US Department of Commerce, Bureau of Census

Table 13 below indicates that almost 22% of the housing units are mobile homes compared to 17.0% in the County and 7.5% in the State. The Township’s high percentage of mobile homes causes the median housing value to decrease. However, even with this high percentage of mobile homes, the median value of Pierson’s housing units is still \$8,600 higher than the County.

The average sale price of homes is slightly different than the median value as reported to the Census Bureau and shown in Table 11. According to the Montcalm County Association of Realtors, the 1991 average selling price for homes in Montcalm County was \$43,888.

Affordability

When calculating the availability of affordable housing, it is generally accepted that the average selling price of housing should not exceed 2.5 times the median income. Using this calculation, the minimum median household income for Montcalm County would be in the \$17,777 range (i.e., the average \$43,888 selling price of homes in Montcalm County divided by 2.5). Table 10 above indicates that over 60 percent of households in Pierson have annual incomes above that figure.

Pre-manufactured housing and multiple family units are examples of alternative low-cost, or affordable housing.

TABLE 12
Value of Specified Owner-occupied Housing Units, 1990
Pierson Township, Montcalm County and Michigan

Housing Value	Pierson Township	Montcalm County	State of Michigan
Less than \$50,000	48.2%	64.2%	38.5%
\$50,000 – 99,999	38.8%	32.6%	42.6%
\$100,000 -149,999	7.5%	2.6%	11.5%
\$150,000 – 199,999	2.6%	0.5%	4.2%
\$200,000 – 299,999	2.3%	0.2%	2.3%
More than \$300,000	0.65%	0.05%	1.0%

Source: US Census

While Pierson Township has a comparably high percentage of mobile homes, the availability of multiple family units in the Township is rather small at 3.5% in 1990. This trend may partially explain the decrease in the percentage of the Township’s elderly residents (over age 65) compared to the County and State. In other words, the limited availability of multi-family housing in Pierson forces its elderly to search elsewhere for suitable housing.

The 1980 census does not provide the number of mobile homes in Pierson Township. However in Montcalm County the percentage of mobile homes increased from 7.2% of total housing units in 1980 to 17% in 1990. A similar increase in mobile homes units has most likely occurred in the Township. While mobile homes and other pre-manufactured and modular units are considered undesirable in many communities, they usually constitute the only affordable housing option for people with modest income.

Pierson Township is similar to the County and higher than the State in the percentage of single family housing units (Township 74.7%, County 74.1%, and State 69.5%).

Seasonal Housing

Pierson Township has a substantially higher rate of seasonal housing (31%) than either Montcalm County (12.6%) or the State of Michigan (6%). Furthermore, the proportion of the Township’s housing stock which is for seasonal use has increased in the last 10 years – from about 22% in 1980 to 31% in 1990. Although many buyers who have purchased seasonal homes in Pierson are new to the Township, it is also possible that Pierson retirees who declare a permanent residence elsewhere have kept their house in the Township for seasonal use.

The increase in seasonal housing signifies that Pierson has been “discovered” by persons looking for second homes in a natural, diverse and easily accessible area. While these new buyers will most likely support policies which help maintain the Township’s natural character, land can only accommodate a limited amount of additional growth before its environment becomes permanently changed.

**TABLE 13
Selected Housing Characteristics, 1990**

	Township	Township	County	State
Single Family	845	74.7%	74.1%	69.5%
Multi-Family	40	3.5%	8.9%	23.0%
Mobile Homes	246	21.8%	17.0%	7.5%
Total Housing Units	1,131	100%	N/A	N/A
Seasonal Housing Units	356	31.5%	12.6%	5.8%

Source: US Census, 1990

The further increase of seasonal homes may depend significantly on the availability of waterfront lots and/or housing. In many lake locations around Michigan a small cottage or group of cottages will be demolished and replaced by a larger, more expensive home. As this process continues, the availability of lake front property decreases and price becomes more expensive resulting in more exclusive use and control of natural lakes. When the Township’s lakefront sites are totally developed the percentage of seasonal housing may level off or at least grow at a much slower rate, as it would only increase by the sale of newly developed lands.

The demand for retail services and employment can both be affected by a high percentage of seasonal housing impacting the cash flow of local retailers. The increase in seasonal homes may also impact tourism as increased private development of lake front property can generate pressures to reduce or eliminate public access to the Township’s lakes.

Seasonal residents and housing has increased by 9% during the eighties. While this validates the desirability of Pierson's lake areas for seasonal living and recreation, this type of growth increases congestion on roads and lakes, and creates a demand for public and private facilities such as boat launches, docks and convenience shopping.

Senior Housing

Table 2 indicates Pierson has a lower percentage of residents over age 65 compared to the County and State. The lack of suitable senior housing may explain why. The nearest senior facilities are located in Sand Lake (Mildred Houting Apartments) and in Howard City.

Building Permit Data

Recent County building permit data indicates sustained growth in construction activity. Overall construction has been steady throughout the past six years, showing almost a 27% average increase since 1986. The County Building Inspector verified that much of the new construction in Pierson Township has occurred around Big and Little Whitefish Lakes, although construction activity throughout the Township has been strong. Table 14 summarizes County building activity since 1986.

**TABLE 14
Construction Activity in Montcalm County, 1986-1991**

Year	1986	1987	1988	1989	1990	1991
Permits Issued*	703	866	866	807	981	891

*Building permits issued for new construction including houses, mobile homes, decks, pole barns, farm buildings, etc.

Summary

Pierson Township population has increases over 30% since 1960. Table 3 concludes that persons over 18 and under 65 (includes the baby boomers) have greatly contributed to this growth. Meanwhile the percentage of young adults (age 18-24) is lower than the County and State. This is not unusual for non-college communities, but whether these individuals will return to Pierson will depend somewhat on the availability of jobs either in Pierson or, more likely, jobs in Montcalm and Kent counties, and the preservation of the township's rural character.

Pierson's traditional economic base is related to agriculture with farms located in the east half of the Township and the northwest corner. County-wide, however, farm employment has declined. This trend is most likely true in Pierson where a comparison of 1980/1990 Township plat maps reveals an increase in lot splits of agricultural land. While a commercial center is emerging at the Cannonsville Road intersection, the Township lacks significant employment opportunities to attract and hold working adults. However, Montcalm and Kent County are employment centers within commuting distance and have contributed greatly to Pierson's growth.

Residents indicate they enjoy living in Pierson Township because of the relaxed, rural atmosphere, lack of crowding and congestion, the quality of the air and water and the opportunities for outdoor renewal and recreation. Many residents drive 20-30 miles to work in order to maintain residence with the Township.

Given its many assets and proximity to Grand Rapids/Kent County, continued growth seems likely. This poses the challenge of protecting and maintaining the characteristics of the Township that make it an attractive place to live. Decisions on how and where growth occurs must consider the natural and manmade assets that define the Township's character. In addition, Pierson's young adults should have the opportunity to find employment in or nearby the Township if they choose. Therefore policies to attract and create jobs should be instituted. Policies that protect natural features and those that stimulate jobs can be complimentary if careful consideration is given to future land use.

CHAPTER IV

COMMUNITY FACILITIES AND TRANSPORTATION

The 1992 Montcalm County recreation Plan separates the county into six park service districts. These districts were established based on two criteria: the recommended facility service radius and the population to be served. Consideration was also given to population concentrations and transportation networks. Establishing the park districts provides a way to organize, inventory and measure recreation deficiencies in the county. The districts are also part of an operational strategy to attain the goal of one county park per district.

Pierson Township is included in District One with Reynolds, Winfield and Maple Valley Townships. This plan includes the following classification system and standards for park land:

- Neighborhood Parks – size range from 1 – 20 acres serving a population of 500 – 3000. The acreage standard is 2 acres per 1000 population.
- Community Parks – size range from 21 – 100 acres serving a population of 3000 – 8000. The acreage standard for community parks is 8 acres for 1000 population.
- Regional Parks – larger than 1000 acres. The acreage standard is 20 acres per 1000 population for total regional space, which also includes land owned by the State of Michigan and the federal government.
- State Game Areas – Lands owned and managed by the State of Michigan for the primary purpose of providing public hunting and manage wildlife habitat. Other recreational opportunities may be provided for snowmobiles, fishing and boat launches.
- Natural Forests - in 1960, America’s National Forests were dedicated to multiple use, including outdoor recreation, range, timber, watershed, and fish management. All land in the portion of the Manistee County is also open to hunting and snowmobiling.

The standards used to determine recreation facility deficiencies in Montcalm County are from the Michigan Department of Natural Resources current edition of Building Michigan’s Recreation Future.

The inventory of recreation by district includes information on park type (either neighborhood park “N”, or community park “C”), park size in acres, and a summary listing the total number of parks and acreage by district. Schools, because of their size and use, are included in the neighborhood type of park.

**Table 15
District One Recreation Facilities
Pierson, Reynolds, Winfield
and Maple Valley Township**

National Forest			Special Use Facilities	
Manistee National Forest			Howard City Recreation Bowling Lanes	
Municipal Parks	Acres	Type	Skate Estate - Roller Rink	
Emory	5.0	N	Senior Citizen Center	
Ensley	4.0	N	Paul's Resort Campground	
Minnie Farmer	2.0	N	Whitefish Golf Course	
H.J. Peck	1.0	N	Birchwood Golf Course	
Edgerton St.	1.0	N	Camp Thunderhawk	
Pierson Township				
Pierson Road	0.5	N	Summary	
Maple Valley Township			Neighborhood Parks	
Coral	3.5	N	Standard	17.0 acr
Ball Park	3.0	N	Existing	50.5 acr
Marie Johnson	7.0	N	Surplus	33.5 acr
Peterson	2.5	N	Community Parks	
YMCO	0.5	N	Standard	17.0 acr
County Parks			Existing	30.0 acr
Artman	30.0	C	Deficit	38.0 acr
Krampe	20.0	N		
Schools				
Howard City				
• Tri-County Intermediate	1.5	N		
• McNaughton Elementary	1.5	N		
Maple Valley Township				
• Cowden Lake	1.5	N		
• Bible Academy	1.5	N		
Pierson Township				
• Tri-County High School	1.5	N		

source: Montcalm County Recreation Plan

A list of recreation opportunities in District One is listed in Table 15. This table indicates District One has an adequate size and number of neighborhood recreation facilities, but an inadequate offering of community parks. With the Tri-County High School, nearby Artman and Krampe parks and the recreation opportunities the lakes offer, Pierson residents may not feel a strong need to promote additional recreation space with the Township. This decision will depend somewhat on the diversity of recreation types currently provided and the availability of land at a reasonable cost.

Transportation

This section summarizes the existing traffic conditions and data, identifies current roadway improvement plans and outlines traffic-related guidelines that Pierson Township and Montcalm County should consider that will help maintain an efficient and safe roadway system in the future.

Roadway Classification System

As part of the planning process it is important to identify the function of the roadways that make up the roadway system within the township. Identification of road classifications assists in the determination of appropriate land uses and zoning standards along the various routes. Adherence to capacity and access management standards helps preserve the public investments in the system while also providing guidelines for prioritizing planned improvements. The function classifications of roadways within Pierson Township are briefly noted below.

Freeways – The function of this type of roadway is to facilitate the through movement to traffic on a regional basis between communities and other major activity centers. Roadways of this type are designed to provide the highest level of mobility, usually traveling at speeds ranging from 55-65 mph. Since mobility to through traffic is its primary function, access to the facility is limited and direct access to adjacent land uses is not provided. US-131 is an example of this type of roadway.

County Primary Roads (Class A or B) – County primary roads are those which serve longer trips within urban areas or link adjacent population centers and major arteries. County primaries are designed to accommodate moderate to large traffic volumes dependent upon their cross section and other design parameters. Speeds on these roadways are usually in the 35-55 mph range. Access to adjacent development is usually provided although some constraints regarding design affect the extent of access. Primary roads are usually designated as either Class A (all weather or seasonal) or Class B (seasonal) roads. Examples of county primary roads in Pierson Township include Kendaville Road (CR 530), Federal Road (CR 599), and Stanton Road (CR 522).

Local Roads – These roads collect and distribute traffic to and from higher classification roads. Traffic mobility is usually somewhat sacrificed through additional curb cuts to provide increased access to adjacent property. These paved or gravel roadways generally have speed limits in the 35-55 range. Local roads are classified as in terms of their surface conditions.

Other Roads – The remainder of the roads in the township are either under the jurisdiction of a city and/or classified as subdivision streets or private roads.

Traffic Volumes

Daily traffic volumes data was obtained from the Montcalm County Road Commission (MCRC). The ADT (average daily traffic) volume on the county primary roads within the Township range from a high of 4,250 vehicles per day on Federal Road (CR 599) just north of the south township line to approximately 200 vehicles per day on Stanton Road (CR 522) near the west side of the township.

The most recent traffic volume figures provided by the Michigan Department of Transportation (MDOT) indicate that US-131 carries approximately 16,000 vehicles on an average day.

These 24-hour volumes provide a preliminary indication on how well a section of roadway is operating. Other data usually needed for analysis include horizontal and vertical alignments, mixture of vehicular types, and cross section (number of lanes). On a medium scale type of planning analysis such as this township master plan, this information is used to help identify possible existing problem areas and to project future volumes given expected land use changes or development. Advance planning for the preservation of new or additional right-of-way can then be started.

However, based upon a review of the existing volumes and the physical characteristics of most of the roads in the county (i.e., relatively flat grades), there are not any roadway sections that are operating at over-capacity conditions. It is recognized though, that there may be short-term seasonal congestion problems that occur on weekends in or near the communities/lakes. This congestion, however, likely isn't severe enough or of a long term nature to warrant the expenditure of scarce funding dollars.

Accident History

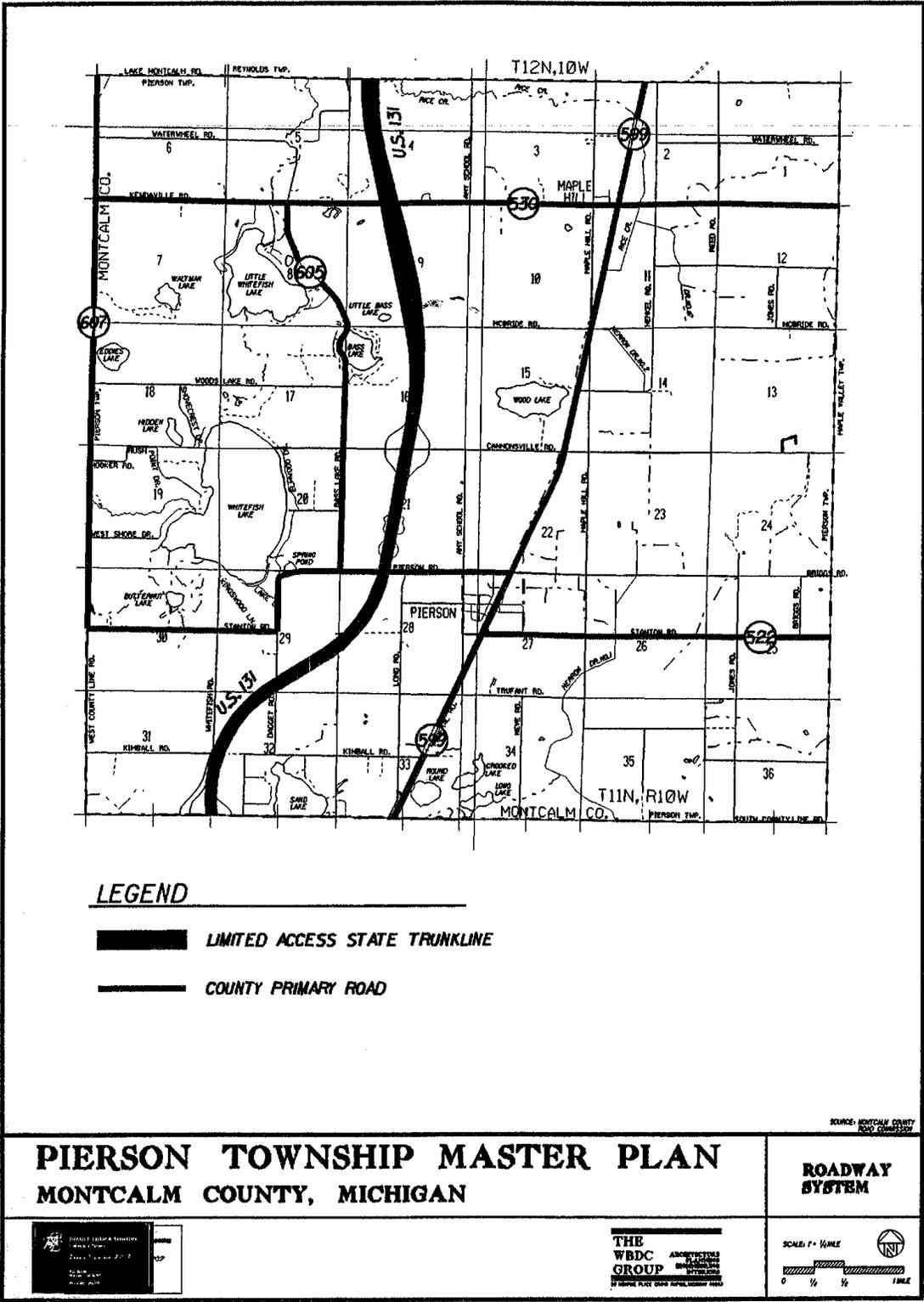
Discussion with both MCRC and MDOT staff indicates that no single location within the Township experiences a significant number of accidents. The accidents that do occur do not indicate a pattern that could be rectified by improvements to the roadway system.

Roadway Improvements

Discussions were held with the Montcalm County Road Commission staff to identify current roadway improvement plans.

The Road commission is responsible for the maintenance (grading, snowplowing, etc.) of all county roads and improvements (resurfacing, widening, etc.) on all county primary roads. In addition to normal maintenance, the Road Commission has plans for one major project in the township in the next few years. That project calls for the pulverization and bituminous resurfacing of two roadway sections; West County Line Road (CR 607) from M-82 to Kendaville Road (CR 530), and Kendaville Road from West County Line Road to Federal Road (CR 599). This project is currently scheduled for 1994.

As part of the requirements of the new federal funding program, ISTEA (Intermodal Surface Transportation Efficiency Act of 1991), the Road Commission will be developing a three year roadway improvement plan.



Recommendations: Access Management Guidelines

Both the local government and road commission should give additional consideration to adopting and enforcing a set of driveway standards – especially for new commercial developments. Several existing roadway segments and individual sites within the township have an overabundance of driveways with inadequate spacing and/or poor design. This problem leads to inefficient operation of the adjacent roadway and can create unsafe driving conditions. Driveway standards address several aspects of driveway design including minimum spacing between driveways, minimum distances from driveways to the nearest intersection, the number of driveways allowed per site, and design parameters (radii, width, etc.) of the driveways. With an adopted set of standards, developers know ahead of time what is expected.

These standards would supplement those outlines by the road commission and often call for required design that exceeds their standards. It should be noted that through the site plan review process, the township (and communities with the township) can set their own standards and can require better design even if a proposed drive meets the standards of the local road authority. Local governments need to get more involved with access management to help maintain the safety and efficiency of the roads in their communities.

Benefits provided by a fully developed access management program include:

1. Increased safety;
2. Improved roadway and driveway efficiency;
3. Reduced congestion;
4. Improved aesthetics;
5. May reduce need for roadway expansion/improvements; and
6. Are easily implemented.

It may seem that Pierson Township does not need this type of standards at this time. However, consideration should be given to developing driveway standards soon as they are much more easily maintained if they are adopted prior to development as opposed to trying to retrofit a poorly designed corridor.

Need for Corridor Planning

Although not a problem today, the need for additional right-of-way (ROW) along county primaries will likely occur as the area develops. Current 66-foot ROW's will not be able to adequately accommodate any facilities wider than three lanes. Long term land use plans should take into account the need for additional ROW before a corridor becomes developed. What can Montcalm County do to avoid repeating the problems of strip commercial development experienced elsewhere in Michigan? One way is through corridor planning.

Corridor planning is developing a Master Plan for roadway corridor. Such planning should include elements such as:

- Existing and Future Land Use – Relating future land use to the capacity and right-of-way of the roadway, locating high traffic generators at areas where future roads or traffic signals can accommodate their traffic.
- Reviewing existing traffic conditions and problems such as traffic volumes versus capacity or high accident locations.
- Access management – techniques the local government and road authority can use to limit the number of driveways, space driveways and ensure a design which promotes safety and efficiency.
- Aesthetics – Looking at zoning techniques to control setbacks for buildings and parking, requiring landscaping, controlling the number and placement of driveways, promoting lower level and a fewer number of signs.
- Reviewing environmental factors which may constrain development or improvements to the corridor.
- The Corridor Plan can often extend beyond a single community and can help resolve border issues where a corridor is the border line between two townships and a city and a township.

Public Services

Schools

Pierson Township is served by two elementary schools, an intermediate school and a high school. McNaughton Elementary and Tri-County Intermediate Schools are in Howard City. Sand Lake Elementary serves the southern portion of the Township. Only the Tri-County High School is located within the Township.

Ambulance, Fire and Police Protection

Township ambulance service is provided by Montcalm County Ambulance Service in Howard City which the Township pays for on an annual basis. Ambulance can be accessed through the 911 emergency system. The ambulance service is qualified to provide a second level of emergency service which goes beyond first aid.

Fire is split between two providers. The northern two-thirds of the Township is served by the Howard City Fire Department which has an ISO rating of seven, and the lower third by Sand Lake Fire Department with an ISO rating of six. Both of these fire departments are reported to be well equipped.

Police protection is provided by the Montcalm County Sheriff's Department out of the Stanton Office. The Township also pays for additional emergency response from the Sand Lake Sheriff's Department. The Sand Lake officer is part-time until Pierson Township agrees to pay an additional amount to make this position a full-time position.

Utilities

The following private and public utility providers serve Pierson Township:

Private Sanitary Sewer:	Big Whitefish Lake
	12 residents on Little Whitefish Lake
Public Sewer:	Village of Pierson
Water:	Provided by private wells
Gas:	Michigan Consolidated Gas Co. – although service is not available throughout the Township.
Electricity:	Consumers Power and O & A Electric Co-Op in Newaygo
Telephone:	Michigan Bell and General Telephone
Cable Television:	C-Tec Cable

CHAPTER V

NATURAL FEATURES

Natural features provide an essential element which both enhance and protect the quality of life in Pierson Township. Planners are constantly faced with decisions which require balancing the protection of natural features with the need for economic viability. The best approach to these situations may be compromise. By altering the site plan slightly, or by suggesting which trees most need to be spared, the planners can help both the applicant and the residents without impossible decisions for or against the environment.

This section of the Plan is intended to identify those areas of the township which may contain natural features which may be sensitive to development. It will also explain why certain natural features are important and what constraints they may place on proposed projects.

The Planning Commission may consider adopting policies related to decision making in environmentally sensitive areas. In some areas where the conditions are sensitive to a degree that any development may be detrimental, the township may want to consider conservation easements or other land protection strategies. At the end of this section, a brief overview of protection and conservation options available to local communities is included.

Slope Analysis, Development Suitability, PA 116 Farmlands, Forested Lands and Wetlands maps in this Chapter depict environmentally sensitive areas in the township.

Some of the general benefits of protecting and conserving natural features include:

- Pure supplies of municipal water
- Water supplies for homes not served by municipal systems
- Wildlife habitat
- Groundwater recharge and purification, flood control, pollution protection and the support of unique plant and animal life
- Recreation opportunities that include hunting, fishing, snowmobiling, skiing, skating, swimming, sledding, hiking, nature study, photography and related pursuits
- Aesthetics (views, serenity, rural nature, etc.)
- Educational opportunities (natural history, biology, geology, ecology, etc.)
- Economic opportunities in farming, forestry and tourism

Environmentally sensitive natural features can either enhance or restrict development projects, depending on the type and severity of the feature. For example, a wooded hillside may provide a view which, initially, makes development seem very appealing. There may, however, be additional costs, both financial and environmental. Necessary erosion mitigation measures and hillside stabilization during and after construction can increase development costs dramatically. A community cost could be the destruction or disruption of a hillside view.

The following description of natural features will help establish the character of the natural environment and set the basis for the analysis of suitable future land uses. The analysis will help evaluate the vacant

land within the township, determine the potential constraints to development which the environment presents, and help determine ways in which these features can be integrated into future conservation and development proposals.

Topography

Topography variation within Pierson Township ranges from 854 feet at Little Whitefish Lake to 977 feet above sea level at the Cannonsville Road/US-131 Intersection. The steepest slopes are generally located in the northwest quarter of the Township and the perimeter of Big Whitefish Lake. The flattest areas occur primarily east of US-131.

Resource Value

Steep sloped and rolling hillsides, unlike groundwater, are not a renewable resource, nor do they have clearly defined public benefits like wetlands or woodlands. Topography is geological feature which exists in a balance with vegetation, precipitation and wind. The maintenance of this balance helps prevent non-point source pollution of water resources while preserving a distinctive feature of the local landscape.

Impacts on Development

Elevational changes can often be restrictive to development unless severe site modifications are made to accommodate drainage, traffic circulation, erosion control and grading. Level or gently sloping sites are usually preferred for cropland, subdivisions, industrial sites and commercial buildings. Hilly sites are often preferred for less dense residential development and recreational land uses.

Development in areas of steep slopes may result in higher construction costs since these slopes usually require grading or erosion control measures. Rolling topography may also enhance development by increasing property values and serving as a buffer from nearby uses. For example, a project with a number of different, conflicting uses could be developed using topography as buffers between uses. By limiting hillside construction to the sides of slopes and to folds in the landscape, development will be less intrusive on the views and character of the area. Consideration should be given to the preservation of views, by restricting building height and controlling placement of structures.

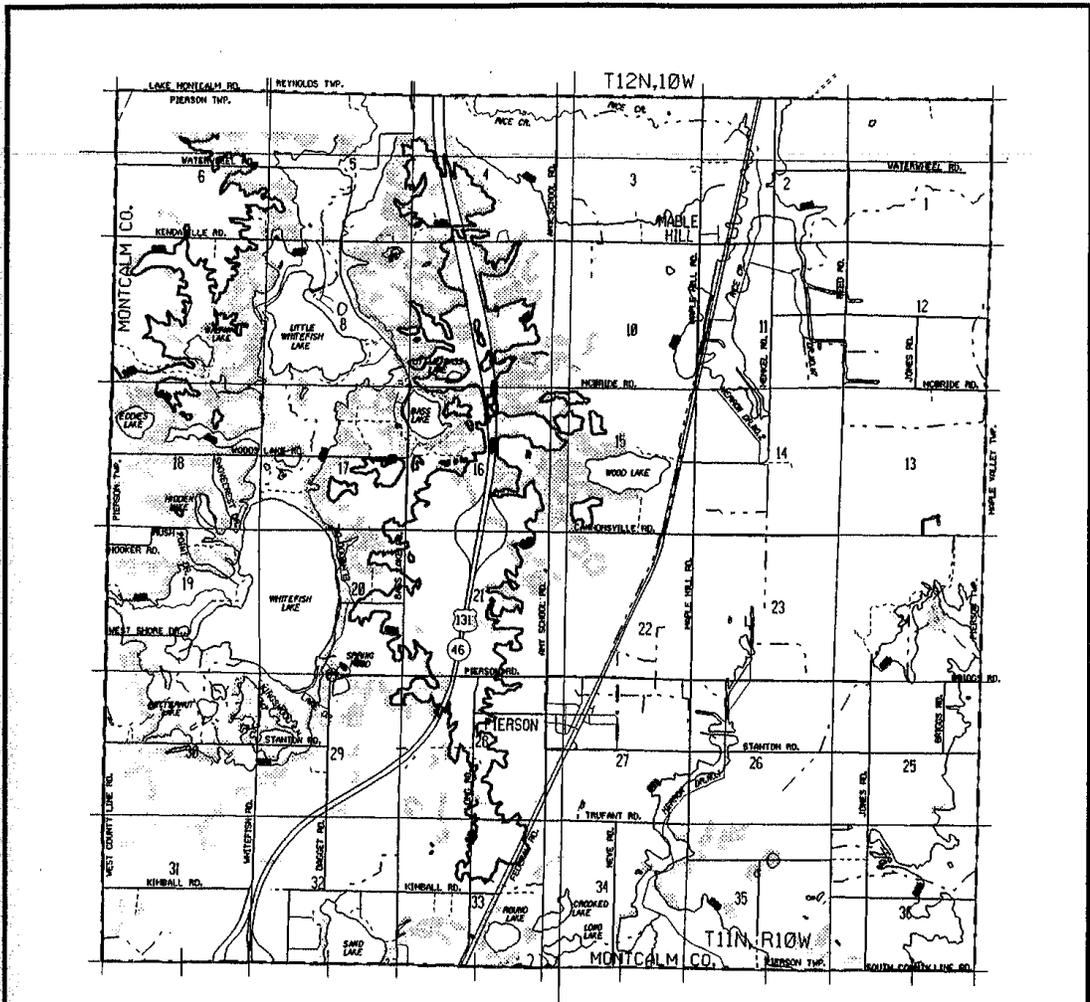
Surface Water

Resource Value

The Township's surface waters contribute to a viable recreational economy, including fishing, boating, and swimming. Land fronting on water is in great demand for building sites.

In addition to these aesthetic values, clean, protected surface waters are critical to human health and safety. Additional benefits provided by lakes and streams include:

- Potential municipal water supply source
- Irrigation supply
- Drainage and flood control
- Water purifying and groundwater recharge
- Plant and wildlife habitat



LEGEND

-  **STEEP SLOPES 12% OR GREATER**
-  **HIGH LAND**
-  **LOW LAND**
-  **COUNTY DRAIN**

SOURCE: U.S.G.S. AND MONTCALM COUNTY DRAIN COMMISSION

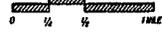
**PIERSON TOWNSHIP MASTER PLAN
MONTCALM COUNTY, MICHIGAN**

**SLOPE
ANALYSIS**



**THE
WBDC
GROUP**
ARCHITECTURAL
ENGINEERING
INTERIORS

SCALE: 1" = 1/4 MILE

Impacts on Development

One of the greatest threats to surface water is non-point source pollution. Rather than occurring from one major source, like a sewage treatment plant or industrial use, non-point source pollution results from rainfall or snowmelt moving over and through the ground. As this runoff moves, it picks up and carries away natural and man-made pollutants, finally depositing them in lakes, rivers, wetlands, coastal waters and ground water. In Michigan, the greatest causes of non-point source contamination are agricultural practices, lawn chemicals and soil erosion.

Non-point source pollution can be mitigated through the modification of a variety of activities, especially those related to farming and land development. Since eroded land requires extra fertilizer and energy to be productive, this adds significantly to the non-point source problem which, over time, can degrade surface water. Soil erosion control measures and conscientious agricultural practices can do much to eliminate non-point source contamination. Other effective protection measures include the use of storm water retention, where possible, to promote filtration, and the reduction of hard surface areas to reduce rate and volume of run-off.

Some of the major source of surface water contamination, especially non-point source, are presented in the following paragraphs along with brief descriptions of proper control measures:

- Litter, pet wastes, leaves, and debris accumulate in open drains, street gutters and storm drains—these normally drain directly to lakes, streams and rivers.
- Lawn and garden chemicals need to be applied sparingly and according to directions.
- Used oil, antifreeze, paints, and other household chemicals should be disposed of properly, not in storm sewers or sanitary sewers.
- Spilled brake fluid, oil, grease, and antifreeze should not be hosed into the street where they can eventually reach local streams and lakes.
- Soils prone to erosion may be controlled by planting ground cover and/or using other methods to stabilize the soils.

Agriculture

- Drinking water should be protected by using smaller quantities of pesticides and soil nutrients.
- Soil erosion can be reduced by using conservation tillage.
- Livestock grazing areas should not be located over groundwater recharge areas, or in close proximity to rivers and streams.
- Unused pesticides, containers, and disinfected tank rinse water should be disposed of in an approved manner.

Poorly Drained Lands

“Poorly drained lands” is the collective term which categorizes marshes, swamps, bogs and similar areas that are often found between open water and upland land. Although cumbersome, this term is preferable in this Master Plan to “wetland”, which has entered into the law and is a subject of controversy between conservationists and developers.

Poorly drained lands within Pierson Township were identified by using USGS Topographic Maps, the Montcalm County Soil Survey and the Michigan Resource Information System (MIRIS), Division of Land Resource Programs, Department of Natural Resources (data compiled from 1978 aerial photography).

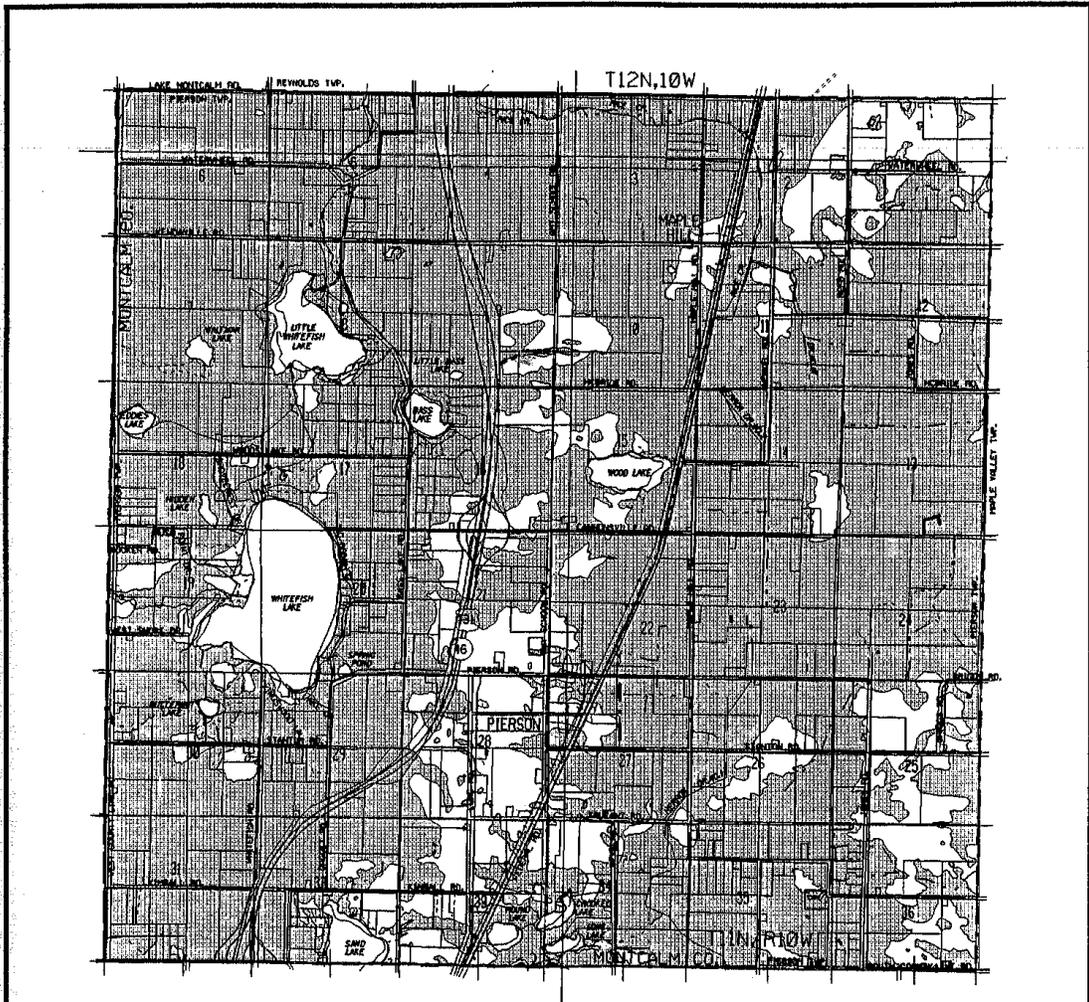
In the past, poorly drained lands were often regarded as wastelands—sources of mosquitoes, flies, and unpleasant odors. Most people felt that they were places to be avoided, or better yet, eliminated. This negative view, combined with the demand for more developable land, has resulted in the destruction of some of the township’s poorly drained lands. These areas have been drained and converted to farmland, or filled for housing developments. Similar practices continue throughout the State. Of the estimated 11 million acres of wetlands that stood in Michigan 150 years ago, 3 million acres remain. Only one-fourth of the original 400,000 acres of coastal wetlands now remain along Michigan shores. Since there is little historical data on wetland identification, it is not possible to estimate the total loss of wetlands within Pierson Township.

Resource Value

Because they occur where the dry land meets the water, poorly drained lands play a critical role in the management of the township’s water-based resources. Acre for acre, wetlands produce more wildlife and plants than any other Michigan habitat type. Michigan boasts about 2,300 native plant species; 50 percent of these are wetland species and over 25 percent of the wetland species are threatened or endangered.

Other benefits of poorly drained lands include the following:

- Reduce flooding by adsorbing runoff from rain and letting snow and slowly releasing excess water into rivers and lakes. (A one-acre swamp, when flooded to a depth of one foot, contains 325,851 gallons of water.)
- Filter pollutants from surface runoff, trapping fertilizers, pesticides, sediments and other potential contaminants and helps to break them down into less harmful substances, improving water clarity and quality.
- Help recharge groundwater supplies when connected to underground aquifers.
- Contribute to natural nutrient and water cycles, and produce vital atmospheric gases, including oxygen.
- Provide commercial and recreational value to the economy, by producing plants, game birds(duck, geese) and fur-bearing mammals. Survival of many varieties of fish are directly connected to poorly drained lands, requiring shallow water areas for breeding, feeding and escape from predators.
- When poorly drained lands occur adjacent to the Great Lakes, inland lakes or streams, they serve as nutrient traps for the larger body of water.



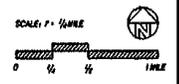
LEGEND

-  MODERATE OR NO SEPTIC FIELD LIMITATIONS
-  SEVERE SEPTIC FIELD LIMITATIONS

SOURCE: U.S. DEPT. OF AGRICULTURE
MONTCALM COUNTY SOIL SURVEY

**PIERSON TOWNSHIP MASTER PLAN
MONTCALM COUNTY, MICHIGAN**

**DEVELOPMENT
SUITABILITY**



Impacts on Development

In Michigan, the Goemaere-Anderson Wetland Protection Act (Act 203 of the Public Acts of 1979) provides for the statewide preservation, management, protection and use of poorly drained lands of an area at least five acres in size or contiguous with the Great Lakes. The Act requires a permit from the Department of Natural Resources (DNR) for activities such as filling, dredging, and draining; provides a plan for the preservation, management, protection, and use of poorly drained lands; and provides for remedies and penalties.

Local efforts may also be undertaken to protect the remaining areas of this valuable resource due to the benefits poorly drained lands provide and in light of the requirements of P.A. 203 of 1979. Pierson Township may choose to draft an ordinance which will protect local poorly drained lands which are not protected by the State. The Ordinance could 1) require site plan review and notification of appropriate State, local and federal agencies, 2) determine areas to be protected, and 3) provide reference information available from the Montcalm County Soil Survey, U.S. Fish and Wildlife Division maps and the MDNR MIRIS inventory.

The State wetland laws and local wetland zoning are the basis of a protection program for poorly drained lands. Development of poorly drained or boggy areas should be allowed if minimum lot size is increased beyond the standard for single family residential areas so as to preserve the character of the area between buildings. To be more effective, however, these regulations should be coordinated with non-regulatory techniques. Four such techniques are discussed late in this section.

Floodplains

Floodplains are relatively flat stream valley floors which are periodically overrun by the stream at high water after heavy rainfall within the stream's watershed area. In Pierson Township, floodplain areas are bordered by short, steep erosion slopes. Floodplains within Pierson township have been determined by the Federal Emergency Management Agency (FEMA) and are located along streams and other wetland areas. A 100-year floodplain is an area within which there is a one percent chance of a flood occurring within any year. FEMA identifies floodplains to determine eligibility for the National Flood Insurance Program.

Resource Value

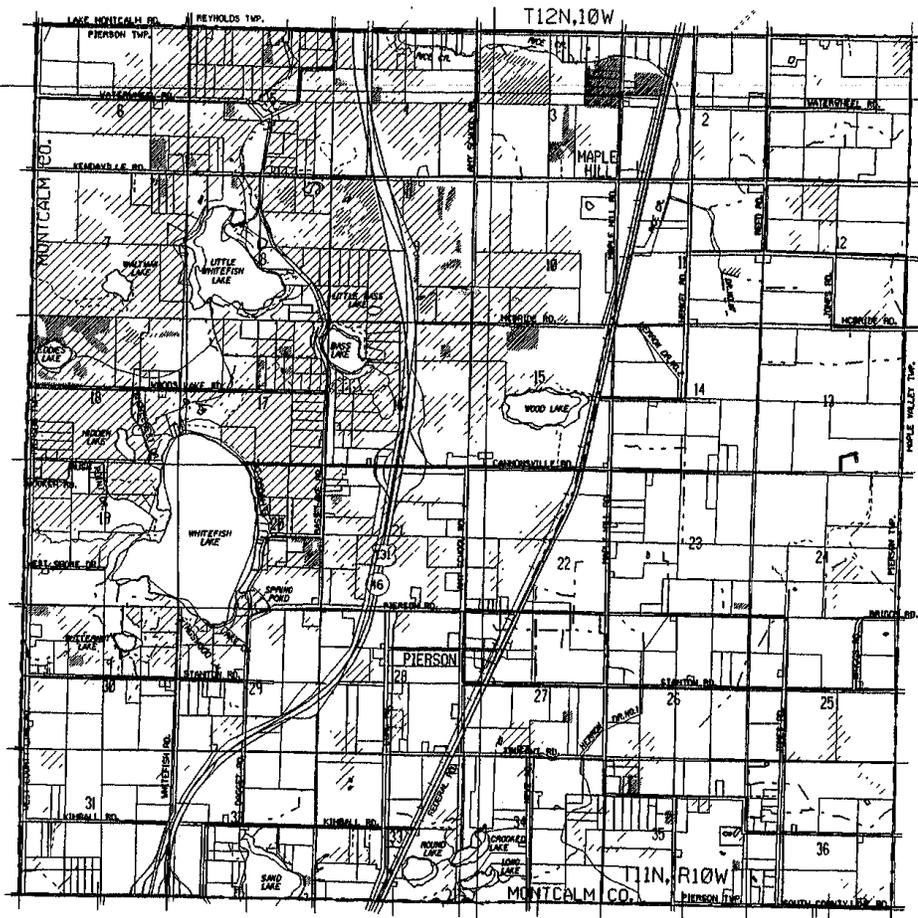
Floodplain areas are protected because they serve as water recharge areas and natural water storage basins during periods of heavy rains or snow thaws. If this water were not collected in this way, the likelihood of water damage to homes and businesses would increase greatly.

Impacts on Development

Development in the 100-year floodplain is regulated by the State and in communities which participate in the Federal Flood Insurance Program, by local regulations. Development in the floodplain must be designed to not impede flood waters and increase the risk of flood damage upstream. Habitable structures must have the lowest floor level located above flood height.

Woodlands

While regulations have been developed to protect certain critical environmental areas, woodlands have been relatively ignored, even though their benefits to the public as buffers and moderators of flooding, erosion, and noise and air pollution are important to the township's quality of life.



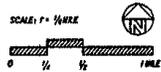
LEGEND

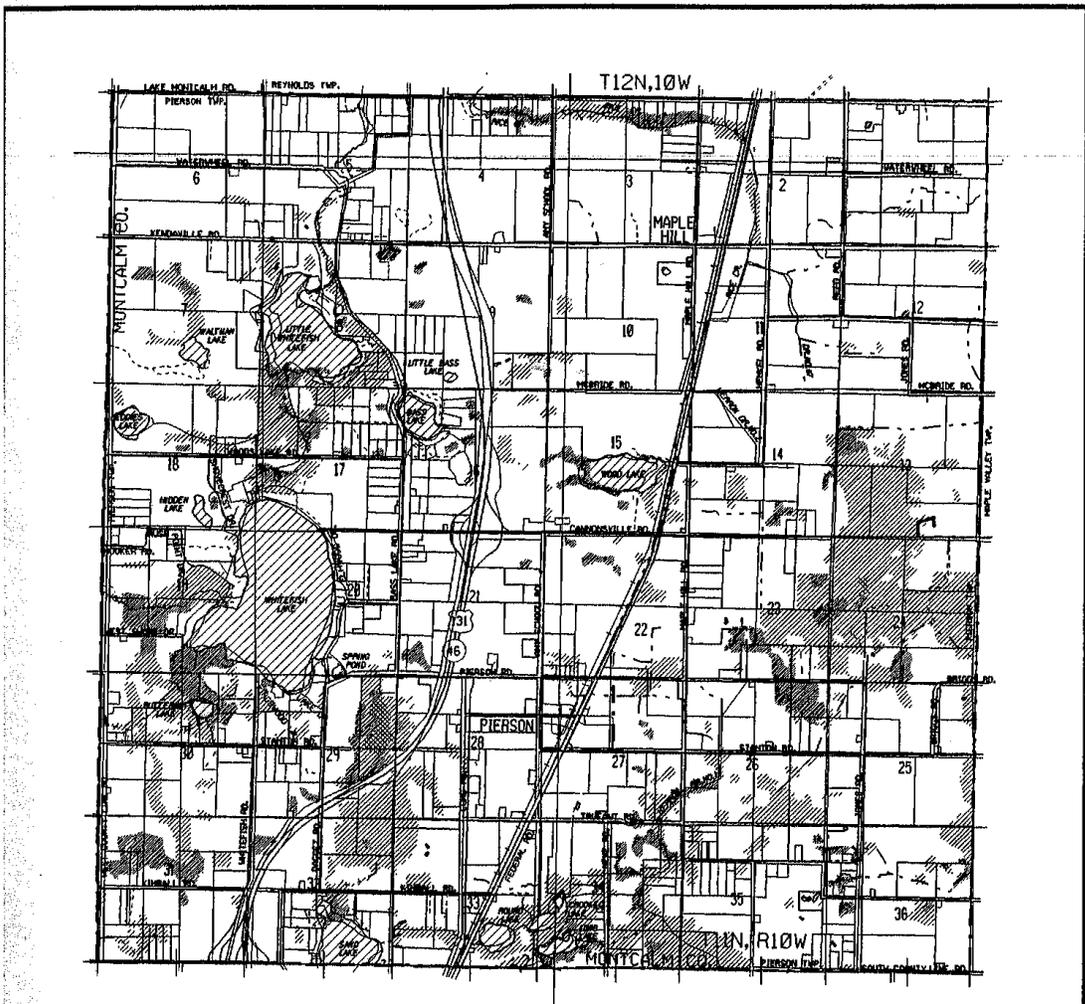
-  UPLAND HARDWOODS
-  ASPEN, BIRCH
-  UPLAND CONIFER

SOURCE: MPFS

**PIERSON TOWNSHIP MASTER PLAN
MONTCALM COUNTY, MICHIGAN**

**FORESTED
LANDS**





LEGEND

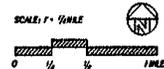
-  OPEN WATER
-  SHRUB, EMERGENT, AQUATIC BED
-  LOWLAND HARDWOOD
-  LOWLAND CONIFER

**PIERSON TOWNSHIP MASTER PLAN
MONTCALM COUNTY, MICHIGAN**

WETLANDS



**THE
WBDC
GROUP**
ARCHITECTURAL
ENGINEERING
LANDSCAPE ARCHITECTURE
PLANNING
INTERIOR DESIGN



Resource Value

Historically Michigan's great woodlands provided an economic boon. Today, Pierson's second growth timbers occur in the east central portion of the township and around the lakes. While many second growth wood lots occur in Pierson Township and available for harvesting and processing, most of the wooded areas around the lakes provide the aesthetic fabric which draws many people to the area. Woodlands also have other values which cannot be measured in board feet, such as providing wildlife habitat and enhancing air quality.

Specific benefits of woodlands include:

- A varied and rich environment for many kinds of plants and animals. The different forest layers, which include tree tops, branches, trunks, shrubs, and plants on the forest floor provide breeding, feeding, and refuge areas for many species of insects, birds, and mammals. The environmental diversity of woodland is an important resource for wildlife conservation and environmental health and affords a critical diversity for outdoor recreation activities.
- Woodlands are important protective features for watersheds and soils. Forest vegetation moderates the effects of winds and storms, stabilizes and enriches the soil and slows runoff from precipitation, thereby allowing it to be filtered by the forest floor as it permeates into groundwater reserves. By decreasing runoff velocity and increasing groundwater infiltration, woodlands also help to regulate flooding.
- Woodlands are buffers to the sights and sounds of civilization. Woodlands mute the noise from freeways and factories, as well as absorb air pollution.
- Woodlands are moderators of climate. The microclimate of a forest, created in part by the shade of the trees and the transpiration of water from the leaves, keeps surrounding air at an even temperature. Forest temperatures are generally cooler in the day and warmer at night than the more widely fluctuating temperatures of unfrosted areas. Woodlands that are adjacent or interpreted amount suburban and urban areas act as natural air conditioners.

Impacts on Development

The possible results of poorly planned development of woodlands are increased erosion and siltation, lessening of water quality, loss of landscape diversity, increased dangers from flooding, and decreased land value. Cutting the forest also changes the surrounding ecology of wildlife and associated herbs and shrubs. Furthermore, loss of individual trees and of woodlands constitutes a deterioration of the Township's aesthetic quality. Trees within the public domain, such as those growing on streets or in parks, forest preserves or on State and Federal lands, are generally managed. Of more concern are the woodlands which exist on private land. Some of these lands are large enough to support commercial forestry, while others are small stands threatened by encroaching commercial, agricultural, or residential development.

Rather than developing detailed ordinances relating to the preservation of trees and woodlands, which would be burdensome, if not impossible, to administer, it is suggested that Pierson adopt a policy to encourage maintaining as many trees and woodlands as possible and making the impact upon trees and forest cover a specific consideration for every site plan and development.

Groundwater

Although groundwater (water beneath the land surface) is not of a nature that lends itself to mapping, it is a natural resource that should be considered in land use decisions. Michigan has long been known as the Great Lake State. The abundance of surface water is widely appreciated and national efforts have been undertaken to protect this resource. With all of the available surface water, 97% of the world's freshwater is still available only as groundwater. Lakes, rivers and streams provide only 1-1/2% of fresh water resources. The remaining one and one-half percent is found as water vapor in the atmosphere and as soil moisture.

Resource Value

Almost one-half of the State's population and much of Pierson Township relies upon groundwater as the source of drinking water. Despite this dependence, there is little public understanding of the nature and importance of groundwater. One widely held misconception is that groundwater flows in huge underground lakes and rivers. Another is that groundwater travels very rapidly or that its direction follows the earth's contours. Of all the common misconceptions, perhaps the most dangerous ones are that groundwater is adequately protected by the earth's surface and that land use activities have little impact on this resource. In reality, groundwater quality is almost wholly dependent on man's activities.

Impacts on Development

Like most other natural resources, groundwater is more vulnerable in some areas than others. In the case of groundwater supplies, this vulnerability is determined by three main factors: soil, depth to the aquifer and general aquifer condition and type. Sandy soils offer considerably less protection than heavier clay soils. Confined aquifers are safer than unconfined ones. Through a better understanding of the nature of groundwater, more effective protection measures are possible.

In areas that offer little natural protection, or where the protection level is unknown, special consideration should be given to the types and densities of land uses which are permitted. Businesses such as dry-cleaners, photographers and hair salons are examples of potentially hazardous land uses due to the types of chemicals which are routinely used. If these businesses operate on individual well and septic service, the chance of groundwater contamination, through an accidental spill or mishandling, is especially high.

Pierson Township currently has no sites on the Michigan Department of Natural Resources Environmental Priority "307" List.

Some businesses which are generally thought to be environmentally sound, like golf courses (including miniature golf) and country clubs, are actually quite threatening because of the large amount of lawn chemicals which are routinely used. The direct application of these chemicals to the ground presents an uninterrupted opportunity for ground water contamination. In addition to carefully considering the types of land uses which are to be allowed, the following list offers other local protection measures:

- Add a standard to the site plan review section of the Zoning Ordinance which requires new businesses storing hazardous materials, waste, fuels, salt and chemicals to be designed to prevent spills and discharge of polluting materials to the surface of the ground, groundwater, lakes, streams or poorly drained lands.

- Obtain information about hazardous substances to be used, stored and generated at the time of site plan review. Business owners should satisfactorily respond to questions concerning floor drain outlets, content and storage of 50 gallon drums, and disposal procedures for any chemicals used.
- Regulations requiring spill prevention and secondary containment of hazardous substances should be required at new business sites which may be of such a size that exempts them from State regulation.
- New businesses should be required to obtain a Pollution Incident Prevention Plan (PIPP) from the Michigan Department of Natural Resources. PIPP plan submittal should be a precondition for site plan approval.
- Municipal facilities should meet environmental standards. Key requirements might include: emergency procedures and secondary containment for the storage of hazardous substances.
- Township officials and staff should assist in identifying potential groundwater contamination incidents, especially at business sites. Any potential problems should be reported to the Michigan Department of Natural Resources. If discovered at an early point, widespread and severe contamination can be avoided.

Groundwater protection is a true example of “an ounce of prevention being worth a pound of cure.” Low-cost contamination prevention measures can help protect against a spill or leak which could ultimately cost a community millions of dollars to remedy or, in some cases, totally destroy the primary water supply.

Natural Features Protection Options

Local communities have several options available for protecting natural features and open spaces. A brief description of some of these options are presented below.

Land Donation - The most direct and efficient method of protection for sensitive land is through a land donation to a private foundation or government agency. A donor’s gift of land is tax deductible if it is made to a statewide or local land trust, government entity, or any other non-profit, charitable organization under Section 501 (c) (3) of the Internal Revenue Code. Each donation has different tax advantages for individuals. Real property taxes, gift taxes, or income taxes, are affected differently in each situation. Landowners considering a donation of land may wish to consult with a tax attorney or accountant to analyze the benefits of their particular situation.

Conservation Easements - Conservation easements can be used to transfer certain rights and privileges concerning the use of land or a body of water to a non-profit organization, governmental body, or other legal entity without transferring title to the land. In Michigan, Public Act No. 197 of 1980, the Conservation and Historic Preservation Easement Act, (M.C.L.A. 339.251 et. seq.) authorizes the creation of voluntary conservation easements.

A conservation easement under Act 197 can provide limitations on the use of, or prohibit certain acts on , a parcel of land or body of water. The interest can be in the form of a restriction, easement, covenant, or a condition contained in either a deed, will or other instrument. The easement should require that the land or body of water be retained or maintained in its natural, scenic, or open condition, or in a specific, non-intensive use such as agriculture, open space, or forest land.

The easement is enforceable against the property owner even if the party seeking enforcement was not a party to the original conveyance or contract. The easement is considered a conveyance of real property and must be recorded with the register of deeds in the township to be effective against a subsequent purchaser of the property who had no notice of the easement.

As with land donations, the granting of a conservation easement may have tax implications. Again, persons considering granting a conservation easement should contact an attorney or accountant for an analysis of possible tax benefits, as well as their local government for information about zoning, etc.

One type of easement authorized under the Farmland and Open Space Preservation Act, P.A. 116 of 1974, offers tax reductions for landowners who agree not to develop open space land. This Act enables a landowner to enter into a development rights easement (for open space) with the State. These agreements or easements are designed to ensure that the land remains in a particular open space related use or uses for an agreed upon period. In return for maintaining the land in particular use, the land owner is entitled to certain income or property tax benefits.

Open space land has been divided into two categories under the Act. The first category deals with historic, riverfront and shoreline areas. This type of land requires that the property be undeveloped and either historic in nature and recognized as such by appropriate federal or state laws, front on a river designated under Act 231, the Natural Rivers Act of 1970, or be designated as an environmental area under Act 245, the Shorelines Protection and Management Act of 1970.

The second category of open space land is more general in definition and includes lands which conserve natural or scenic resources, enhance recreational opportunities, promote the conservation of soils, poorly drained lands and beaches, or preserve historic sites and idle potential farmland of not less than 40 acres. The designation of this particular type of open space is primarily the responsibility of the local governing body and the interpretation of qualified lands may vary from location to location, depending on local circumstances. Interested landowners must file an application with the township.

Deed Restrictions - Clauses placed in deeds restricting the future use of land can prohibit uses or activities by the new owners that would destroy, damage, or modify natural features. The Conservation and Historic Preservation Easement Act (P.A. 197 of 1980) allows for deed restrictions along with easements.

When land is donated, the donor may include a reversion clause that provides that if the land is not managed according to the restriction, the property must be returned to the original owner, his heirs or assigns, or to a third party, such as a non-profit land trust or government body.

Purchase of Property - Acquisition of property is a straightforward, permanent protection method. The purchaser should consider all the options, i.e., purchase of fee simple title, easements, and development rights, bargain sales, and other purchasing methods. A fee simple purchase provides the purchaser with more permanent control and protection. However, a less than fee simple purchase (such as purchase of an easement of development rights) also has advantages in being less costly, and, the original owner retains title and continues to pay taxes so the local community does not lose its tax base (although the overall market value on which the property is assessed may be reduced).

The following is a list of several possible sources of funds for purchase of environmentally-sensitive lands:

- Michigan Natural Resources Trust Fund - This fund is a possible source of money to purchase choice recreational, scenic, and environmentally important land in Michigan. Application must be made to the fund for approval by April 1 of each year, and can be obtained from the MDNR Recreation Services Division.
- Michigan Duck Stamp Program - Funds from sale of stamps and proceeds from the contest of to the purchase of poorly drained lands by the State.
- Private Sources - Donations from private individuals or corporations in the form of specific property or money. This would include fund raising efforts from local citizens, lake associations, and other community groups.
- The Michigan Nature Conservatory, Michigan Nature Association, Ducks Unlimited, local land trusts, and sometimes local governments can all be potential funding sources. The Michigan Nature Conservatory maintains a list of local land trusts and how they can be contacted.
- Federal funding sources:
 - Land and Water Conservation Fund - Funds are given to the State to buy open space lands which may contain poorly drained lands or other unique natural features.
 - U.S. Fish and Wildlife Services grants under the Pittman-Robertson Act - Funds are given to the State for acquisition of wildlife areas and wildlife restoration. Funds are from a tax on ammunition and weapons.
 - Dingell-Johnson monies to states to cover 75% of the cost of fish restoration and management projects.

This category includes all retail establishments, restaurants, and private recreational facilities. Commercial land uses in Pierson Township exist primarily at the Cannonsville Road intersection and north of Big Whitefish Lake south of McBride Road. Other small commercial uses are located in various parts of the township.

Industrial

The Township's industrial land use is limited to the land fill east of US-131 in the center of the Township. This general area around the Cannonsville Road intersection is a logical location for increases industrial development although the visibility of industrial site from US-131 should be considered from an aesthetic view point.

The Township Zoning Ordinance currently allows a number of uses in the industrial zone, including those businesses involving manufacturing, assembly, packaging and processing of material. Special use provisions are generally applied to those uses which may be incompatible with neighboring uses, thus the present Ordinance should be closely evaluated.

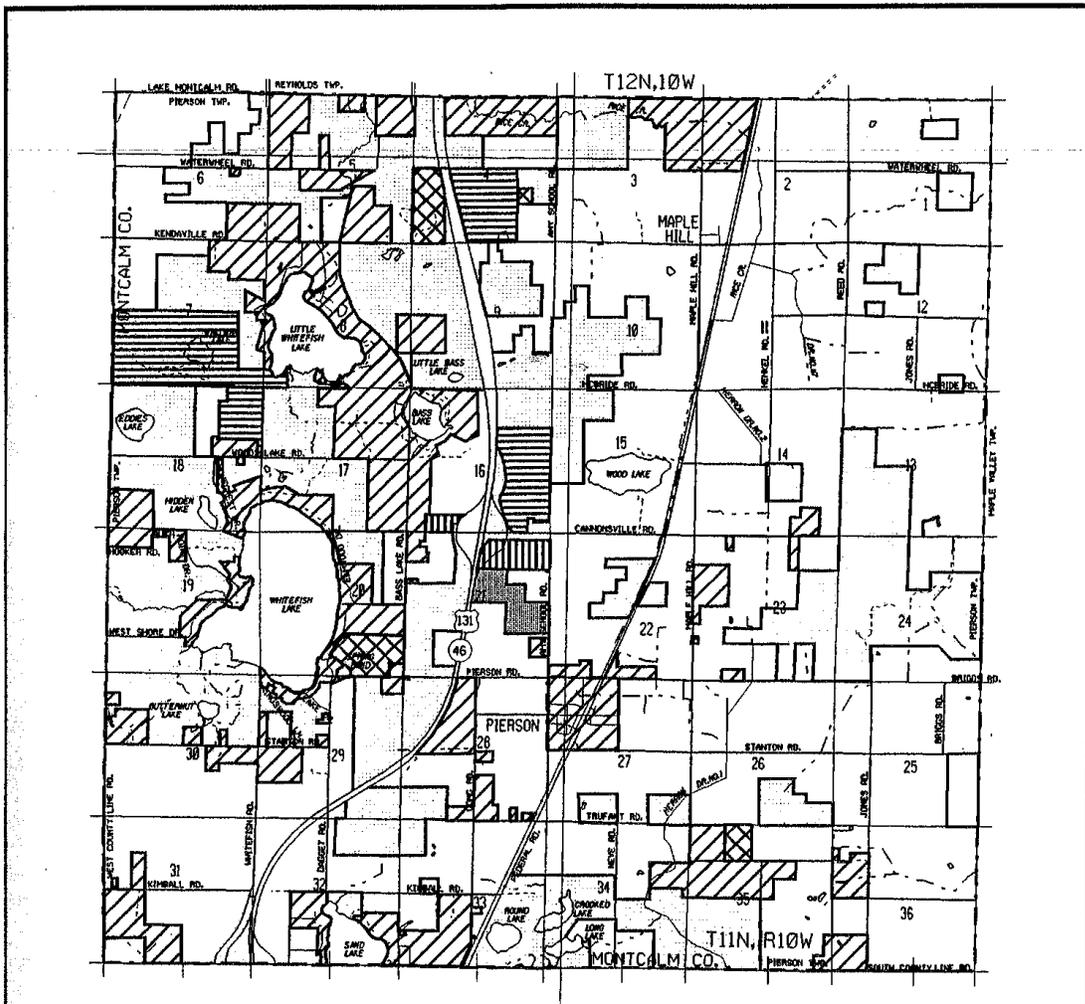
Institutional

This land use includes public parks, municipal buildings, cemeteries and schools. These uses are scattered throughout the Township but found primarily along the US-131 corridor. A detailed explanation of these facilities is provided in the Community Facilities portion of the Plan.

Recreational

This category describes those large parcels of township land which are either currently used for public recreation or, through zoning ordinance and local plans, dedicated to future recreational uses.

The Township's lakes, undeveloped wood lots and wetland areas are used for recreation. Uses include fishing, water sports, hunting and bird watching. The aerial photography also identified two disturbed sites appearing to be used for off-road vehicles and motor-cross trails. One site is in the southeast quarter of the Township in section 35, the other in west of US-131 in section 5. Both appear to be on privately held land. Unfortunately, this activity generates soil erosion by disturbing grasses and other ground covers which hold the soil. The Township Zoning Ordinance should regulate the use of off-road vehicles.



LEGEND

- | | | | |
|---|--------------------------|---|---------------|
|  | idle - wooded or wetland |  | institutional |
|  | active agriculture |  | recreation |
|  | residential |  | industrial |
|  | commercial | | |

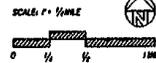
SOURCE: AERIAL PHOTOGRAPHY

**PIERSON TOWNSHIP MASTER PLAN
MONTCALM COUNTY, MICHIGAN**

**EXISTING
LANDUSE**



**THE
WBDC
GROUP**
ADAPTED FROM
MICHIGAN
COUNTY
ENGINEERS



GOALS AND OBJECTIVES

Introduction

Communities inevitably change over time. If that change is to be controlled, a direction for future development is needed. Community planning is the organized effort to look ahead intelligently, to identify a sense of direction based upon common preference, and to suggest means of steering change toward agreed goals. The broad object of planning is to further the welfare of people in the community by helping to create a better, more healthful, convenient, efficient and attractive community environment. A general plan is the document development and adopted to embody these concepts.

Michigan law required townships to engage in planning. The Township Rural Zoning Act, P.A. 184 of 1943, as amended, stipulates, among other things: a township zoning ordinance shall be based upon 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. The Township Planning Act, P.A. 168 of 1959, as amended, requires that the planning commission shall make and adopt a basic plan as a guide for the development of unincorporated portions of the township.

Some of the basic reasons why planning for the future of a community should take place include the following:

- Planning permits communities to make choices for the future, based on articulated community goals, rather than simply accepting what happens by chance or circumstances.
- Planning helps prevent wasteful expenditure of public and private funds, by providing the ability to better coordinate capital investments with anticipates growth and change in the community.
- Planning provides a mechanism for the community at large to have a say in how the community develops, through measures designed to encourage and foster community participation in the planning process.
- Planning helps to protect property values by directing various types of land use activities to locations where land use conflicts are minimized.

This Pierson Township Master Plan specifically addresses how the land and resources might best be used in the future (i.e. to the year 2012). In this regard, it is not the intent of this Plan to in all cases provide for the “highest and best use” of land, as that term is used in the fields of real estate appraisal and development (i.e., that use which produces the greatest economic return or highest economic value). Rather, the purpose of community planning is to provide for an orderly arrangement of land uses which meets the specific goals of the community stated in the Plan, thereby promoting the public health, safety and general welfare of the residents.

This Plan acknowledges the basic right of property owners to the peaceful enjoyment of the property. With that right comes the responsibility to exercise reasonable and prudent care in the development and use of property.

To clarify the scope of the Plan, the following are things the Master Plan **will not do**: For example:

- The Master Plan has no authority to mandate any particular use of any particular land parcel. The intent of this Plan is to guide zoning in the future, but its suggestions may or may not be carried forward by inclusion in the Zoning Ordinance and Map, which governs the use of land in the Township.
- Nothing in this Plan is intended to affect the value of any particular land parcel, even though in some cases, the designation of certain land use for more intensive uses can increase the future value of that parcel. Broadly speaking, though, this Plan should protect land values. Therefore, this Plan does not address the question of property taxes, which, of course, are based on land value.

With that as a background, the following goals and objectives are stated as a general guide for future growth and development in Pierson Township:

- **Develop an appropriate land use policy which is oriented to preserving those important assets expressed by residents**
 - ~ Establish general density limits with range to guide future zoning decisions
 - ~ Initiate cluster housing development to preserve open space, wildlife habitats and recreation opportunities.
 - ~ Pursue the general objective of low density housing in the Township with the provision for higher density areas in proximity to the Village, developing areas, and near freeway interchanges.
- **Develop strong police and fire protection**
 - ~ Develop an acceptable program for police and fire protection locally to assure an efficient protection to the Township residents.
 - ~ Implement a fire and police protection program for the residents through a general education program.
 - ~ Improve on the 911 response time by establishing a dialogue with the Montcalm County Sheriff's Department.
- **Develop a Future Parks and Recreation Program for the Township**
 - ~ Establish general areas for recreation development within the Township as part of the Master Plan.
 - ~ Prepare a parks and recreation plan which assesses need and proposes new facilities to address those needs.

- **Develop a program to assure surface and groundwater quality**

- ~ Develop a strict monitoring procedure for the sanitary landfill in the Township.
 - ~ Initiate sewage collection and treatment systems in those areas of the Township of higher population concentration.
 - ~ Monitor other areas of non-point pollution such as the use of herbicides and animal waste on farmland, fertilizer on residential lawns, commercial recreation areas, etc.
- **Develop a vehicular transportation system to assure safety, efficiency and ease of maintenance.**
 - ~ Study the feasibility of straightening county-designated roads for greater efficiency in circulation.
 - ~ Improve those roads in the Township which have poor road bases, thus, once and for all, alleviating a great road maintenance cost each year to the Township.
 - ~ Develop assurance that new roads (public and private) conform to County road standards.
- **Preserve and enhance those open water and wet land areas as wildlife habitat and recreation areas in relation to County and State laws.**
 - ~ Work with the Big Whitefish Lake Association to preserve the water areas of Big Whitefish Lake and those wet land areas which are the natural breeding grounds as well as stopping off area for migratory birds, including the rare Common Loon (at least in this area of Western Michigan).
 - ~ Initiate water quality programs similar to that developed at Big Whitefish Lake with other lake associations.
- **Develop commercial areas at appropriate locations to enhance use compatibility rather than conflict with other uses.**
 - ~ Locate commercial uses at freeway interchanges using appropriate buffers to screen from other uses.
 - ~ Discourage strip commercial development but rather, promote cluster development with more emphasis on depth than width.
- **Protect waterfront areas from intense development**
 - ~ Review and change, as necessary, the land use densities and control guidelines on waterfront property such as restrictions on multiple lot use of waterfront access.
 - ~ Review setbacks from waterfront areas, lot coverage and sewer hookup requirements as part of development criteria in the Zoning Ordinance.
 - ~ Amend the Zoning Ordinance to implement changes contemplated.

- ~ Develop a management plan for all lake access areas.

- **Protect the prime farmland in the Township from urban encroachment.**
 - ~ Encourage those farms currently preserved through the Farmland Preservation Act (P.A. 116) to remain as part of the act.
 - ~ Promote additional farmland preservation for those areas actively engaged in farming, particularly those areas east of US-131.

There are numerous factors in and around any community affecting its growth. These can be identified in basically three categories: assets of the community, the external influences affecting growth, and the methods used to address development opportunities of a community.

Community Assets

Assets perceived by residents are important ingredients in formulating any general plan. The Master Plan should be focused around desires expressed by those who live in the community.

In an effort to poll the residents concerning those things they like most about Pierson Township, a public meeting was held in November 1992. The results of that meeting point of the almost unanimous feelings concerning the most desirable assets of the Township.

Residents appreciate the rural atmosphere, the lake areas, the schools, the variety of housing types, quality of people living in the area, the lack of congestion on the County roads and the quality of road system maintenance.

Other important assets included the recreation opportunities, the lack of mobile home parks, excellent land area for building sites, the variety of land uses, the clean air and the natural areas throughout the Township.

Planning Issues/Concerns

The major basis for any master plan is to address the issues with which the municipal officials, planning commission and residents must deal on an almost daily basis. Certainly, we do not live in a perfect world - so there are always things to do to improve on the status quo.

The residents of Pierson Township have identified most, if not all, the issues facing the Township over the next decade or longer. These issues are based on experience as residents and, obviously, built-in prejudices of the residents. For example, some homeowners feel strongly about the preservation of water quality while others feel the control of the sanitary landfill is most critical. Whatever the motives or feelings, the following list summarizes the issues or concerns which should be addressed in the Plan, in the opinion of the residents.

The planning issues are grouped into general categories as follows:

• **Residential Development**

- Multi-family standards and procedures
- Creation of minimum acreage development (lot size)
- Standards for mobile homes (minimum 24' in width)
- Standard for all types of housing

• **Environmental Concerns**

- Improve water quality - sea gulls/landfill
- Better landfill control/monitoring/control its growth
- Preservation of rural atmosphere
- Recreation development

• **Public Health, Safety and General Welfare**

- Initiate a neighborhood watch
- Fire department development
- Mock disaster planning

• **Utilities**

- Sanitary sewer locations
- Cleaning of drainage ditches
- Further development of natural gas, cable TV and electrical service

• **Land Use Development Options**

- Promote small business
- Planning for commercial and light industrial development

• **Enforcement**

- Planning commission involvement for road money allocations
- Creation of planning commission vs. zoning commission
- Better zoning enforcement - control of special uses
- Spot zoning
- Better communication between Township officials and press
- Better communication between the Township officials and residents
- Control of lot access on waterfront property in Township

External Forces

There are other factors affecting growth in the area which to a large degree cannot be controlled by Pierson Township. These forces are primarily economic and image related and can become major issues. They are as follows:

- Healthy economic climate (strong employment opportunities, continued growth of the economy)
- The natural amenities of the area such as the lake front property and the supply/demand relationship, the rural characteristics, the climate, the air quality, etc.
- The economic health of the Grand Rapids area because of its proximity to the Township
- Migration from neighboring areas with the State of Michigan or neighboring states.

Future Land Use

The Future Land Use Plan for Pierson Township will be the basis for future zoning decisions. Very important events in recent years have emphasized the need for a general plan for a community followed by a well thought out zoning ordinance based on those land use proposals embodied in the Plan. First the courts throughout the US have now recognized planning as the most important basis for zoning; and second, state legislatures now mandate the preparation of a Master Plan as a basis for zoning.

Certainly, just because a community has a zoning ordinance based on a plan, does not mean there will never be a law suit. But, the chances of success in court are greatly increased as is the ability of a community to determine its own destiny. The important aspect of the planning process is that the plan has been well thought out and is, subsequently, a basis for zoning. The courts appreciate the logic of zoning arguments when planning is an integral part of the development process.

Pierson Township has faced some challenges from a variety of directions such as the sanitary landfill, the popularity of the lake front property in the Township, and ground water quality threats. These concerns and many more are embodied in the General Plan and particularly the future land use portion of the Plan.

Agricultural Development

Pierson Township is about 36 square miles in area. Over half of that land area is devoted to active agricultural use, idle or wooded lands. Of this significant land area devoted to agriculture use, about 4,300 acres (6.72 square miles) are designed as agriculture land through the Open Space Preservation Act (P.A. 116). About 560 acres of P.A. 116 land lie west of US-131. The historical emphasis for agricultural uses in the Township has been east of US-131. Therefore, the Plan does not jeopardize that historical fact but actually strengthens the agricultural orientation by making agricultural land use an integral part of the Plan within the east 1/2 of the Township.

More specifically, the Plan proposes agricultural uses west of US-131 in the north half of Section 31 (north of Kimball Road) and Section 30, south of Stanton Road - and in the northwest part of the Township (Section 6 and 7) north and south of Kendaville Road and south of Lake Montcalm Road, east of West County Line Road. The remainder of the lands west of US-131 are devoted to other uses in the Plan.

East of the freeway, the predominant use is agriculture with significant areas devoted to wet land, idle or woodland. There are clusters of residential development, particularly at the south end of the Township around Sand and Round Lakes and generally south of Kimball Road.

The heaviest concentration of agricultural land is found in Sections 1, 2, 11 - 15, 22, 25 - 27 and 36. A significant departure from the current use of land is the proposed agricultural use designation where the current sanitary landfill is operating.

This land use category is distributed widely over the township. In fact, almost 6.9 square miles or 4,410 acres comprise this category. There are other activities scattered within this land area, such as residential and agricultural uses. However, for the most part this land use will remain undeveloped for the long term.

Residential Development

The predominant residential use is the low density category which is two (2) units per acre or less. Two general categories are included in this density classification: the general low density residential areas and the waterfront areas where densities are somewhat higher on some of the lakes. For example, Big Whitefish Lake includes higher density areas on the east and southeast sides of the Lake while the remainder of the density meets the general density of two (2) units per acre.

Low Density Residential: The low density category east of US-131 is located at the south end of the Township generally south of Kimball Road east to Jones Road. Other low density clusters are found in the Village of Pierson, along Maple Hill Road south to Cannonsville Road and north and south of Cannonsville Road at Reed Road; south of Lake Montcalm Road west of the Federal Road (Old US-131); east and west of Maple Hill Road; a small cluster along Rice Creek, south of Lake Montcalm Road; and a clustering along Long Road, south of Pierson Road.

Low density development is proposed in the southeast portion of the Township east of West County Road and north of South County Road and generally south of Kimball Road.

In addition, the predominant use west of US-131 is proposed as low density residential. This logical designation is based on the following factors:

- Proximity to waterfront real estate
- The highest ground is located west of US-131
- The greatest tree cover is west of US-131, creating a desirable residential environment
- Accessibility to US-131 and larger urban areas to the north and south

The low density residential use is primarily located from Stanton Road north to Lake Montcalm Road.

Waterfront Residential Development: The waterfront residential uses are located at Big Whitefish Lake, Little Whitefish Lake, Sand Lake, Round Lake, Crooked Lake, Long Lake and Bass Lake. Many of these residential uses are seasonal which creates additional traffic and economic activity during the summer months. However, because of the increasing value of waterfront property, the ease of commuting and the low land values in other areas of the community, more permanent residents are moving to the area.

Waterfront property and the related lakes are a valuable resource. Therefore, they need special consideration in the Zoning Ordinance pertaining to the use of lake frontage and the multiple use of lake access by more than one residence.

Medium Density Residential Development: The medium density residential category ranges from three (3) to seven (7) units per acre. The Plan recommends medium density residential uses

north and south of Cannonsville Road adjacent to the west side of US-131 and west and east of US-131 at the Sand Lake exit (22 Mile Road or South County Line Road) - west of Dagget Road, north of Kimball Road and west of Whitefish Road, south of Kimball Road.

Medium density residential development is limited to its location due to accessibility to sanitary sewer facilities. The proximity to the freeway interchanges and to the Village of Sand Lake and Pierson, where sewer facilities already exist will create a greater opportunity for development.

Commercial Development

The location of commercial development is dictated by accessibility by the consumer for survival. The two freeway interchanges within the Township are logical areas for commercial development within the Township. However, care must be taken to assure quality development by avoiding a disjointed approach to the development of commercial uses. This includes prohibition of strip commercial development resulting from piecemeal growth, the control of setbacks, curb cuts, signs and landscaping.

The Plan proposes commercial uses at the northwest corner of 22 Mile Road (Sand Lake exit) and Whitefish Road, and the northwest and southeast corners of the Cannonsville Road freeway exit. One of these developments already exists. Also the Plan proposes a commercial designation at the southwest corner of the Cannonsville Road exit of the Freeway to allow for the eventual development of a fire station. Commercial uses also exist in the Village of Pierson for the use of Township residents.

Institutional Development

Institutional uses are shown on the Plan only sparingly, but include the Large Montcalm County School District complex on the north side of Kendaville Road adjacent to US-131 on the east side of the Freeway; the land allocated for the drain fields for the force main sanitary sewer system for Big Whitefish Lake; and the small lane area devoted for the Pierson Township Hall and the adjacent cemetery.

Industrial Development

Current industrial uses include the sanitary landfill just south of Cannonsville Road adjacent to US-131. The Plan proposes eventual elimination of that use back to agriculture.

Sewer and water facilities are essential for the development of industrial uses with the Township. Since any significant utility development appears to be a long way off, the Plan does not include industrial development at this time.

Recreation Uses

Recreation development has been sparse in the Township but includes fishing, boating, swimming, hunting and birding primarily in the lake areas through public access areas. The public access recreation facilities include the Tri-County High School facility on Kendaville Road, The Big Whitefish Lake Golf Course and Restaurant, and the large private camp facility located on West County Line Road with access to Little Whitefish Lake Road.

The Plan proposes the development of a major recreation facility for use by Township residents to be located behind the Township Hall on the north side of Cannonsville Road. Both active and passive uses

are proposed such as nature trails, softball, an area for play equipment, tennis, etc. In this regard, the Plan recommends that a Parks and Recreation Plan be developed to assess the specific recreation needs of the Township.

Consideration should be given, also, to the study of the public access areas controlled by the Township to set a uniform operation format to assure that these facilities will not be abused by those who use the facilities.

Transportation

A discussion of the existing transportation facilities in the Township was presented in Chapter V dealing with Community Facilities and Transportation. In that chapter, the Plan discussed the road classifications and traffic volumes on the Township roads.

The low traffic volumes on most roads with the exception of Federal Road and US-131 are another example of the lower population density and other activity in the Township. However, roads do deteriorate and proper maintenance and improvement are important regardless of the volumes on those roads. The difficulty in assessing the road needs in a rural township is the priority rating system that must be an integral part of Montcalm County Road Commission's annual maintenance and improvement program.

Because Pierson Township is rural, particularly the eastern two-thirds, the Township does not receive substantial road improvement dollars from the County. Montcalm County is rural in character. Therefore, limited funds are available for all townships for road maintenance and improvement programs.

However, the Master Plan notes the improvements proposed by the County Road Commission as well as some planning items which are important for alleviating future land use and traffic problems. Two of the road improvements proposed in the township include pulverization and bituminous resurfacing of West County Line Road (CR 607) from M-82 to Kendaville Road (CR 530); and Kendaville Road from West County Line Road to Federal Road (CR 599) - scheduled for 1994.

Other important transportation recommendations include the following:

- Development of access management standards for the design of driveways along county primary roads, particularly where new commercial development may occur.
- Consideration for corridor planning in the future before land use and associated traffic problems develop. If corridor planning had been utilized in the Cedar Springs commercial area adjacent to the freeway, fewer curb cuts, less traffic conflicts and better arrangement of land uses would have occurred.
- Reconstruct the intersection of Dagger Road and Pierson Road creating a T-intersection to eliminate a traffic hazard.

Finally, the Plan recommends the Township assess the quality of the road maintenance program on the local roads to assure the monies are being expended wisely rather than simply patching a poor road bed to hold over for another year.

Water Facilities

As noted in the Existing Conditions section of the Master Plan, water for drinking, lawn and garden uses, agriculture uses, private recreation uses, etc. is provided through wells. Because of the density in the Township, sources of water have not been a problem. However, there are concerns in the Township concerning the future quality of drinking and recreation water facilities as a result of the sanitary landfill. The Plan recommends the continued monitoring of the effluent resulting from the landfill site to provide assurance that the groundwater supplies in the Township will remain of high quality. This potential problem could be disastrous as it would affect the health, safety and general welfare of a portion of the Township residents.

Also, the Plan recommends the continuance of wells as the exclusive use of water in the township until such time as the groundwater supply is being affected in certain areas or until it appears economically feasible to develop a centralized water treatment and distribution system in the Township for selected areas or extension of the current system in the Village of Sand Lake.

Waste Water Treatment and Collection

Currently, the only sanitary sewer facilities existing in the Township are in the Village of Pierson and the force main system around Big Whitefish Lake. However, the Village of Sand Lake at the southern edge of the Township has a sanitary sewer system for its residents. Therefore, the potential exists for extension of the facility unto the Township for future development in the southern and western portions of the Township. That fact has been recognized in the future land use Plan for Pierson Township.

The Big Whitefish Lake sanitary system is not a complete treatment system in that only the liquid wastes are transported from the Lake areas to a large septic drain field area to the north of the Lake at which point the effluent drains into the natural drainage system in the Township. Each resident being served by this system is required to pump solid wastes from its septic system (which is a closed system) to complete the disposal process.

If higher density residential as well as commercial uses are to develop in the future, the Plan recommends the investigation of utility extensions from the Village of Sand Lake including current capacities as well as the feasibility of sewer line extensions.

Natural Gas Transmission

Recent discussions have been held with the Michigan Consolidates Gas Company for the extension of natural gas lines to various residential areas in the Township. The Township should encourage the development of natural gas access which will provide for a more economical energy source for its residents.

Population Growth/Capacity to Develop

Population growth has increase by 31.2% on the average for each 10 year period since 1960. In addition, seasonal housing as a percent of total housing has increased from 22% in 1980 to 31% in 1990. As mentioned earlier, this accounts for 1,082 residents during the summer months, creating more economic activity, more recreation users in the Township and more traffic.

Assuming population increases at the same average rate of growth as it has in the past 30 years, population growth will total 2,852 in the year 2000 and 3,736 in 2010. If seasonal residency is added to the general population number, the year 2000 will see about 4,100 residents and 5,694 residents in the year 2010.

While seasonal residency has increased during the past decade, there is no reason to expect the percent to continue upward because the water front property is becoming very scarce. Therefore, the availability for a rapid increase in seasonal housing should slow during the next ten years. Big Whitefish Lake, for example, has a limited number of lots available for development. Only a few exist on the south and northwest portions of the lake. More likely, will be the increase of permanent residents due to the ease of commuting, land costs and the increase in services and amenities in the area. The Cedar Springs area is a good example of what can happen. However, the Master Plan for Pierson Township is proposing guidelines and controls through the Zoning Ordinance to assure more orderly and planned commercial areas as well as residential development.

CHAPTER X IMPLEMENTATION STRATEGIES FOR MASTER PLAN PROPOSALS

Perhaps the most important section of the Pierson Township Master Plan is a description of the proposals accompanied by important considerations such as priorities, possible zoning changes, capital improvements funding, and finally, identification of those responsible for implementation. (Note: Time Frame identified in this chapter uses the following criteria: Immediate = within two years; Short Term = within five (5) years; Long Term = five (5) to ten (10) years.)

- Residential Proposals

~ Develop General Residential Density Limits to Guide Future Zoning Decisions: - The Plan proposes a description of general residential density ranges to guide the Planning Commission and Township Board in making future zoning decision.

- Priority - High
- Time Frame - Immediate
- Zoning Ordinance Revisions - Yes
- Capital Improvements Funding - No
- Responsibility - Planning Commission and Township Board

~ Initiate Cluster Housing Development to Preserve Open Space, Wildlife Habitat and Recreation Opportunities - The Plan proposes the development of a Planned Unit Development Overlay District in the Zoning Ordinance to allow some flexibility in residential development.

- Priority - High
- Time Frame - Immediate
- Zoning Ordinance Revisions - Yes
- Capital Improvements Funding - No
- Responsibility - Planning Commission and Township Board

~ Establish Low Density Residential Development As The Primary Residential Density in the Township - The Plan has established that low density residential should be the predominate residential use in the Township.

- Priority - High
- Time Frame - Immediate
- Zoning Ordinance Revisions - Yes
- Capital Improvements Funding - No
- Responsibility - Planning Commission and Township Board

~ Develop Minimum Standards for Single Mobile Homes on Single Family Lots in the Township - The Plan recognizes the problem associated with mobile homes on single family lots in the Township. Mobile homes should comply with typical single family home standards.

- Priority - High
- Time Frame - Immediate
- Zoning Ordinance Revisions - Yes
- Capital Improvements Funding - No
- Responsibility - Planning Commission, Building Inspector and Township Board

~ Develop Minimum Square Foot Requirements for Dwelling Units in the Township - The Township should develop minimum square foot standards for single family dwellings to promote the health, safety and general welfare.

- Priority - High
- Time Frame - Immediate
- Zoning Ordinance Revisions - Yes
- Capital Improvements Funding - No
- Responsibility - Planning Commission, Building Inspector and Township Board

• **Waterfront Development**

~ Review and Change as necessary, setback standards from waterfront areas, lot coverage, sewer hookup requirements, multiple access to waterfront areas for residential uses, storage policies along waterfronts, etc. - Waterfront areas in the Township are sensitive areas that require special consideration because of the unique characteristics and due to the limited nature of waterfront lots. The Plan recommends the review and revision, as necessary of the zoning regulations dealing with the use of waterfront lots.

- Priority - High
- Time Frame - Immediate
- Zoning Ordinance Revisions - Yes
- Capital Improvements Funding - No
- Responsibility - Planning Commission and Township Board

~ Develop a Management Plan for all public lake access areas - Concern exists for the abuse of the public access points in the Township. The Plan recommends the development of a management plan for these areas.

- Priority - High
- Time Frame - Immediate
- Zoning Ordinance Revisions - No
- Capital Improvements Funding - No
- Responsibility - Planning Commission and Township Board

• **Transportation**

~ Develop Access Management Standards for the design of driveways along transportation corridors, particularly where commercial development may occur - The Plan recommends the development of access management standards to alleviate potential access problems before they develop in the Township.

- Priority - High
- Time Frame - Immediate
- Zoning Ordinance Revisions - Yes
- Capital Improvements Funding - No
- Responsibility - Planning Commission and Township Board

~ Consider Corridor Planning to prevent future traffic and land use problems occurring, particularly for existing and future commercial areas. - Future pressure for commercial

development at the freeway interchange will occur. To eliminate problems before they develop, the Plan recommends corridor planning.

- Priority - Medium
- Time Frame - Short Term
- Zoning Ordinance Revisions - Yes
- Capital Improvements Funding - No
- Responsibility - Planning Commission and Township Board

~ Study the feasibility of straightening some County roads in the Township for greater efficiency

- Some County roads provide circuitous routes, which in many instances, are caused by the construction of US-131. The Plan recommends the study of these routes to determine the feasibility of tying road fragments together more efficiently.

- Priority - Low
- Time Frame - Short Term
- Zoning Ordinance Revisions - No
- Capital Improvements Funding - No
- Responsibility - Montcalm County Road Commission, Planning Commission and Township Board

~ Reconstruct the intersection of Dagger Road and Pierson Road to eliminate a potentially hazardous traffic condition due to poor sight distance.

- For some time now, this road intersection has not been improved except for posting stop signs. It is time to reconstruct this intersection by creating a T-intersection.

- Priority - High
- Time Frame - Immediate
- Zoning Ordinance Revisions - No
- Capital Improvements Funding - Yes
- Responsibility - Montcalm County Road Commission, Planning Commission and Township Board

- **Utilities**

~ Continue the Monitoring Program at the sanitary landfill to assure ground water is not becoming contaminated.

- The landfill is a potential health problem in the Township. The Plan recommends the regular monitoring of the site to identify any potential contaminants.

- Priority - High
- Time Frame - Immediate
- Zoning Ordinance Revisions - No
- Capital Improvements Funding - No
- Responsibility - Owner of Landfill, Township, Township Board to follow up

~ Investigate the Feasibility of Sanitary sewer extensions for the Village of Sand Lake to areas of the Township - The only area of the Township where sanitary sewers might be available is the southern portion adjacent to the Village of Sand Lake. The Plan recommends the investigation of that possibility.

- Priority - Medium
- Time Frame - Short Term
- Zoning Ordinance Revisions - No
- Capital Improvements Funding - Yes
- Responsibility - Township Engineer, Planning Commission and Township Board

~ Encourage/Promote the extension of Natural Gas Lines onto the Township to provide most cost effective sources of energy. - Natural gas is a potential catalyst for new development as well as the convenience for current residents in the Township. The Plan recommends the promotion of natural gas line extensions into the Township.

- Priority - High
- Time Frame - Immediate
- Zoning Ordinance Revisions - No
- Capital Improvements Funding - No
- Responsibility - Michigan Consolidated Gas Co. and Township Board

- **Recreation**

~ Develop a major recreational facility adjacent to the Township Hall to serve township residents - The Township has no recreation facilities other than school and private operations. The Plan recommends the development of a Township park in a central location for the use of all residents.

- Priority - High
- Time Frame - Short Term
- Zoning Ordinance Revisions - No
- Capital Improvements Funding - Yes
- Responsibility - Planning Commission, Township Board and residents for support and promotion

~ Develop a Parks and Recreation Plan to determine more specific recreation needs in the Township - Parks and recreation planning is essential to determine the specific recreation needs of the community. In addition, a plan is required to qualify for Land and Water Conservation Funds through the State of Michigan, Department of Natural Resources.

- Priority - High
- Time Frame - Immediate
- Zoning Ordinance Revisions - No
- Capital Improvements Funding - No
- Responsibility - Planning Commission and Township Board

- **Administration**

~ Create a Planning Commission as Opposed to a Zoning Commission - It is important now to identify the more expanded role of the Planning Commission through a name change. The Plan recommends that this change be implemented in the near future.

- Priority - High
- Time Frame - Immediate
- Zoning Ordinance Revisions - Yes
- Capital Improvements Funding - No
- Responsibility - Township Board

~ Include the Planning Commission in the Review Process regarding the allocation of monies for road improvements - While the Township Board has the ultimate responsibility to allocate funds for road improvements, the Planning Commission should be involved in the review process by recommending improvements to the Township Board.

- Priority - High
- Time Frame - Immediate
- Zoning Ordinance Revisions - No
- Capital Improvements Funding - No
- Responsibility - Township Board

~ Amend/Rewrite the Zoning Ordinance and Map to provide regulations more in keeping with the recommendations of the Master Plan. - The Zoning Ordinance should be updated to reflect the changes as a result of the Master Plan preparation. In addition, special considerations should be given to regulations for special uses, planned unit development, site plan review, signs, parking and loading regulations, better control of waterfront development, mobile homes regulations, density requirements and other items as may be necessary or desirable.

- Priority - High
- Time Frame - Immediate
- Zoning Ordinance Revisions - Yes
- Capital Improvements Funding - No
- Responsibility - Planning Commission and Township Board

~ Develop a Regular Communications Procedure to keep residents as well as the press informed concerning activities in the Township. - The Plan recommends consideration be given to newsletters, press releases, town meetings, publishing minutes of meetings, etc.

- Priority - High
- Time Frame - Immediate
- Zoning Ordinance Revisions - No
- Capital Improvements Funding - No
- Responsibility - Township Board

~ Prepare a Capital Improvements Program - The Plan recommends the initiation of a capital improvements program with annual updating to set aside funds for capital improvements in the Township.

- Priority - High
- Time Frame - Immediate
- Zoning Ordinance Revisions - No

- Capital Improvements Funding - No
- Responsibility - Township Board and possibly the Planning Commission

- **Police and Fire Protection**

~ Assess and Improve where needed, a program for Police and Fire Protection to assure efficient protection in the Township, including possible establishment of a volunteer fire department - Fire protection has been a controversial topic in the Township. The Plan recommends an honest evaluation of all the issues and make a decision which best serves the residents of the Township.

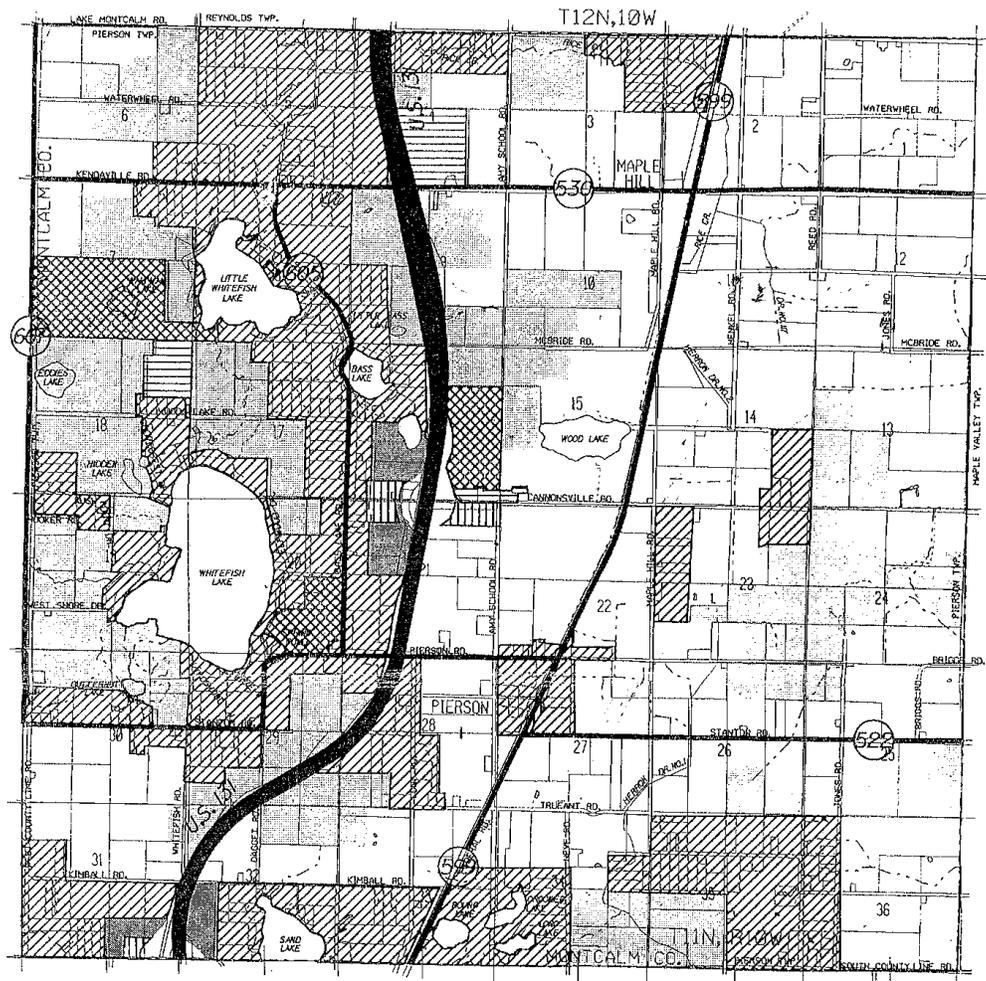
- Priority - High
- Time Frame - Short Term
- Zoning Ordinance Revisions - No
- Capital Improvements Funding - Yes
- Responsibility - Township Board

~ Implement a Fire and Police Protection Information Program for residents through general information - The Plan recommends the initiation of a general information program in the Township that will inform the residents of these two services: numbers to call for emergencies, things to do to prevent theft, fires and accidents, etc.

- Priority - High
- Time Frame - Immediate
- Zoning Ordinance Revisions - No
- Capital Improvements Funding - No
- Responsibility - Township Board

~ Improve 911 Response by opening a dialogue with the Montcalm County Sheriff's Department - Criticism has been leveled at the response time for the fine new emergency program in the County. Because of the importance of this system, the Plan recommends a solution to the problem by discussing various issues with the Sheriff's Department.

- Priority - High
- Time Frame - Immediate
- Zoning Ordinance Revisions - No
- Capital Improvements Funding - No
- Responsibility - Township Board



LEGEND

- | | | | |
|---|---|---|--------------------------------|
|  | IDLE - WOODED OR WETLAND |  | INSTITUTIONAL |
|  | ACTIVE AGRICULTURE |  | RECREATION |
|  | LOW DENSITY RESIDENTIAL
(2 UNITS OR LESS/ AC.) |  | COUNTY PRIMARY ROAD |
|  | COMMERCIAL |  | LIMITED ACCESS STATE TRUNKLINE |
|  | MEDIUM DENSITY RESIDENTIAL
(3-7 UNITS/ AC.) | | |

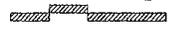
SOURCE: AERIAL PHOTOGRAPHY

PIERSON TOWNSHIP MASTER PLAN
MONTCALM COUNTY, MICHIGAN

FUTURE LAND USE

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THE WBDC GROUP
ARCHITECTURE PLANNING
ENGINEERING INTERIORS

SCALE: 1" = 1/4 MILE 


Implementation Roles and Responsibilities

The Master Plan is intended to help direct decisions in the Township over the next ten years. The Plan is implementation oriented, but depends upon the support of a number of groups. This section provided an overview of the roles of some of these groups in implementing the Master Plan and several changes to current Township procedures that are intended to improve government effectiveness in achieving the goals of the Master Plan.

- **The Planning Commission** is a citizen board of from five to nine members created by Township Board Resolution under the authority of the township Planning Act, being Public Act 168 of 1959, as amended. Among the most important roles of the Planning Commission is to develop and adopt the Township's Master Plan. The Planning Commission's other roles include providing recommendations to the Township Board on amendments to the Zoning Ordinance and re-zonings, and assist the community in meeting long term development challenges.
- In addition, the **Planning Commission** has the responsibility to review and approve site plans for new developments, and to review and recommend to the Township Board requests for conditional use permits and planned unit development which allows some flexibility in the traditional approach to land development. The development process begins with the Planning Commission. Therefore, the responsibility is great as is the resultant impact on future development.
- **The Township Board** has the legislative responsibility to implement the Master Plan after its adoption, through amendments to the Zoning Ordinance, township procedures, subdivision control, special land uses, and planned unit developments. While State enabling legislation does not require the official approval of the Master Plan by the Township Board, it stands to reason that the Plan should be approved by the Board to maintain harmony between the Planning Commission and the Township Board regarding policy for future growth and development within the Township.
- **The Township Board and the Planning Commission** must work closely together to effectively implement the Plan. The Planning Commission provides the Board with recommendations for zoning text amendments and changes to zoning district boundaries. The Township Board must have the confidence in those recommendations or certain conflicts can result. Both the Township Board and the Planning Commission need to have continuous communication to make this process work effectively.
- **Board of Zoning Appeals** has a major role in implementing the Master Plan through administration of the Zoning Ordinance. More specifically, the Board is responsible for deciding and interpreting the provisions of the Ordinance that require impartial adjustments of conflicting interests and to grant variances from the strict letter of the Ordinance in instances of practical difficulties.
- Their decisions must have as one of their purposes of sustaining the constitutionality of the Zoning Ordinance and to be in compliance with the objectives of the Master Plan. Serious implications can result from decisions by the Board of Zoning Appeals that are not coordinated with the Planning Commission.

Zoning Ordinance Changes

Some of the recommendations of the Master Plan deal with changes to the Zoning Ordinance. These changes must be re-made to effectively implement the Master Plan.

The changes are intended to help streamline the approval process while ensuring that there is the thorough review needed to promote the quality types of development sought by residents and community leaders. The changes also correct some inefficiencies in the current administrative procedures, deficiencies in use regulations, and site development standards.

Specific recommended amendments are:

- **Site Plan Review:** The site plan review process should be reviewed and revised to include a logical submittal and review process. Review criteria should be included to help the Planning Commission in their deliberation.
- **Special Use Permits:** The special use permit section should be revised in the Zoning Ordinance to include the Planning Commission in the review process. The Planning Commission recommends approval or rejection to the Township Board who makes the final decision since a special use deals with the use of land. Also, a clear approval process should be spelled out in this section.
- **Planned Unit Development:** The proposed revisions to the Zoning Ordinance should include a new section dealing with planned unit development. This process will allow the developer some flexibility in developing land to the benefit of future residents and the Township in general by clustering housing units, thus creating large areas of open space. The approval process is elaborate, requiring a public hearing, detailing site plan for final approval and a preliminary site plan if the property is being developed in phases.
- **The Zoning Board of Appeals:** While the Zoning Board of Appeals is currently a part of the variance process in the Township, a review should be made of this section to assure that compliance with current State of Michigan enabling legislation is being met.
- **Parking and Loading Regulations:** The Zoning Ordinance should be amended to include a section on off-street parking and loading restrictions.
- **Signs:** The Zoning Ordinance should be amended to include a section dealing with the use of signs, the types of signs permitted, the size of signs and the characteristics of permitted signs.
- **Definitions:** The definitions section should be reviewed to eliminate those definitions that do not pertain to the Ordinance and to add those that are needed for Ordinance clarification.
- **Organization of the Zoning Ordinance:** The Ordinance should be restructured to make the Ordinance sections more easily accessible and easier to read.

TOWNSHIP OF PIERSON
MONTCALM COUNTY, MICHIGAN
SUPPLEMENT NO. 1
TO THE MASTER PLAN

ADOPTED DECEMBER 19, 2002

This Document supplements
and is in addition to the
Township Master Plan dated April 29, 1993.

Supplement No. 1
to the
Township Master Plan

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* Chapters not listed have been reviewed, but are not being amended by this Supplement.

TOWNSHIP OF PIERSON
COUNTY OF MONTCALM

Supplement No. 1
to the
Township Master Plan

PIERSON TOWNSHIP PLANNING COMMISSION

Chairperson	Merrisue Philippus
Vice Chairperson	George Ravell
Secretary	John Lehmoine
Member	Thomas Caldwell
Member	Doyle McKenney
Member	Noel Powell
Member	J. Scott Vukin

PIERSON TOWNSHIP BOARD OF TRUSTEES

Supervisor	Nancy A. Maioho
Clerk	Brooke E. Scott
Treasurer	J. Scott Vukin
Trustee	William Bryant
Trustee	William Paepke

December 19, 2002

CHAPTER I

Introduction

This document is the first supplement to the Pierson Township Master Plan, which was adopted by the Township Planning Commission on April 29, 1993.

The purpose of this supplement is to include in the Township Master Plan updated factual information, such as new census figures and other matters, which have arisen during the time since the 1993 plan was adopted.

In addition, the Planning Commission has reviewed the goals and objectives stated in the 1993 plan, as well as various other portions of the Plan, and has amended many of these provisions where appropriate, and so as to reflect changes in the facts and circumstances affecting land use in the Township during the nearly ten years since the adoption of the 1993 Plan.

Accordingly, this Supplement No. 1 does not replace the 1993 Plan; rather, it is updating of that plan, and so it is intended to be read and applied along with the 1993 Plan, so that both documents together constitute the Master Plan for the Township.

Thus, this Supplement changes the 1993 Plan only in the respects specifically stated. As to all other matters, the content of the 1993 Plan remains fully in effect.

The Pierson Township Planning Commission has been established under the terms of the Township Planning Act, which is Public Act 168 of 1959. That Act authorizes townships to prepare and adopt a plan for the incorporated portion of the township. The basic purpose of a township Master Plan are the following:

- promote the public health, safety and general welfare;
- encourage the use of resources in accordance with their character and adaptability;
- avoid overcrowding of the land by buildings and people;
- lessen congestion on public roads and streets;
- facilitate a transportation system, sewage disposal, safe and adequate water supply, recreation and other public improvements; and
- to consider the township's character and suitability for particular uses, including preservation of open space and rural character of the township.

The review of the 1993 Plan by the Planning Commission and the adoption of this Supplement are consistent with and will help to implement the basic purposes of the Township Master Plan. This updating of the Plan will help to ensure that the Township continues to be on a path for orderly growth and development, and the preservation of lands and natural features consistent with the needs and goals of the people of the Township.

In addition to factors within the Township that cause or have effect on growth and development of Township lands, Pierson Township is located in an area of Western Michigan which has been undergoing substantial land use changes in recent years. As one of the townships immediately adjacent to the Grand Rapids metropolitan area, Pierson Township has been steadily growing in population and land development and it will continue to do so, perhaps at an increasing pace. This area of Western Michigan, including the Township, continues to be a highly desirable area in which to live, work and pursue leisure-time activities. These and many other factors affecting land use and development have prompted the preparation of this Master Plan Supplement, and will require that the Township continue to evaluate and periodically modify the Plan, as appropriate in the coming years.

In the preparation of this Supplement, the Township Planning Commission participated in a series of working meetings and benefitted from comments and suggestions from Township residents, both during the preparation of the Supplement and during the public hearing convened by the Planning Commission prior to its decision on the adoption of the Supplement.

All of the people of Pierson Township are encouraged to continue their assistance to the Planning Commission by providing suggestions and comments about land use regulation and proposed future land uses within the Township, and to otherwise become involved in the ongoing and important process of land use planning in the Township.

This Supplement No. 1 includes changes in the following chapters of the 1993 Master Plan:

Chapter III	Community Character
Chapter IV	Community Facilities and Transportation
Chapter VI	Existing Land Use
Chapter VII	Goals and Objectives
Chapter IX	Master Plan Elements
Chapter X	Implementation Strategies for Master Plan Proposals

CHAPTER III

COMMUNITY CHARACTER

Following this page is revised and updated material in Chapter III of the 1993 Master Plan.

For convenience of reference to the updated material in this Supplement and the unchanged material in the 1993 Plan, the page numbers of the revised materials in this supplement correspond in most cases to the corresponding page number in the 1993 Plan.

TABLE 2
Population by Age, 2000
Pierson Township/Pierson Village/Montcalm County

	Township	County	State
Age	Percent	Percent	Percent
5 & Under	7.4%	6.5%	6.8%
5 - 19	25.3%	23.1%	22.2%
20 - 24	4.6%	5.7%	6.5%
25 - 44	30.5%	30.2%	29.8%
45 - 54	14.5%	13.0%	13.8%
55 - 59	5.1%	5.1%	4.9%
60 - 64	3.7%	4.3%	3.8%
65 - 84	8.4%	10.8%	10.9%
85 & Over	0.5%	1.3%	1.3%
TOTAL	100%	100%	100%

Source: US Census, 2000

The Township's increasing median age is consistent with trends seen throughout most of the United States. This can be a cause for concern because of the resulting effects soon the Township's ability to provide community services for an aging population. Table 2 indicated that the Pierson Township population on average is younger overall than either Montcalm County or the State of Michigan. Pierson's percentage of elderly persons (over age 65) is less than the County and State.

There are many issues which can be identified from analyzing the age breakdown of population. In Pierson Township, the following conclusions have resulted from this analysis:

TABLE 3
General Age Characteristics

	Pierson Twp. 1980	Pierson Twp. 1990	Pierson Twp. 2000	Montcalm Co. 2000	State - 2000
Median Age	27.5	30.7	34.7	35.6	35.5
% under 18	32.7%	33.6%	30.4%	27.1%	26.1%
% over 65	7.5%	8.8%	8.8%	12.1%	12.3%

Source: US Census, 2000

TABLE 5
Population by Race

Community	Total	White	Black	Hispanic Origin	Other
Pierson Twp.	2,866	2,759	2	39	66
Percent	100%	96.3%	0.1%	1.4%	2.2%
County	61,266	58,101	1,330	1,394	441
Percent	100%	94.8%	2.2%	2.3%	0.7%
State	9,746,028	7,966,053	1,412,742	323,827	43,406
Percent	100%	80.2%	14.2%	3.3%	2.3%

Source: US Census, 2000

Population by Race

Pierson Township is a predominantly white community. Almost 97% of the Township and 95% of the County population is white compared to 80% for the State of Michigan. A small percentage of Pierson residents are of other origins.

Education Levels

High school education levels for Pierson Township residents are comparable to the County and State figures. The percentage of college graduates for the Township and County is approximately one-half of the State rate. This is indicative of a local economy based on agricultural, commercial, and manufacturing which requires fewer college educated workers.

TABLE 6
Education Levels, 2000

	Pierson Township	Montcalm County	Michigan
Percentage of High School Graduates	83.3%	81.2%	83.4%
Percentage of College Graduates	13.8%	10.8%	21.8%

Source: US Census, 2000

Tables 7 and 8 present a detail of Principal Employers and Employment by Industry for Montcalm County. Although these numbers provide a profile of Montcalm County as a whole, they may not translate well to Pierson Township. It must be emphasized that Pierson Township has 19.3% seasonal residents compared with 9.3% in the County. This seasonal population is, most likely, not involved with the same local labor markets as the permanent residents.

Pierson's economy suffers from an inadequate local base. Commercial and light industrial development should be encouraged as a means of increasing the tax base and providing year-round jobs, but somehow such change should be balanced by the need to preserve the environment that attracts people to Pierson in the first place.

The US-131/Cannonsville Road interchange provides a logical location for commercial and industrial development. This interchange is centrally located, provides convenient access to potential development sites and is highly visible with good traffic volumes.

TABLE 8 – Employment by Industry in Montcalm County, 1997

	<u>Employment (Number of Employees)</u>		
	1979	1989	1997
Total Employment	18,615	22,042	
Components by Type:			
Wage and Salary	14,809	17,127	21,628
Proprietors	3,806	4,915	2,094
Farm	1,370	1,125	344
Nonfarm	2,436	3,790	1750
Industry			
Farm	1,890	1,527	1213
Nonfarm	16,725	20,515	24,380
Private	14,262	17,832	21,628
Agric./For./Fish	132	399	
Mining	55	49	
Construction	822	868	1998
Manufacturing	5,474	6,289	7960
Non-Durable Goods	---	---	1109
Durable Goods	---	---	4680
Transp. And Utilities	318	376	892
Wholesale Trade	716	413	673
Retail Trade	2,905	3,919	3,286
Fin./Ins./Real Estate	694	1,042	920
Services	3,146	4,477	2,814
Government	2,463	2,683	2,752

No figure given indicates confidential information or fewer than 10 employees. Pierson Township employers are likely to be included in this small employer category.

Source: 1997 Economic Census; Industrial Development Division, University of Michigan and the Michigan Department of Commerce.

Per Capita Income

Pierson Township's per capita income is higher than Montcalm County's, although both are lower than the State. Pierson Township's per capita income figure may benefit from resident's who work in Kent County.

Increases shown in per capita income 1990 to 2000 does not mean real incomes have doubled in the state. Income figures must be inflation-adjusted to show increase or decrease in purchasing power.

In addition, who looking at the Pierson Township numbers, the Census is based on the year round population. If per capita incomes form the seasonal residents were factored in, the Township's income would most likely increase.

TABLE 9
Per Capita Income: 1990, 2000

	Pierson Township	Montcalm County	Michigan
1990	\$10,661	\$10,081	\$14,154
2000	\$19,216	\$16,183	\$22,168

Source: US Census, 1990-2000

Poverty Statistics

Generally, in 1999, Pierson Township residents were less likely to be living below the poverty level than residents in the rest of Montcalm County (3.4% of families below poverty level in Pierson Township, versus 7.4% in Montcalm County), and less likely then in the State as a whole (7.4% in 1999).

TABLE 10
Household Income Distribution, 2000
Pierson Township

Range	Less than \$10,000	\$10,000-\$14,999	\$15,000-\$24,999	\$25,000-\$34,999	\$35,000-\$49,999	\$50,000-\$74,999	\$75,000-Plus
Percent*	1.7%	3.4%	6.6%	11.3%	25.6%	27.4%	24%

* Based on 1015 Households in the 49339 Zip Code

Source: US Census, 2000

Percentage of Families with Income in 1999 below Poverty Level:

Pierson Township: 3.4%
 Montcalm County: 7.4%
 State of Michigan: 7.4%

(Poverty statistics are calculated by the Census Bureau and are based on the average national income and cost of living figures. Generally, the poverty level is assumed to include all of those households, individuals or families with incomes ten percent or more below the median income. That is, if the median income is reported to be \$10,000, all households with incomes less than \$9,000 would be identified as living in poverty. For statistical purposes, the poverty thresholds are computed at the national level only. No attempts are made by the Census Bureau to adjust these figures for State, County or local variations. For this reason, the numbers presented in this report should be used only for comparison of State, County and township data.)

The above information reflects only those persons who responded to the 2000 Census. Almost 19.3% of Pierson's population is seasonal and may be included in the tabulation for other communities.

Housing Characteristics

Value

The housing supply in Pierson Township is generally of very high quality, with a mix of historic summer cottages and year-round homes in lake-oriented communities, farmsteads and new construction scattered throughout the Township. Table 11 compares the 2000 median value of specified owner-occupied single-family homes in the Township with adjacent townships, the County and State.

The median value in Pierson Township was substantially higher than the median value in Montcalm County, but lower than the State of Michigan. This is due to waterfront homes in the Township and the higher value of waterfront property. It may also be partly attributed to the growing desirability of the area as residence for persons working in Grand Rapids. Comparison of the median value data for neighboring Townships supports the argument that land values and housing are strongly influenced by waterfront sites.

Table 12 summarizes 2000 Census data concerning the value of specified owner-occupied homes in the Township, with percentage comparisons between Pierson Township, Montcalm County and the State overall. The value of Pierson's housing stock falls between those for the County and State in all price ranges, with Pierson's housing value more closely approaching the State. In the County, 67.9% of the housing stock is valued below \$100,000 compared with 40.7% in the Township and 41.3% Statewide.

TABLE 11
Median Value of Owner-Occupied Housing, 2000
Pierson Township and Surrounding Communities

Community	Median Value
Pierson Township	109,700
Maple Valley Township	80,400
Reynolds Township	83,000
Winfield Township	107,600
Montcalm County	84,900
State of Michigan	115,600

Source: US Department of Commerce, Bureau of Census

Table 13 below indicates that almost 17.8% of the housing units are mobile homes compared to 18.6% in the County and 8.5% in the State. The Township’s high percentage of mobile homes causes the median housing value to decrease. However even with this high percentage of mobile homes, the median value of Pierson’s housing units is still \$24,800 higher than the County.

The average sale price of homes is slightly different than the median value as reported to the Census Bureau and shown in Table 11. According to the Montcalm County Association of Realtors, the 1991 average selling price for homes in Montcalm County was \$43,888.

Affordability

When calculating the availability of affordable housing, it is generally accepted that the average selling price of housing should not exceed 2.5 times the median income. Using this calculation, the minimum median household income for Montcalm County would be in the \$17,777 range (i.e., the average \$43,888 selling price of homes in Montcalm County divided by 2.5). Table 10 above indicates that over 60 percent of households in Pierson have annual incomes above that figure.

Pre-manufactured housing and multiple family units are examples of alternative low-cost, or affordable housing.

TABLE 12
Value of Specified Owner-occupied Housing Units, 2000
Pierson Township, Montcalm County and Michigan

Housing Value	Pierson Township	Montcalm County	State of Michigan
Less than \$50,000	5.6%	14.3%	9.9%
\$50,000-99,999	35.1%	53.6%	31.4%
\$100,000-149,999	35.1%	22.3%	26.6%
\$150,000-199,999	12.8%	6.3%	15.0%
\$200,000-299,999	7.4%	2.9%	11.1%
More than \$300,000	4.0%	0.6%	6.0%

While Pierson Township has a comparably high percentage of mobile homes, the availability of multiple family units in the Township is rather small at 2.2% in 2000. This trend may partially explain the decrease in the percentage of the Township’s elderly residents (over age 65) compared to the County and State. In other words, the limited availability of multi-family housing in Pierson forces its elderly to search elsewhere for suitable housing.

The 1990 census does not provide the number of mobile homes in Pierson Township. However in Montcalm County the percentage of mobile homes increased from 17% of total housing units in 1990 to 17.8% in 2000. A similar increase in mobile home units has most likely occurred in the Township.

Pierson Township is similar to the County and higher than the State in the percentage of single family housing units (Township 80.2%, County 75%, State 74.5%).

Seasonal Housing

Pierson Township has a substantially higher rate of seasonal housing (19.3%) than either Montcalm County (9.3%) or the State of Michigan (5.5%).

TABLE 13
Selected Housing Characteristics, 2000

	Township	Township	County	State
Single Family	1076	80.2%	7%	74.5%
Multi-Family	27	2%	8.2%	18.8%
Mobile Homes	239	17.8%	18.6%	8.5%
Total Housing Units	1342	100%	N/A	N/A
Seasonal Housing Units	259	19.3%%	9.3%	5.5%

Source: US Census, 2000

The further increase of seasonal homes may depend significantly on the availability of waterfront lots and/or housing. In many lake locations around Michigan a small cottage or group of cottages will be demolished and replaced by a larger, more expensive home. As this process continues, the availability of lake front property decreases and price becomes more expensive resulting in more exclusive use and control of natural lakes. When the Township's lakefront sites are totally developed the percentage of seasonal housing may level off or at least grow at a much slower rate, as it would only increase by the sale of newly developed lands.

The demand for retail services and employment can both be affected by a high percentage of seasonal housing impacting the cash flow of local retailers. The increase in seasonal homes may also impact tourism as increased private development of lake front property can generate pressures to reduce or eliminate public access to the Township's lakes.

CHAPTER IV

COMMUNITY FACILITIES AND TRANSPORTATION

Following this page is revised and updated material in Chapter IV of the 1993 Master Plan.

For convenience of reference to the updated material in this Supplement and the unchanged material in the 1993 Plan, the page numbers of the revised materials in this supplement correspond in most cases to the corresponding page number in the 1993 Plan.

Utilities

The following private and public utility providers serve Pierson Township:

Private Sanitary Sewer: Big Whitefish Lake and Little Whitefish Lake

Public Sewer: Village of Pierson

Water: Provided by private wells

Gas: DTE Energy - although service is not available throughout the Twp

Electricity: Consumers Energy and Great Lakes Energy

Telephone: Ameritech and Verizon

Cable Television: Charter Communications

CHAPTER VI
EXISTING LAND USE

Following this page is revised and updated material in Chapter VI of the 1993 Master Plan.

For convenience of reference to the updated material in this Supplement and the unchanged material in the 1993 Plan, the page numbers of the revised materials in this supplement correspond in most cases to the corresponding page number in the 1993 Plan.

Agricultural lands and other open space dominate the use of land within Pierson Township. Located within commuting distance from Grand Rapids/Kent County the township draws a broad range of residents, from seasonal home owners to year-round residents. Among the aspects of the township that potential residents find attractive are the rural character, the variety of natural features and the proximity of the township to urbanized areas.

The Existing Land Use Map (Appendix) shows the use of land in 1998, as determined through the use of aerial photography and resident input. Although this map does not present a precise depiction of all land uses within the township, it is valuable to indicate general development patterns.

Agricultural

Land identified on the Existing Land Use Map as agricultural has been determined to be actively farmed at the time of their Plan. It is intended that residential development in agricultural areas be maintained at the lowest possible density, limited to single family homes. This, along with vacant land, is the most abundant land use in the township. Uses in this category are distributed throughout the township, although the largest contiguous areas are east of US-131. Since farming remains a vital land use in some areas of the Township, active farmlands are also identified on the PA 116 Farmland Map in the Natural Features Chapter.

Residential development in agricultural areas shall be limited to single family dwellings, established on minimum lot size of 2.5 acres with minimum lot width of 200 feet, except minimum lot area for a farm shall be 10 acres.

Idle

Idle lands are also scattered throughout the Township with larger areas occurring along the US-131 corridor and wetland areas around the lakes. In the east half of the Township, idle land occurs along the south township boundary and in the east central portion at the wetland area called Bear Swamp. The amount of land which is idle has played a significant role in the development of the character of the Township. The large, open areas provide the essence of rural character by providing a tranquil surrounding. As noted earlier, this rural character is one of the major reasons that many of the current residents moved to the township, and continues to be a factor in attracting new residents.

The use of the frontage of large lots for single family homes in agricultural/vacant areas has created a number of vacant properties for which access is limited. These vacant parcels may be available for future development, but access may be complicated by the development along the road frontage.

Residential

This land use category included all single family homes, duplexes, apartments and mobile homes. Most of the existing residential land uses are found along Big Whitefish, Little Whitefish and Bass Lake. New construction has also occurred elsewhere in the Township, mostly on large lots along primary roadways.

Given that the lake front areas possess some of the most sought-after properties for residential development, the Township will likely continue to feel pressure for development in these sensitive areas.

CHAPTER VII

GOALS AND OBJECTIVES

Following this page is revised and updated material in Chapter VII of the 1993 Master Plan.

For convenience of reference to the updated material in this Supplement and the unchanged material in the 1993 Plan, the page numbers of the revised materials in this supplement correspond in most cases to the corresponding page number in the 1993 Plan.

To clarify the scope of the Plan, the following are things the Master Plan will not do: For example:

- The Master Plan has no authority to mandate any particular use of any particular land parcel. The intent of this Plan is to guide zoning in the future, but its suggestions may or may not be carried forward by inclusion in the Zoning Ordinance and Map, which governs the use of land in the Township.
- Nothing in this Plan is intended to affect the value of any particular land parcel, even though in some cases, the designation of certain land use for more intensive uses can increase the future value of that parcel. Broadly speaking, though, this Plan should protect land values. Therefore, this Plan does not address the question of property taxes, which, of course, are based on land value.

With that as a background, the following goals and objectives are stated as a general guide for future growth and development in Pierson Township:

- **Develop an appropriate land use policy which is oriented to preserving those important assets expressed by residents**
 - Establish general density limits with ranges to guide future zoning decisions.
 - Initiate cluster housing development to preserve open space, wildlife habitats and recreation opportunities.
 - Pursue the general objective of low density housing in the Township with the provision for higher density areas in proximity to the Village, developing areas, and near freeway interchanges.
- **Develop strong police and fire protection**
 - Develop, implement and maintain an acceptable program for police and fire protection locally to assure an efficient protection to the Township residents.
 - Continue establishing a dialogue with the Montcalm County Sheriff's Department.
- **Develop a Future Parks and Recreation Program for the Township**
 - Establish general areas for recreation development within the Township as part of the Master Plan.
 - Prepare a parks and recreation plan which assesses need and proposes new facilities to address those needs.

- **Develop a program to assure surface and groundwater quality**
 - Develop a strict monitoring procedure for the sanitary landfill in the Township.
 - Monitor other areas of non-point pollution such as the use of herbicides and animal waste on farmland, fertilizer on residential lawns, commercial recreation areas, etc.

- **Develop a vehicular transpiration system to assure safety, efficiency and ease of maintenance.**
 - Continue to support Township Road Committee as they continue to study the feasibility of straightening county-designated roads for greater efficiency in circulation.
 - Improve those roads in the Township which have poor road bases, thus, once and for all, alleviating a great road maintenance cost each year to the Township.

- **Preserve and enhance those open water and wet land areas as wildlife habitat and recreation areas in relation to County and State laws.**
 - Work with the Big Whitefish Lake and Little Whitefish Lake Associations to preserve the water areas of both lakes and those wet land areas which are the natural breeding grounds as well as stopping area for migratory birds, including the rare Common Loon (at least in this area of Western Michigan).
 - Initiate water quality programs similar to that developed at Big Whitefish Lake with other lake associations.

- **Develop commercial areas at appropriate locations to enhance land use compatibility rather than conflict with other uses.**
 - Locate commercial uses at freeway interchanges using appropriate buffers to screen from other uses.
 - Discourage strip commercial development but rather, promote cluster development with more emphasis on depth than width.

- **Protect waterfront areas from intense development**
 - Review and change, as necessary, the land use densities and control guidelines on waterfront property such as restrictions on multiple lot use of waterfront access.

FACTORS AFFECTING GROWTH

Following this page is revised and updated material in Chapter VIII of the 1993 Master Plan.

For convenience of reference to the updated material in this Supplement and the unchanged material in the 1993 Plan, the page numbers of the revised materials in this supplement correspond in most cases to the corresponding page number in the 1993 Plan.

- Improve water quality - sea gulls/landfill
- Better landfill control/monitoring/control its growth
- Preservation of rural atmosphere
- Recreation development

Public Health, Safety and General Welfare

- Initiate a neighborhood watch
- Fire department development
- Mock disaster planning

Utilities

- Sanitary sewer locations
- Cleaning of drainage ditches
- Further development of natural gas, cable TV and electrical service

Land Use Development Options

- Promote small business
- Planning for commercial and light industrial development

Enforcement

- Road Committee involvement for road money allocations
- Better zoning enforcement and control of special uses
- Spot zoning
- Better communication between Township officials and press
- Better communication between the Township officials and residents
- Control of lot access on waterfront property in Township

External Forces

There are other factors affecting growth in the area which to a large degree cannot be controlled by Pierson Township. These forces are primarily economic and image related and can become major issues. There are as follows:

- Healthy economic climate (strong employment opportunities, continued growth of the economy)
- The natural amenities of the area such as the lake front property and the supply/demand relationship, the rural characteristics, the climate, the air quality, etc.
- The economic health of the Grand Rapids area because of its proximity to the Township
- Migration from neighboring areas within the State of Michigan or neighboring states.

CHAPTER IX**MASTER PLAN ELEMENTS**

Following this page is revised and updated material in Chapter IX of the 1993 Master Plan.

For convenience of reference to the updated material in this Supplement and the unchanged material in the 1993 Plan, the page numbers of the revised materials in this supplement correspond in most cases to the corresponding page number in the 1993 Plan.

Future Land Use

The Future Land Use Plan for Pierson Township will be the basis for future zoning decisions. Very important events in recent years have emphasized the need for a general plan for a community followed by a well thought out zoning ordinance based on those land use proposals embodied in the Plan. First the courts throughout the U.S. have now recognized planning as the most important basis for zoning; and second, state legislatures now mandate the preparation of a Master Plan as a basis for zoning.

Certainly, just because a community has a zoning ordinance based on a plan, does not mean there will never be a law suit. But, the chances of success in court are greatly increased as is the ability of a community to determine its own destiny. The important aspect of the planning process is that the plan has been well thought out and is, subsequently, a basis for zoning. The courts appreciate the logic of zoning arguments when planning is an integral part of the development process.

Pierson Township has faced some challenged from a variety of directions such as the sanitary landfill, the popularity of the lake front property in the Township, and ground water quality threats. These concerns and many more are embodied in the General Plan and particularly the future land use portion of the Plan.

Agricultural Development

Pierson Township is about 36 square miles in area. Over half of that land area is devoted to active agriculture use, idle or wooded lands. Of this significant land area devoted to agriculture use, about 4,300 acres (6.72 square miles) are designated as agriculture land through the Open Space Preservation Act (PA 116). About 560 acres of PA 116 land lie west of US-131. The historical emphasis for agricultural uses in the Township has been east of US-131. Therefore, the Plan does not jeopardize that historical fact but actually strengthens the agricultural orientation by making agricultural land use an integral part of the Plan within the east 1/2 of the Township.

It is intended that residential development in agricultural areas be maintained at the lowest possible density, limited to single family homes.

More specifically, the Plan proposes agricultural uses west of US-131 in the north half for section 31 (north of Kimball Road) and in section 30, south of Stanton Road - and in the northwest part of the Township (section 6 and 7) north and south of Kendaville Road and south of Lake Montcalm Road, east of West County Line Road. The remainder of the lands west of US-131 are devoted to other uses in the Plan.

East of the freeway, the predominant use is agriculture with significant areas devoted to wet land, idle or woodland. There are clusters of residential development, particularly at the south end of the Township around Sand and Round Lakes and generally south of Kimball Road.

The heaviest concentration of agricultural land is found in Sections 1, 2, 11 - 15, 22, 25 - 27 and 36. A significant departure from the current use of land is the proposed agricultural use designation where the current sanitary landfill is operating.

Idle Lands, Woodlands or Wetlands (Excluding Lakes)

This land use category is distributed widely over the township. In fact, almost 6.9 square miles or 4,410 acres comprise this category. There are other activities scattered within this land area, such as residential and agricultural uses. However, for the most part this land use will remain undeveloped for the long term.

Residential Development

The predominant residential use is the low density category which is two (2) units per acre or less. Two general categories are included in this density classification: the general low density residential areas and the waterfront areas where densities are somewhat higher on some of the lakes. For example, Big Whitefish Lake includes higher density areas on the east and southeast sides of the Lake while the remainder of the density meets the general density of two (2) units per acre.

Low Density Residential: The low density category east of US-131 is located at the south end of the Township generally south of Kimball Road east to Jones Road. Other low density clusters are found in the Village of Pierson, along Maple Hill Road south to Cannonsville Road and north and south of Cannonsville Road at Reed Road; south of Lake Montcalm Road west of the Federal Road (Old US-131); east and west of Maple Hill Road; a small cluster along Rice Creek, south of Lake Montcalm Road; and a clustering along Long Road, south of Pierson Road.

Low density development is proposed in the southeast portion of the Township east of West County Road and north of South County Road and generally south of Kimball Road.

In addition, the predominant use west of US-131 is proposed as low density residential. This logical designation is based on the following factors:

- Proximity to waterfront real estate
- The highest ground is located west of US-131
- The greatest tree cover is west of US-131, creating a desirable residential environment
- Accessibility to US-131 and larger urban areas to the north and south

The low density residential use is primarily located from Stanton Road north to Lake Montcalm Road.

Waterfront Residential Development: The waterfront residential uses are located at Big Whitefish Lake, Little Whitefish Lake, Sand Lake, Round Lake, Crooked Lake, Long Lake and Bass Lake. Many of these residential uses are seasonal which creates additional traffic and economic activity during the summer months. However, because of the increasing value of waterfront property, the ease of commuting and the low land values in other areas of the community, more permanent residents are moving to the area.

Waterfront property and the related lakes are a valuable resource. Therefore, they need special consideration in the Zoning Ordinance pertaining to the use of lake frontage and the multiple use of lake access by more than one residence.

Medium Density Residential Development. The medium density residential category ranges from three (3) to seven (7) units per acre. The Plan recommends medium density residential uses north and south of Cannonsville Road adjacent to the west side of US-131 and west and east of US-131 at the Sand Lake exit (22 Mile Road or South County Line Road) - west Dagger Road, north to Kimball road and west to Whitefish Road, south of Kimball Road.

Medium density residential development is limited to its location due to accessibility to sanitary sewer facilities. The proximity to the freeway interchanges and to the Village of Sand Lake and Pierson, where sewer facilities already exist will create a greater opportunity for development.

Other Residential Development - Manufactured Housing Communities.

On February 6, 2001, the Township Board adopted an ordinance amending Chapter X of the Township Zoning Ordinance, so as to adopt new provisions for the R-3 District, the Manufactured Housing Community District. This district provides for the use and development of lands for manufactured housing communities, formerly called mobile home parks.

By and Order approved January 24, 2001, the Michigan Manufactured Housing Commission approved Pierson Township's new R-3 zoning district, under the terms of the Mobile Home Commission Act. Accordingly, the stricter design and development standards that the Township has adopted for manufactured housing communities have received all required approval from the Manufactured Housing Commission, as required by law. The provisions apply to all manufactured housing communities in the Township after February 26, 2001.

The new R-3 district includes detailed standards for the design and construction of manufactured housing communities, including access roads and off-street parking, sidewalks, lighting, utilities, minimum size mobile home sites, screening and landscaping, required open space, signs and numerous other matters.

There are other provisions specifying the minimum size for a manufactured home located in a manufactured housing community; installation of manufactured homes; personal property storage in storage sheds and otherwise within individual mobile home sites; and upkeep and maintenance of manufactured housing communities.

The revised R-3 district will enable the Township to reasonably regulate the size, operation and land use impact of manufactured housing communities within the Township. Such communities, when established, will provide additional housing opportunities at appropriate locations within the Township.

Provisions for Clustered Residential Development.

In 2002, the Township Board adopted amendments in the Township Zoning Ordinance in accordance with Public Act 177 of 2001, which provides for residential developments in a manner which preserves significant amounts of open space, through the clustering of dwellings within appropriate portions of land developments. Under the terms of Act 177, and the amended provisions in the

Zoning Ordinance, at least 50% of the land proposed to be included in a residential development must be set aside as permanent open space, with the remaining amount of land used for development of homes. The intent of Act 177 and the new zoning ordinance provisions is to encourage the preservation of undeveloped land in ways that will help to preserve rural views and otherwise moderate the impacts increasing and development.

These clustering provisions, under the new Open Space Preservation legislation, are available in addition to current Pierson Township ordinance provisions residential planned unit developments.

Commercial Development

The location of commercial development is dictated by accessibility by the consumer for survival. The two freeway interchanges within the Township are logical areas for commercial development within the Township. However, care must be taken to assure quality development by avoiding a disjointed approach to the development of commercial uses. This includes prohibition of strip commercial development resulting from piecemeal growth, the control of setback, curb cuts, signs and landscaping.

The Plan proposes commercial uses at the northwest corner of 22 Mile Road (Sand Lake Exit) and Whitefish Road. One of these developments already exists. Also the Plan proposes a commercial designation at the southwest corner of Cannonsville Road exit of the Freeway to allow for the continued development. Commercial uses also exist in the Village of Pierson for the use of Township residents.

Institutional Development

Institutional uses are shown on the Plan only sparingly, but include the large Tri-County Area School District complex on the north side of Kendaville Road adjacent to US-131 on the east side of the Freeway and the Montcalm Community College extension in the Panhandle Community Center on Federal Road south of Lake Montcalm; the land allocated for the drain fields for the force main sanitary sewer system for Big Whitefish Lake; and the small land area devoted for the Pierson Township Hall and the adjacent cemetery.

Industrial Development

Current industrial uses include the sanitary landfill just south of Cannonsville Road adjacent to US-131. The Plan proposes eventual elimination of that use back to agriculture. In addition there are 110 acres designated Industrial on Amy School Road.

Sewer and water facilities are desirable for the development of industrial uses within the Township. Since any significant infrastructure development appears to be a long way off, the Plan does not include industrial development at this time.

Beginning with the establishment of a 104-acre renaissance zone in the northern end of the Township, opportunities for Commercial, Institutional and Industrial development have increased within the Township. As the Community Center has been opened in the renaissance zone, the Grain Mill is finished, Commercial, Institutional and Industrial development in other areas of the Township, as well as the renaissance zone becomes more attractive.

Recreation Uses

Recreation development has been sparse in the Township but includes fishing, boating, swimming, hunting and birding primarily in the lake areas through public access areas. Other public access recreation facilities include the Tri-County High School facility on Kendaville Road, The Whitefish Lake Golf Course and Restaurant, and the large private camp facility located on West County Line Road with access to Little Whitefish Lake.

The Plan proposes the development of a major recreation facility for use by Township residents to be located behind the Township Hall on the north side of Cannonsville Road. Both active and passive uses are proposed such as nature trails, softball, and area for play equipment, tennis, etc. In this regard, the Plan recommends that a Parks and Recreation Plan be developed to assess the specific recreation needs of the Township.

Consideration should be given, also, to the study of the public access areas controlled by the Township to set a uniform operation format to assure that these facilities will not be abused by those who use the facilities.

Transportation

A discussion of the existing transportation facilities in the Township was presented in Chapter V dealing with Community Facilities and Transportation. In that chapter, the Plan discussed the road classifications and traffic volumes on the Township roads.

The low traffic volumes on most roads with the exception of Federal Road and US-131 are another example of the lower population density and other activity in the Township. However, roads do deteriorate and proper maintenance and improvement are important regardless of the volumes on those roads. The difficulty in assessing the road needs in a rural township is the priority rating systems that must be an integral part of Montcalm County Road Commission's annual maintenance and improvement program.

Because Pierson Township is rural, particularly the eastern two-thirds, the Township does not receive substantial road improvement dollars from the County. Montcalm County is rural in character. Therefore, limited funds are available for all townships for road maintenance and improvement programs.

Important transportation recommendations include the following:

- Development of access management standards for the design of driveways along county primary roads, particularly where new commercial development may occur.
- Consideration for corridor planning in the future before land use and associated traffic problems develop. If corridor planning had been utilized in the Cedar Springs commercial area adjacent to the freeway, fewer curb cuts, less traffic conflicts and better arrangement of land uses would have occurred.
- Reconstruct the intersection of Dagget Road and Pierson Road creation a T-intersection to eliminate a traffic hazard.

Finally, the Plan recommends the Township assess the quality of the road maintenance program on the local roads to assure that monies are being expended wisely rather than simply patching a poor road bed to hold over for another year.

Utilities

Water Facilities

As noted in the Existing Conditions section of the Master Plan, water for drinking, lawn and garden uses, agriculture uses, private recreation uses, etc. is provided through wells. Because of the density in the Township, sources of water have not been a problem. However, there are concerns in the Township concerning the future quality of drinking and recreation water facilities as a result of the sanitary landfill. The Plan recommends the continued monitoring of the effluent resulting from the landfill site to provide assurances that the groundwater supplies in the Township will remain of high quality. This potential problem could be disastrous as it would affect the health, safety and general welfare of a portion of the Township residents.

Also, the Plan recommends the continuance of wells as the exclusive use of water in the Township until such time as the groundwater supply is being affected in certain areas or until it appears economically feasible to develop a centralized water treatment and distribution system in the Township for selected areas or extension of the current system in the Village of Sand Lake.

Waste Water Treatment and Collection

Currently, the only sanitary sewer facilities existing in the Township are in the Village of Pierson and the force main system around Big Whitefish and Little Whitefish Lake. However, The Village of Sand Lake at the southern edge of the Township has a sanitary sewer system for its residents. Therefore the potential exists for extension of that facility into the Township for future development in the southern and western portions of the Township. That fact has been recognized in the future land use Plan for Pierson Township.

The Big Whitefish and Little Whitefish Lake sanitary system is not a complete treatment system in that only the liquid wastes are transported from the Lake area to a large septic drain field area to the north of the Lake at which point the effluent drains into the natural drainage system in the Township. Each resident being served by this system is required to pump solid wastes from their septic system (which is a closed system) to complete the disposal process.

If higher density residential as well as commercial uses are to develop in the future, the Plan recommends the investigation of utility extensions from the Village of Sand Lake including current capacities as well as the feasibility of sewer line extensions.

Natural Gas Transmission

DTE Energy currently serves much of the western area with natural gas service. The Township should encourage the development of natural gas access which will provide for a more economical energy source for its residents.

Population Growth/Capacity to Develop

Population growth has increased by 31.2% on the average for each 10 year period since 1960. In addition, seasonal housing as a percent of total housing has increased from 22% in 1980 to 31% in 1990. As mentioned earlier, this accounts for 1,082 residents during the summer months, creating more economic activity, more recreation users in the Township and more traffic.

In the most recent 10-year period 1990-2000, the seasonal housing has decreased to 19% as more Township residents make this their year-round home.

However, the Master Plan for Pierson Township is proposing guidelines and controls through the Zoning Ordinance to assure more orderly and planned commercial areas as well as residential development.

CHAPTER X

IMPLEMENTATION STRATEGIES FOR MASTER PLAN PROPOSALS

Following this page is revised and updated material in Chapter X of 1993 Master Plan.

For convenience of reference to the updated material in this Supplement and the unchanged materials in the 1993 Plan, the page numbers of the revised material in this supplement correspond in most cases to the corresponding page number in the 1993 Plan.

Perhaps the most important section of the Pierson Township Master Plan is a description of the proposals accompanied by important considerations such as priorities, possible zoning changes, capital improvement funding, and finally, identification of those responsible for implementation. (Note: Time Frame identified in this chapter uses the following criteria: Immediate = within two years; Short Term = within five (5) years; Long Term = five (5) to ten (10) years.)

Residential Proposal

Establish Low Density Residential Development As The Primary Residential Density in the Township - The Plan has established that low density residential should be the predominant residential use in the Township.

Priority - High
Time Frame - Immediate
Zoning Ordinance Revisions - Yes
Capital Improvements Funding - No
Responsibility - Planning Commission and Township Board

Waterfront Development

Review and Change as Necessary, Setback Standards from Waterfront Areas, Lot Coverage Sewer Hookup Requirements, Multiple Access to Waterfront Areas for Residential Uses Storage Policies Along Waterfronts, etc. - Waterfront areas in the Township are sensitive areas that require special consideration because of their unique characteristics and due to the limited nature of waterfront lots. The Plan recommends the review and revision, as necessary of the zoning regulations dealing with the use of waterfront lots.

Priority - High
Time Frame - Immediate
Zoning Ordinance Revisions - Yes
Capital Improvements Funding - No
Responsibility - Planning Commission and Township Board

Develop a Management Plan for All Public Lake Access Areas - Concern exists for the abuse of the public access points in the Township. The Plan recommends the development of a management plan for these areas.

Priority - High
Time Frame - Immediate
Zoning Ordinance Revisions - No
Capital Improvements Funding - No
Responsibility - Planning Commission and Township Board

Transportation

Develop Access Management Standards for the Design of Driveways along Transportation Corridors, Particularly Where Commercial Development may Occur - The Plan recommends the development of access management standards to alleviate potential access problems before they develop in the Township.

Priority - High
 Time Frame - Immediate
 Zoning Ordinance Revisions - Yes
 Capital Improvements Funding - No
 Responsibility - Planning Commission and Township Board

Consider Corridor Planning to Prevent Future Traffic and Land Use Problems Occurring Particularly for Existing and Future Commercial Areas - Future pressure for commercial development at the freeway interchanges will occur. To eliminate problems before they develop, the Plan recommends corridor planning.

Priority - Medium
 Time Frame - Short Term
 Zoning Ordinance Revisions - Yes
 Capital Improvements Funding - No
 Responsibility - Planning Commission and Township Board

Study the Feasibility of Straightening Some County Roads in the Township for Greater Efficiency - Some county roads provide circuitous routes, which in many instances, are caused by the construction of US-131. The Plan recommends the study of these routes to determine the feasibility of tying road fragments together more efficiently.

Priority - Low
 Time Frame - Short Term
 Zoning Ordinance Revisions - No
 Capital Improvements Funding - No
 Responsibility - Montcalm County Road Commission, Planning Commission and Township Board

Reconstruct the Intersection of Dagget Road and Pierson Road to Eliminate a Potentially Hazardous Traffic Condition Due to Poor Sight Distance - For some time now, this road intersection has not been improved except for posting stop signs. It is time to reconstruct this intersection by crating a T-intersection.

Priority - High
 Time Frame - Immediate
 Zoning Ordinance Revisions - No
 Capital Improvements Funding - Yes
 Responsibility - Montcalm County Road Commission, Planning Commission and Township Board

Utilities

Continue the Monitoring Program at the Sanitary Landfill to assure Ground Water is not Becoming Contaminated - The landfill is a potential health problem in the Township. The Plan recommends the regular monitoring of the site to identify any potential contaminants.

Priority - High
 Time Frame - Immediate
 Zoning Ordinance Revisions - No
 Capital Improvements Funding - No
 Responsibility - Owner of Landfill/Township/Township Board to follow up

Investigate the Feasibility of Sanitary Sewer Extensions from the Village of Sand Lake to Areas of the Township - The only area of the Township where sanitary sewers might be available is the southern portion adjacent to the Village of Sand Lake. The Plan recommends the investigation of that possibility.

Priority - Medium
 Time Frame - Short Term
 Zoning Ordinance Revisions - No
 Capital Improvements Funding - Yes
 Responsibility - Township Engineer, Planning Commission and Township Board

Encourage/Promote the Extension of Natural Gas Lines into the Township to Provide More Cost-effective Sources of Energy - Natural gas is potential catalyst for new development as well as the convenience for current residents in the Township. The Plan recommends the promotion of natural gas line extensions into the Township.

Priority - High
 Time Frame - Immediate
 Zoning Ordinance Revisions - No
 Capital Improvements Funding - Yes
 Responsibility - Michigan Consolidated Gas Company and the Township Board

Recreation

Develop a Major Recreational Facility Adjacent to the Township Hall to Serve Township Residents - The Township has no recreation facilities other than school and private operations. The Plan recommends the development of a Township park in a central location for the use of all residents.

Priority - High
 Time Frame - Short Term
 Zoning Ordinance Revisions - No
 Capital Improvements Funding - No
 Responsibility - Planning Commission, Township Board Residents for support and promotion

Develop a Parks and Recreation Plan to Determine More Specific Recreation Needs in the Township - Parks and recreation planning is essential to determine the specific recreation needs of the community. In addition, a plan is required to qualify for Land and Water Conservation Funds through the State of Michigan, Department of Natural Resources.

Priority - High
 Time Frame - Immediate
 Zoning Ordinance Revisions - No
 Capital Improvements Funding - No
 Responsibility - Planning Commission and Township Board

Administration

Include the Planning Commission in the Review Process Regarding the Allocation of Monies for Road Improvements - While the Township Board has the ultimate responsibility to allocate funds for road improvements, the Planning Commission should be involved in the review process by recommending improvements to the Township Board.

Priority - High
 Time Frame - Immediate
 Zoning Ordinance Revisions - No
 Capital Improvements Funding - No
 Responsibility - Township Board

Develop a Regular Communications Procedure to Keep Residents as well as the Press Informed Concerning Activities in the Township - The Plan recommends consideration be given to newsletters, press releases, town meetings, publishing minutes of meetings, etc.

Priority - High
 Time Frame - Immediate
 Zoning Ordinance Revisions - No
 Capital Improvements Funding - No
 Responsibility - Township Board

Prepare a Capital Improvements Program - The Plan recommends the initiation of a Capital Improvements Program with annual updating to set aside funds for capital improvements in the Township.

Priority - High
 Time Frame - Immediate
 Zoning Ordinance Revisions - No
 Capital Improvements Funding - No
 Responsibility - Township Board and possibly the Planning Commission

Police and Fire Protection

Assess and Improve Where Needed, a Program for Police and Fire Protection to Assure Efficient Protection in the Township, Including Possible Establishment of a Volunteer Fire Department - Fire protection has been a controversial topic in the Township. The Plan recommends an honest evaluation of all the issues and make a decision which best serves the residents of the Township.

Priority - High
Time Frame - Short Term
Zoning Ordinance Revisions - No
Capital Improvements Funding - Yes
Responsibility - Township Board

Implement a Fire and Police Protection Information Program for Residents Through General Information - The Plan recommends the initiation of a general information program in the Township that will inform the residents of these two services: number to call for emergencies, things to do to prevent theft, fire and accidents, etc.

Priority - High
Time Frame - Immediate
Zoning Ordinance Revisions - No
Capital Improvements Funding - No
Responsibility - Township Board

