

CHAPTER SIX: LAND USE

An evaluation of land use is critical to community planning. Planning for future use of land, when done in an objective and thoughtful manner, can help communities balance the competing forces of preservation and development. Resource preservation and environmental protection issues are integral to the deliberative process.

Land values in rural areas are usually lower than more populated areas. Generally, lower taxes are reflected in lower land values creating an attraction for families and businesses who are considering relocation. When considered with quality-of-life issues, families may elect to forego municipal services, cultural amenities, and short commuting times for lower taxes with “country living” where more open space exists, the pace of life less frenetic, and fear of criminal activity diminished. Adjusting to a living environment in which services are fewer, are likely more distant, and perhaps more expensive may be difficult for persons accustomed to living in an urbanized area. Technology permits telecommuting and other work arrangements that further mitigate the inconveniences associated with rural living.

Lifestyles are important to consider in assessing land use patterns. Families are smaller, mobility has never been greater, and the population is getting older. Housing preferences have shifted to larger homes on larger land parcels. And, workers do not seem hesitant to commute long distances.

The general historic land use pattern that emerged in Burt Township is similar to many other communities across the Upper Peninsula. Commercial fishing and lumbering were the two major economic forces which gave rise to the community of Grand Marais and the Township. Burt Township's location on Lake Superior and the ability to provide a harbor of refuge were significant in the early settlement of the community.

Forest is the primary land use in Burt Township, with forests covering about 83 percent of the land area. Agricultural and urban uses represent very small proportions of Burt Township, and are generally concentrated in the area around Grand Marais.

The broad categories of land use described in this section are based on the Michigan Resource Information System (MIRIS), which utilized 1978 aerial photography. The inventory mapped land uses as small as two or three acres, and is generally considered to be very reliable; however, the data was compiled using standard manual interpretation techniques, and was not field checked. Changes in land use since 1978 are not reflected in the inventory.

Table 6-1 illustrates the various land uses for Burt Township, according to MIRIS. A brief description of each land use/land cover category follows, and the land uses are graphically depicted on Map 6-1, which accompanies this plan.

Table 6-1 Land Use and Land Cover, Burt Township and Alger County				
	Burt Township		Alger County	
	Acres	Percent	Acres	Percent
Urban and Built Up	755.2	0.5	4,944.6	0.8
Single family	508.6	0.3		
Institutional	3.0	0.0		
Industrial	66.1	<0.1		
Air Transportation	110.0	0.1		
Water Transportation	6.1	0.0		
Open Pit Extractive	42.9	<0.1		
Outdoor Recreation	16.4	<0.1		
Cemeteries	2.1	0.0		
Agriculture	111.5	0.1	17,792.6	3.0
Cropland	94.9	0.1		
Orchard	16.6	<0.1		
Nonforested/Open	8,773.9	5.7	22,277.2	3.7
Herbaceous	609.0	0.4		
Shrub	8,164.9	5.3		
Forest	127,560.6	83.5	505,164.3	84.2
Upland Hardwood	84,818.1	55.5		
Aspen, Birch	12,815.8	8.4		
Lowland Hardwood	1,593.2	1.0		
Pine	15,636.3	10.2		
Other Upland Conifer	1,371.2	0.9		
Lowland Conifer	11,326.0	7.4		
Water	5,185.8	3.4	13,264.9	2.2
Lake	5,185.8	3.4		
Wetlands	8,134.2	5.3	34,305.3	5.7
Forested	3,235.4	2.1		
Shrub	4,308.7	2.8		
Emergent	590.0	0.4		
Barren	2,242.6	1.5	2,438.9	<0.1
Beach, River Bank	391.3	0.3		
Sand Dune	1,851.3	1.2		
Total	152,753.7	100.0	600,187.6	100.0

Source: Michigan Resource Information System

Burt Township covers approximately 239 square miles or 152,754 acres, which is roughly one-quarter of the land area of Alger County.

URBAN LANDS

These are areas of intensive land use in which much of the surface is covered by structures. Included are commercial and residential development, transportation facilities, and power and communication facilities, as well as areas such as mines and quarries, shopping centers, industrial and commercial complexes and institutional land uses.

Slightly less than one-half of one percent of the land area of Burt Township is classified as "urban" according to MIRIS. Specifically, the urban land uses were determined to be 0.49 percent or 755.2 acres. The vast majority of these "urban" land uses are situated in and around the community of Grand Marais, however, some notable exceptions do exist including air transportation which accounts for the airport approximately three miles south of Grand Marais; single-family residences on Nevin and Beaver Lakes; and a few industrial uses (i.e. sawmills) along M-77.

AGRICULTURE LANDS

Agricultural areas are those where the production of food and fiber is the dominant land use. Just over 110 acres of land are devoted to agricultural purposes in Burt Township. Like most of the urban uses, these lands are primarily situated in the vicinity of Grand Marais. The agricultural land uses include small amounts of cropland and orchards, and account for less than 0.1 percent of the total land area of the Township.

NONFORESTED OR OPEN LANDS

Non-forested land (open land, rangeland) is defined as areas supporting early stages of plant succession consisting of plant communities characterized by grasses or shrubs. In cases where there is obvious evidence of seeding, fertilizing or other cultural practices, these areas are mapped as agricultural. Areas dominated by grasses or shrubs, but which occur in marshes, flooded basins or bogs, are mapped under the appropriate wetland category.

Approximately 5.7 percent of the township is classified as non-forested. Although this cover type is scattered throughout the Township, a large amount is concentrated in the vicinity of the airport.

FORESTLAND

Forestlands are lands that are at least 10 percent stocked by forest trees of any size or formerly having such tree cover, and not currently developed for non-forest use.

Forestlands are by far the largest land use/cover in Burt Township, accounting for just over 83 percent of the total area.

WATER BODIES

The water category includes all areas, which are predominately or permanently water covered. This category is divided into streams and waterways, lakes, reservoirs and the Great Lakes. It is probably the easiest category to identify and delineate from the aerial photographs.

Water bodies that are vegetated are placed in the wetland category. Sewage treatment or water supply facilities are a basic part of the urban pattern is identified in the urban areas.

Nearly 5,200 acres of Burt Township is classified as water.

WETLANDS

If water is the easiest area to classify, wetlands are undoubtedly the most difficult. In the MIRIS inventory, wetlands are defined as areas where the water table is at, near or above the land surface for a significant part of most years. The hydrologic regime is such that aquatic or hydrophytic vegetation usually is established. This general category includes marshes, swamps, bogs, potholes, wet meadows and river overflow land and shallow lakes and ponds with emergent vegetation.

Although wetlands exist in most areas of Burt Township, there are more wetlands in the eastern portion than the western half. Wetlands are generally more prevalent away from Lake Superior, although there are some notable exceptions.

BARREN LANDS

Barren land is land of limited ability to support life with little or no vegetation. Land temporarily barren owing to human activities and where it may reasonably be inferred that the land will be returned to its former use is included in one of the other categories. Agricultural land temporarily without vegetation because of tillage practices is still classified as agricultural land. Sites for urban development stripped of cover before construction begins are classified as urban lands. Areas of extraction and industrial land having waste and tailings dumps are placed in the respective extractive and industrial category.

The barren lands in Burt Township include the sand dunes and beach areas and account for 2,242.6 acres or 1.5 percent of the total land area.

FACTORS INFLUENCING LAND USE PATTERNS

A number of factors impact or determine how and when land is utilized. These can basically be broken into three broad categories: physical, legal and economic/location.

The physical characteristics of the land influence, in many instances, how it will be used. These characteristics are weighed against economic and location factors in many cases, and when the demand for certain types of property becomes high enough, it may be feasible to attempt to overcome physical constraints. There are many instances where land which would ordinarily be considered too steep, too sandy, too rocky or otherwise unsuitable for development has been developed because of its location, for example.

Examples of physical factors which influence land utilization include soil types with poor drainage or high water tables, which are unsuitable for private septic systems; soils with low productivity for agriculture crops, which limit agricultural use; or steep slopes which may limit construction or logging activities. Existing adjacent land use, the proximity of services such as sewer or water, and the existing transportation system are other physical factors which influence land use.

Legal factors which influence land utilization include zoning and other land use restrictions, and land ownership. Zoning places specific restrictions on the types of uses that are allowed on a parcel of land, and the conditions under which development may take place. Laws at both the state and federal level regulate development in wetlands, floodplains, areas of historic or archeological significance, etc., particularly when state or federal funds are used in the development. In Burt Township, for example, the Michigan Department of Natural Resources regulates development in dune areas, and the presence of piping plover nesting and foraging areas near Grand Marais limits certain types and seasons of use in and near those areas.

Ownership also impacts how a parcel of land will be utilized. Zoning and other laws aside, the private owner of a parcel of property will determine how and when a parcel will be utilized. In the case of public ownership however, there may be limitations and/or restrictions as to how the land can be utilized depending on which governmental agency owns the property.

Location has a significant influence on the demand for certain types of development, such as residential or recreational development along a lakeshore, commercial establishments on a busy highway, or industrial sites near concentrations of natural resources. Economic factors, such as the demand for a natural resource (lumber, iron ore, etc.), rising or falling personal income, increased vacation and leisure time, increasing numbers of retired people, and housing demand also influence land use.

There are of course other factors which ultimately influence land use patterns, but legal, physical and economic/location considerations are key determinants in most cases.

LAND OWNERSHIP

Significant portions of Burt Township are in public ownership, including the Pictured Rocks National Lakeshore and the Lake Superior State Forest. Heartwood Forestland Fund IV is also a large landowner in the Township.

Over 19,000 of Burt Township's 152,754 acres are owned by the National Park Service. There are also lands of other ownership found within the buffer zone of the Pictured Rocks National Lakeshore. Land use within the Lakeshore will be in accordance with the Park Service's stated objective of managing for "the perpetuation and protection of the natural environment and the preservation of cultural features while making them available for appropriate public use." (Pictured Rocks National Lakeshore General Management Plan, Sept., 1981).

Legislation authorizing establishment of the Lakeshore stipulated that the area be made up of two management zones. Portions of both zones are located within Burt Township. The shoreline zone was to be acquired by the Park Service, while the inland buffer zone would remain largely in state and private ownership. Timber harvest is permitted within the buffer zone, although the legislation authorizes the Park Service to use eminent domain to acquire lands in order to halt uses that could be detrimental to lands within the shoreline zone.

In 1985 the Park Service completed a plan which clarified permissible uses in the inland buffer zone, and identified lands which the National Park Service was interested in acquiring if available. The National Park Service has acquired 402.6 acres of inland buffer zone land in Burt Township as of December 31, 1992. The Park Service worked with Burt Township and other local units of government to enact zoning for privately-owned lands within the inland buffer zone.

Much of the remainder of the township is located within the boundaries of the Lake Superior State Forest, including over 29,000 acres of land owned by the State of Michigan. The primary land uses in this area are forest production and outdoor recreation.

CONTAMINATED SOILS

As of February 2011, there were no sites in Burt Township listed on the Michigan Department of Environmental Quality (MDEQ) Part 201 Site Listing. A Part 201 Listed site is a location that has been evaluated and scored by the MDEQ using the Part 201 scoring model. The location is or includes a "facility" as defined by Part 201, where there has been a release of a hazardous substance(s) in excess of the Part 201 residential criteria, and/or where corrective actions have not been completed under Part 201 to meet the applicable cleanup criteria for unrestricted residential use. There are also no sites in Burt Township listed on the Part 213, Leaking Underground Storage Tanks site list.

ISSUES AND OPPORTUNITIES

- Current consumer preferences for spacious residential land parcels and recreational acreage will likely continue with a corresponding increase in market values. Lengthy workplace commuting times are acceptable in today's lifestyles.
- Specially designated lands such as wetland areas are strictly regulated by the state of Michigan. The appropriate regulatory authority must grant approval before these areas can be legally disturbed and/or developed.
- Burt Township is particularly unique; a large portion of the Township's land area is part of the Picture Rocks National Lakeshore and managed by the National Park Service.
- There is limited participation in agriculture and manufacturing in the Township. The forest products industry remains strong.
- Private land ownership in Burt Township is somewhat limited, due to lack of land availability and land currently held in private ownership is often difficult to obtain due to unwilling sellers.