SURFACE WATER RESOURCES OF JACKSON COUNTY

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SURFACE WATER RESOURCES OF JACKSON COUNTY

by

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Lake and Stream Classification Project

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Wisconsin Crop and Livestock Reporting Service

Wisconsin Department of Natural Resources Bulletins, Communications and Files

INTRODUCTION

Wisconsin's population in 1960 was 3,950,000 people. According to an estimate, it could be as high as 6,100,000 by 1980. Besides a growing population, there is prospect of more leisure time. It is expected that the trend toward shorter workweeks and longer vacations will continue. Much of the new leisure time is spent in swimming, motorboating, water-skiing, fishing, hunting, skin diving, and other related water sports and activities. The expansion of these activities, in addition to growing agricultural, industrial and domestic demands on water, creates use conflicts. Often one interest may control water to the exclusion of others. To assure that the resource is equitably utilized, a method of apportioning use of water must be found or developed.

In 1959, the State Legislature requested the Conservation Department now Department of Natural Resources to develop a program for classification of lakes by use and in 1961 this responsibility was enlarged to include streams. Before an actual classification system can be devised, it is necessary to first prepare a water resources inventory consisting of basic data such as number, size, physical and chemical characteristics of lakes and streams as well as present and potential uses of our water resources. Inventories are being prepared on a county by county basis. Collection of data for this summary of the surface water resources of Jackson County was completed in November, 1967.

This inventory is intended to provide a summary of the quality, quantity, character and an assessment of use of the surface waters (lakes and streams) of Jackson County. Use potential will be described and methods of protection discussed. The inventory will have served its purpose if it can be used as a guide in planning for the wise use and sound management of the waters.

Data for this inventory came from a number of origins. The principal sources were aerial photographs, U.S.G.S. maps, files of the Division of Conservation and field investigations.

The maps reproduced in this publication were not intended for legal and regulatory use. They should, therefore, not be considered or used as factual or final authority because of natural or man-made changes which may have occurred.

SETTING OF THE SURFACE WATER

Early Settlement

Prior to 1850, Jackson County was a part of Crawford County and then for about three years it was included in the area of La Crosse County. Through legislative action in 1853, it became a separate county and took the name of Jackson after the prominent American, Andrew Jackson.

A French fur trader by the name of Rolette reportedly left Prairie du Chien in 1818 and traveled to the "falls" on the Black River. He established a sawmill on Town Creek which was burned by Indians about a year later. They also drove off Rolette.

The demand for lumber attracted lumbermen to the Black River Falls area in 1839 to take advantage of the large pinery located on the sand plain area of eastern Jackson County and timber cutting started in earnest. Logging continued to be the chief industry until 1889 when agriculture took the lead; however, the first farm crop was planted in 1840 by Robert Douglas, a Scotch immigrant who located a farm in the present village of Melrose. During the early farming days, forest fires were common and little effort was made to control them. In fact, early settlers even started fires to burn off the trees and brush as a means to clear land and to improve grazing. From 1900 to 1920 when agriculture reached its high point in the eastern part of the county, many of the marshes were drained.

Poor markets, unseasonable frosts, and drought brought disaster to eastern Jackson County farmers in the 1930's and as many of the landowners could no longer pay their taxes, the county took tax title on much of the land.

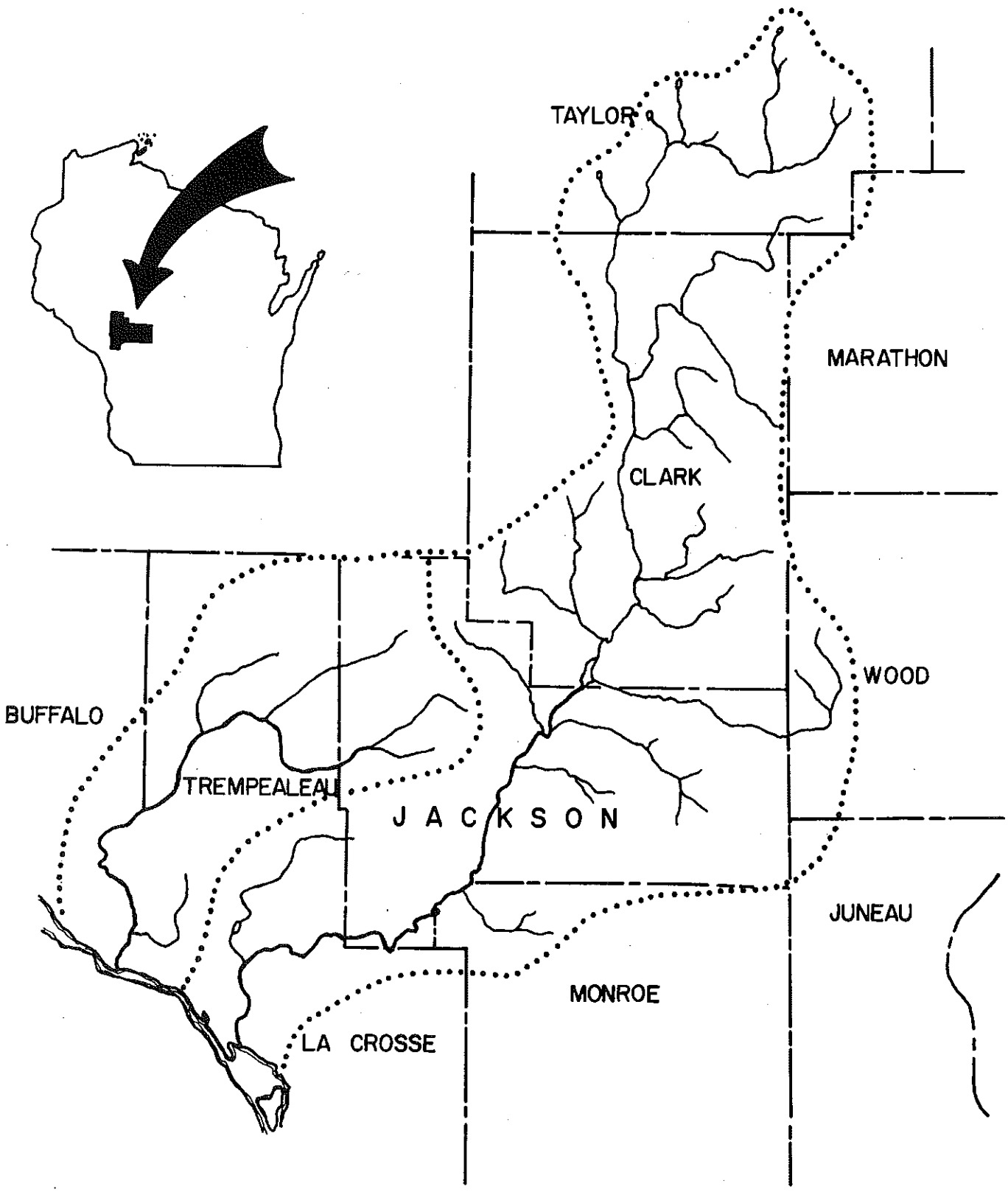
The federal government gave aid to the area by buying land and resettling the farmers. In addition, it started wildlife and forestry development work on what is now the state forest. Old fields on both the federal and county lands were planted to trees by C.C.C. and W.P.A. crews. They also constructed several flowages for wildlife and as sources of water in the event of fires. Wildlife food patches were also established.

Geography

Located in the west central part of the state, Jackson County lies primarily in the Black River watershed. Other drainage systems within the county include the Chippewa, Buffalo (Beef), Trempealeau, and Wisconsin Rivers.

The county lies within two geographical provinces with the Black River for the most part forming the boundary between the Central Plain to the east and the Western Upland to the west.

Fig. 1. Location of Jackson County within the state and within major drainages.



West of the Black River the land is characterized by relatively high sandstone ridges and wide valleys giving it the "coulee" look. The eastern half of the county is a comparatively level, sandy alluvial plain with occasional sandstone hills that are a conspicuous feature. Saddle Mound, which arises 400 feet above the surrounding plain, is an example. Much of the area within this sandy plain is low and poorly drained and includes extensive wet and marsh areas composed largely of peat. The marsh area in the east and southeast parts of the county is a part of the Great Swamp of Central Wisconsin. It is the largest swamp in the state and is 38 percent the size of the state of Rhode Island (Martin, 1932).

The altitudes within the county range from less than 800 feet along the Black River to more than 1,200 feet in the sandstone uplands. The broad, sandy, bottom plain in the eastern half of the county is mostly between 950- and 1,200 feet above sea level with Saddle Mound rising to a height of 1,400 feet (Martin, 1932).

Geology

Pre-Cambrian granite underlies the entire county and is exposed along the Black River, especially in the area from Black River Falls upstream and in the vicinity of City Point on the east fork of the Black River. Upper Cambrian sandstone overlies the granite and in the eastern part of the county there is the sandy alluvial formation, a relatively low area in which wetland and swamps are located. This surface alluvial deposit is also found in the Black River valley downstream from Black River Falls and in other valleys of the county (Weidman and Schultz, 1915). Jackson County has not had the pitted outwash or moraine landscape that results in creation of many natural lakes. Figure 2 shows the glacial geology of Jackson and surrounding counties and 2a shows bedrock geology. Some iron deposits are located east of Black River Falls. Waters in the county tend to be low in minerals because of the nature of the rock formations; these rocks are not very soluble.

Soils

Sands, sandy loams, and grayish-brown unglaciated silt loams are the three major soil types found. Figure 3 is a soils map for the county. Boone fine sand, Newton sand, Plainfield sands, and peat predominate in the eastern half of the county with the exception of the area in the northern tier of political townships. These sandy soils are loose and open with high pore spaces and high specific yields of water. Their good infiltration and percolation qualities provide circumstances for springs and good base flows of streams; however, in areas of shallow soil depths and weak gradients, there are high groundwater levels and the development of much wetland. In the northern tier of political townships of the county, sandy loams are dominant and some peat is present. Vesper fine sandy loam dominates in the eastern half of the county while Boone fine sandy loam, Vesper sandy loam and some Boone loam appear dominant in the west half of the county. In the undrained depressions and flat areas, the poorly drained Vesper soils are present while the Boone soils are found on the hilly areas. They are very sandy, usually shallow, very droughty, and easily eroded.

Fig. 2. Glacial geology of Jackson and surrounding counties.
Source: Wis. Geol. and Nat. Hist. Surv.

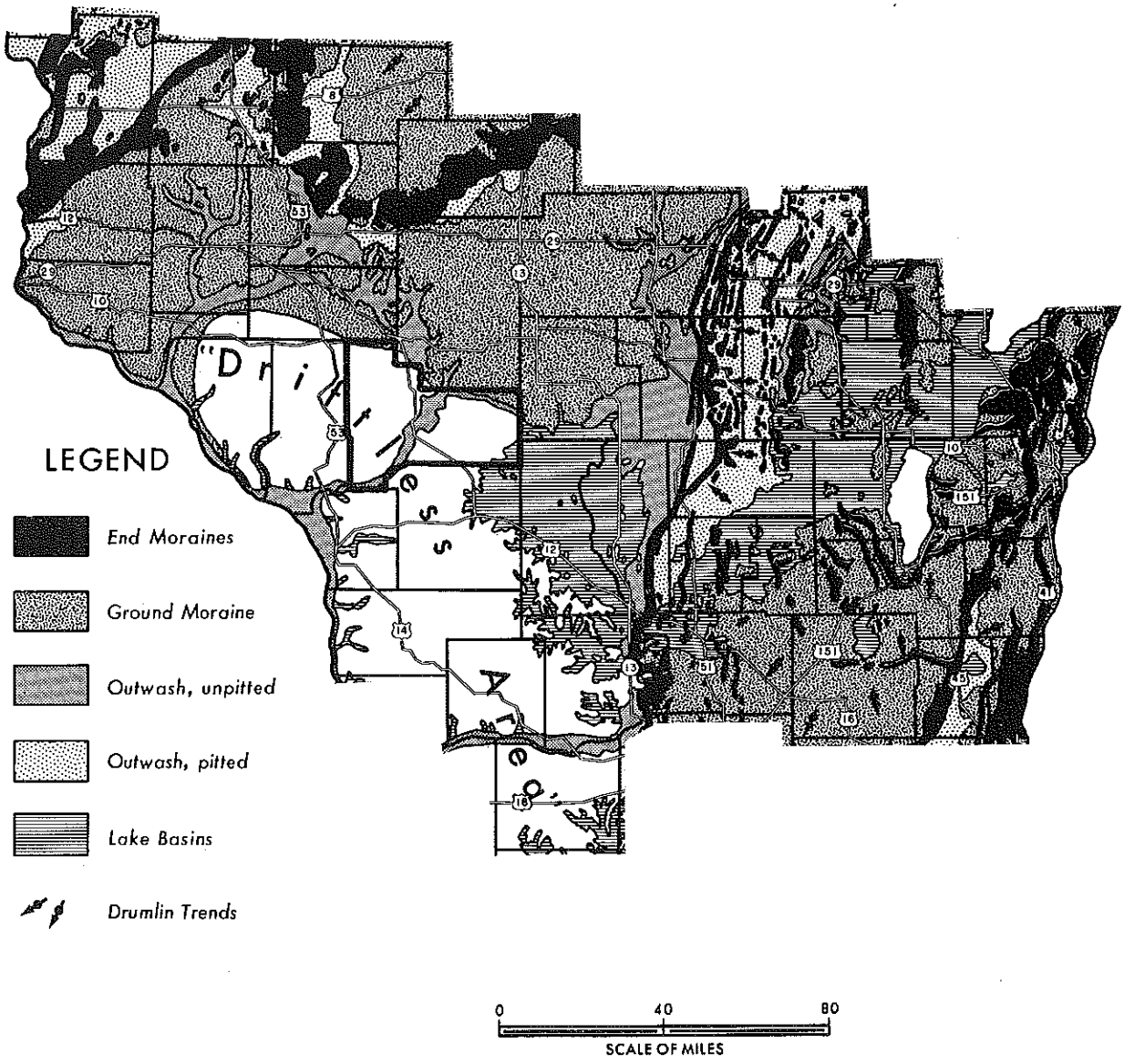


Fig. 2a. Bedrock geology of Jackson County and surrounding counties. Source: Wis. Geol. and Nat. Hist. Surv.

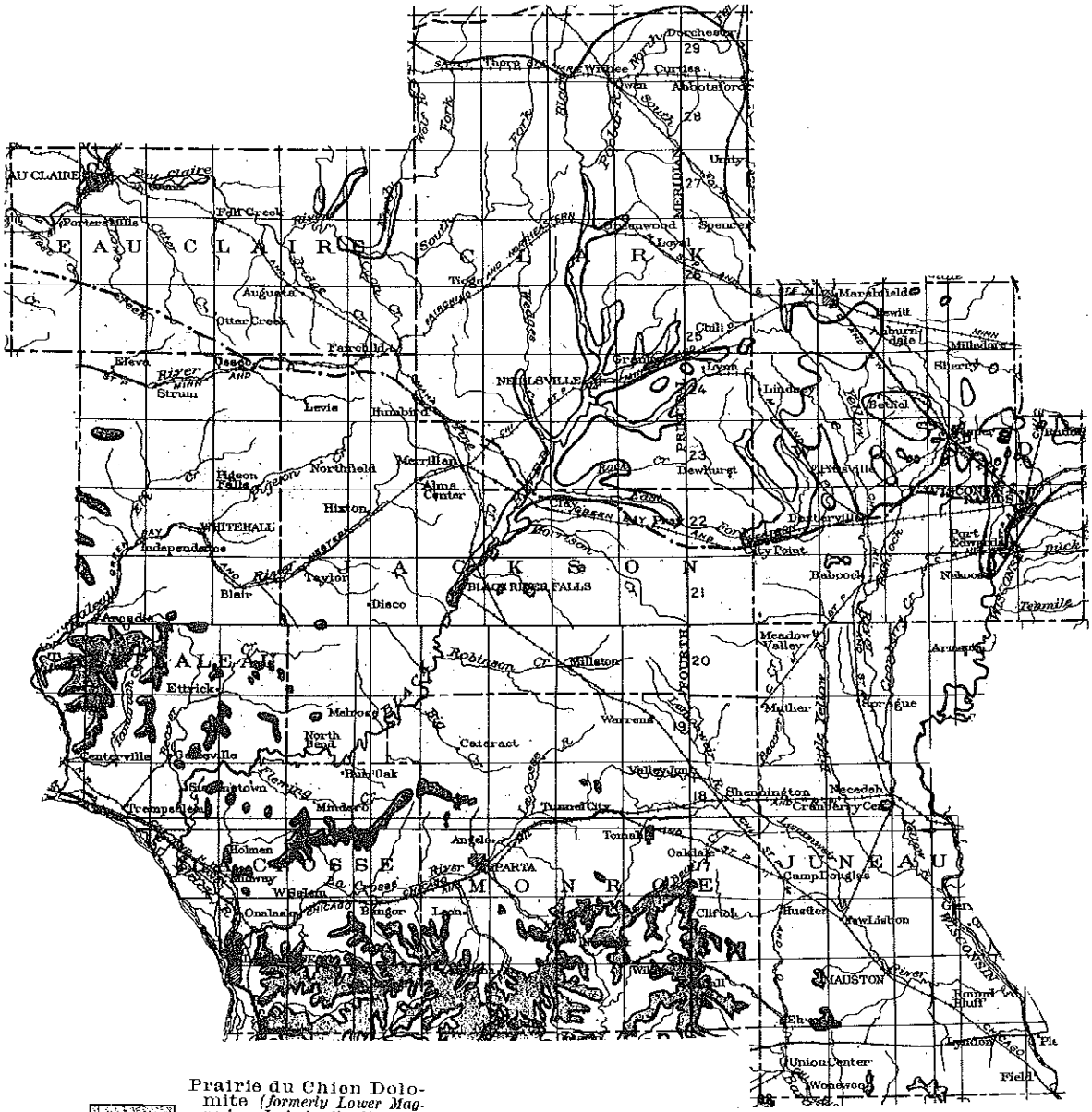


Fig. 3. Soils map of Jackson County. Source: Wis. Geol. and Nat. Hist. Surv.

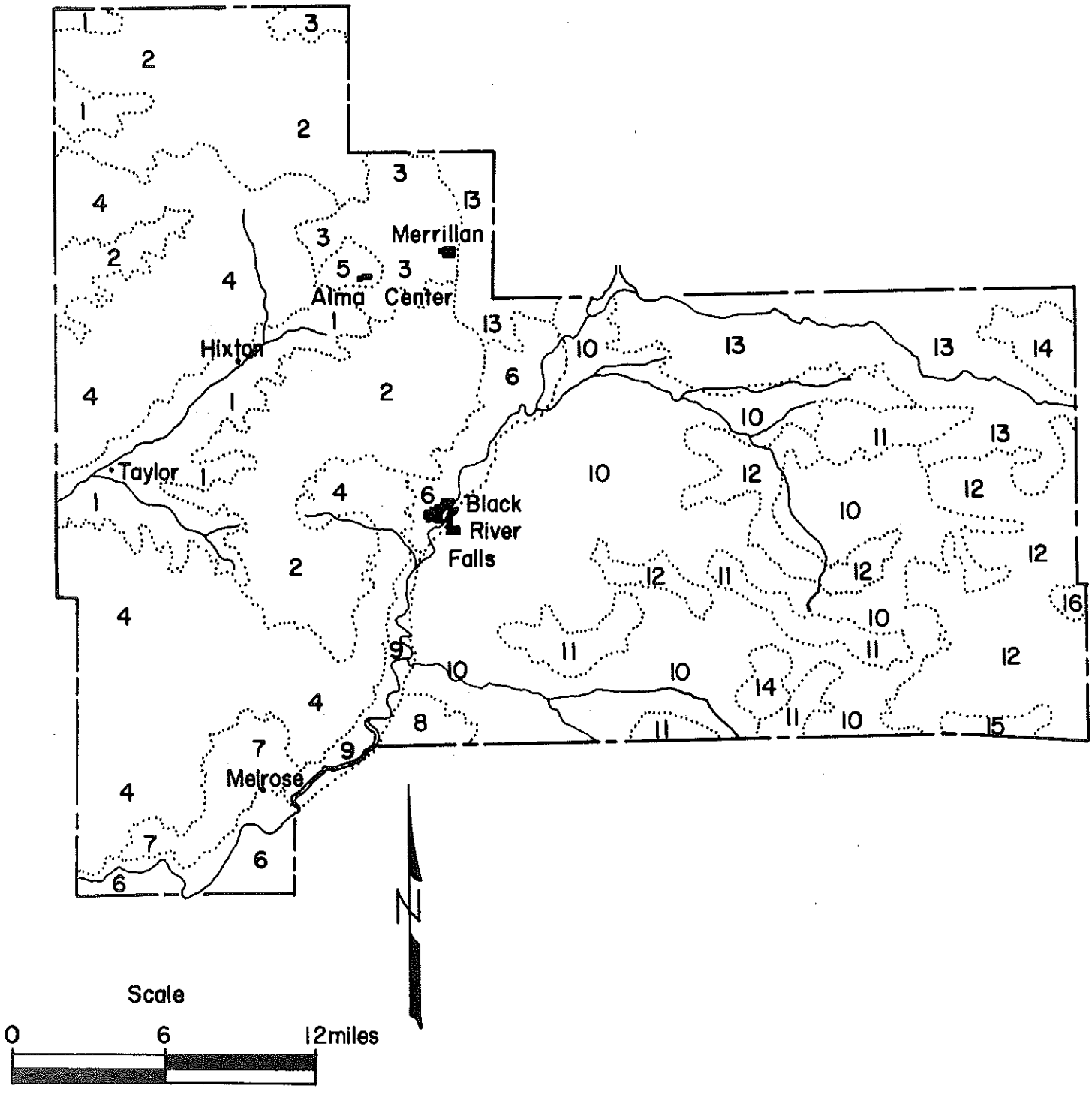


Fig. 3 Key. Soils Map of Jackson County.

Map Symbol	Soil Association	Topography	Soil Parent Material	Classification
1	Meridian loams; Plainfield and Sparta loamy sand and sand; and Shiffer loams	Nearly level and gently undulating soils of stream terraces and long narrow outwash plains (Relief 5'-50'/mi.; slopes 0%-6%, mostly 1%-3%)	Non-calcareous sandy and moderately sandy materials	Alfisols, Mollisols and Entisols (Gray-Brown Podzolics, Brunizems and Regosols)
2	Norden, Hixton, and Northfield loams; and Boone sand	Hilly, rolling and steep soils on dissected sandstone uplands (Relief 50'-300'/mi.; slopes 1%-40%, mostly 4%-30%)	Glauconitic and non-glauconitic sandstone and siltstone with local coverings of loess	Alfisols and Entisols (Gray-Brown Podzolics and Regosols)
3	Merrillan loamy sand; Boone sand; Northfield loams; Elm Lake loamy sand; Arland loams	Gently rolling and rolling soils on sandstone uplands (Relief 10'-200'/mi.; slopes 1%-25%, mostly 2%-25%)	Siltstone and sandstone with local coverings of glacial drift and loess	Spodosols, Entisols, Inceptisols and Alfisols (Podzols, Regosols, Humic Gleys and Gray-Brown Podzolics)
4	Norden, Gale and Fayette silt loam; Hixton loams	Hilly, rolling and steep soils on dissected sandstone uplands (Relief 50'-300'/mi.; slopes 1%-40%, mostly 4%-30%)	Loess, silty colluvium, and loamy deposits over sandstone with some limestone	Alfisols (Gray-Brown Podzolics)
5	Richwood, Toddville, and Bertrand silt loam	Nearly level to sloping soils on stream terraces (Relief 25'-100'/mi.; slopes 9%-20%; mostly 1%-10%)	Silty material over sandy material	Mollisols and Alfisols (Prairie, Gray-Brown Podzolic)
6	Plainfield, Sparta, and Gotham loamy sand and sand	Nearly level and gently undulating soils of stream terraces and long narrow outwash plains (Relief 5'-50'/ mi.; slopes 0%-6%, mostly 1%-3%)	Non-calcareous sandy materials	Entisols, Mollisols and Alfisols (Regosols, Brunizems and intergrades from these to Gray-Brown Podzolics)
7	Gale, Norden and Fayette silt loam	Hilly, rolling and steep soils on dissected sandstone uplands (Relief 50'-300'/mi.; slopes 1%-40%, mostly 4%-30%)	Loess and silty colluvium over sandstone with some limestone	Alfisols (Gray-Brown Podzolics)
8	Hixton and Northfield loams; Gale silt loam; Boone sand	Same as above	Glauconitic and non-glauconitic sandstone and siltstone with local coverings of loess	Alfisols and Entisols (Gray-Brown Podzolics and Regosols)
9	Wet alluvial soils, undifferentiated	Soils of nearly level bottoms, with local cut (Relief 9'-50'/mi.; slope 0%-3%, mostly 0%-1%)	Alluvium	Inceptisols, Entisols and Histosols (Alluvial soils and Humic Gleys and Bog soils)

Fig. 3 Key. Soils Map of Jackson County.

Map Symbol	Soil Association	Topography	Soil Parent Material	Classification
10	Boone and Plainfield sand, Au Gres and Nekoosa loamy sand; and peat soils	Nearly level and undulating soils of plains with included hilly and steep outliers (Relief 15'-150'/mi.; slopes 0%-40%; mostly 1%-4%)	Sandy materials over sandy outwash and sandstone	Entisols, Spodosols and Histosols (Regosols, Podzols and Bog soils)
11	Boone sand; Northfield loams	Hilly, rolling and steep sails on dissected sandstone uplands (Relief 50'-300'/mi.; slopes 1%-40%, mostly 4%-30%)	Sandy and loamy material over sandstone, with local coverings of loess	Entisols and Alfisols (Regosols and Gray-Brown Podzolics)
12	Acid sedge peat and muck soils; Au Gres, Newton and Morocco sand and loamy sand	Wet organic soils of nearly level plains; (Relief 0'-15'/mi.; slopes 0%-6%, mostly 0%-1%)	Vegetation of wetlands over acid sandy and loamy glacial drift	Histosols, Spodosols and Entisols (Bog soils, Podzols, Humic Gleys and Regosols)
13	Merrillan, Elm Lake and Humbird loamy sands	Nearly level and undulating soils on sandstone plains (Relief 2'-50'/mi.; slopes 0%-5%, mostly 1%-3%)	Siltstone and Sandstone	Spodosols and Inceptisols (Podzols and Humic Gleys)
14	Newton, Plainfield and Morocco sand and loamy sand; and shallow peat soils	Wet mineral soils of nearly level plains; (Relief 0'-50'/mi.; slopes 0%-5%, mostly 0%-3%)	Acid glacial outwash and organic materials	Mollisols, Entisols and Histosols (Humic Gleys, Regosals and Bog soils)
15	Sparta, Plainfield and Gotham loamy sand and sand	Nearly level and gently undulating soils of stream terraces and long narrow outwash plains (Relief 5'-50' / mi.; slopes 0%-6%; mostly 1%-3%)	Non-calcareous sandy materials	Mollisols, Alfisols and Entisols (Brunizems and inter-grades from Regosols to Gray-Brown Podzolics and Brunizems)
16	Plainfield, Nekoosa and Newton loamy sand and sand	Nearly level and undulating soils and broad outwash plains (Relief 5'-50'/mi.; slopes 0%-6%, mostly 1%-3%)	Non-calcareous sandy materials	Entisols and Inceptisols (Regosols and Humic Gleys)

Grayish-brown unglaciated silt loams predominate in the western half of the county and consist of the Gale, Norden, Fayette, valley phase soil association which overlies the sandstone bedrock. Drainage is generally good though wet silty soils, subject to frequent flooding, are common along narrow valleys surrounded by steep hills as percolation through these heavier soils is poorer than through lighter soils.

Climate

Climatological data for the Jackson County area is shown in Table 1. The county has an average annual precipitation of about 31 inches with the majority of it occurring during the growing season. The average annual runoff amounts to about 10.35 inches as recorded at Galesville, Trempealeau County. The runoff during high and low water years for the Black River near Galesville is shown in Table 1. The discharge and runoff data for the Black River is probably modified by upstream storage and low flow releases.

The average growing season, defined as in number of days following the last 32-degree freeze in the spring to the first in the fall, is probably about 129 days with a shorter period likely in the marsh areas. Summer frosts are not uncommon in the cranberry marshes. Figure 4 shows the mean annual precipitation recorded at weather stations in the vicinity of Jackson County and Figure 4a compares the mean annual length of the growing season in Jackson County with those of other counties in the state. Freeze-up of shallow lakes normally has occurred by late November and ice cover remains until late March or early April.

Water

Information from Weidman and Schultz (1915) indicates that wells are likely shallow, generally 18 to 47 feet deep. The water-bearing horizons are mainly alluvium and weathered sandstone. Recharge of the ground water in the eastern part of the county is by direct precipitation. In the western part, the mantle material over the sandstone is generally thin and is not important as a water source. Recharge to the sandstone aquifer is by precipitation and may be through several aquifers (Drescher, 1956).

The Division of Conservation's 1958 Springhead and Spring Pond Survey, using the springs located on the land cover maps as a basis for its investigation, found 160 active springs having measurable flows ranging from 2 to 60 gallons per minute and an average flow of about 13 gallons per minute. Of the 160 springs, 92 had flows of 10 gallons per minute or more. Air temperatures during the winter investigation ranged from 2° below zero to 54° above zero.

Table 1. Mean Climatological data for Jackson County area for period 1930-1959*.

Station	Mean Annual Precipitation (Inches)	60-65 Percent Annual Precipitation (months, inclusive)	Precipitation Dec. through Feb. (Inches) Dec.	Jan.	Feb.	Length of Growing Season (Days)	Average Date of 32-Degree Freeze Last	First
Blair	31.11	May - Sept.	0.99	1.20	1.05	128	May 19	Sept. 24
Eau Claire	30.20	May - Sept.	1.03	0.96	1.03	151	May 5	Oct. 4
Hatfield	30.03	May - Sept.	0.94	0.90	0.78	116	May 23	Sept. 17
La Crosse**	28.96	May - Sept.	1.22	1.22	1.15	164	April 29	Oct. 10
Marshfield	31.33	May - Sept.	1.06	1.17	1.06	133	May 17	Sept. 27
Mondovi	29.16	May - Sept.	1.00	0.96	0.85	134	May 17	Sept. 28
Neillsville	30.79	May - Sept.	1.02	1.01	0.98	138	May 14	Sept. 28
Sparta	28.04	May - Sept.	0.97	0.88	0.86	139	May 11	Sept. 27
Viroqua	31.71	May - Sept.	1.09	1.10	1.25	152	May 6	Oct. 5

Black River near Galesville***

	Oct.	Nov.	Dec.	Jan.	Feb.	Mar.	Apr.	May	June	July	Aug.	Sept.	Mean or Total
Discharge (c.f.s.)													
High Water, 1942	4,045	3,074	1,136	707	634	4,139	2,244	4,281	7,762	2,336	775	4,189	2,948
Low Water, 1957	378	408	425	362	376	1,528	1,315	1,361	1,203	927	391	361	755
Runoff (inches)													
High Water, 1942	2.20	1.62	0.62	0.38	0.31	2.25	1.18	2.33	4.08	1.27	0.42	2.21	18.87
Low Water, 1957	0.21	0.21	0.23	0.20	0.18	0.83	0.69	0.74	0.63	0.50	0.21	0.19	4.82

* Data taken from Wisconsin Climatological Data, 1961, Wisconsin Crop Reporting Service

** Precipitation shown are normal values which are based on the period 1921-1950 and are means adjusted to represent observations taken at the present standard location.

*** Data from Geological Survey water-Supply Papers 1308 and 1728. Using 1942 as an example, the water year runs from Oct., 1941 through Sept., 1942.

Fig. 4. Mean annual precipitation recorded at weather stations in the vicinity of Jackson County. Source: Wis. Crop Reporting Service (1961).

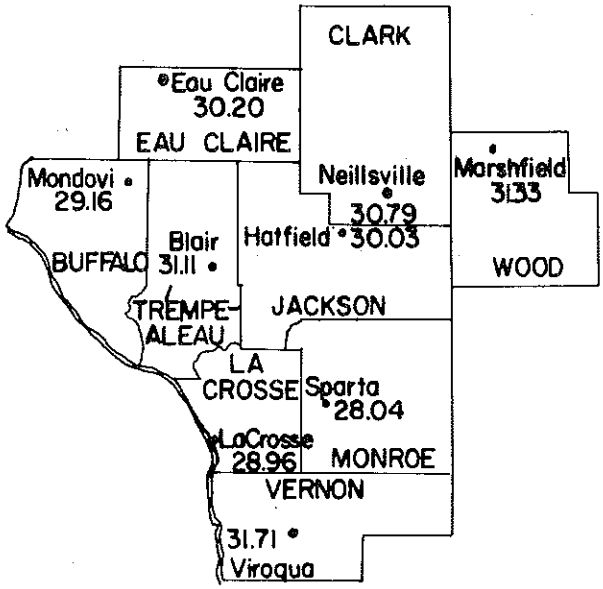
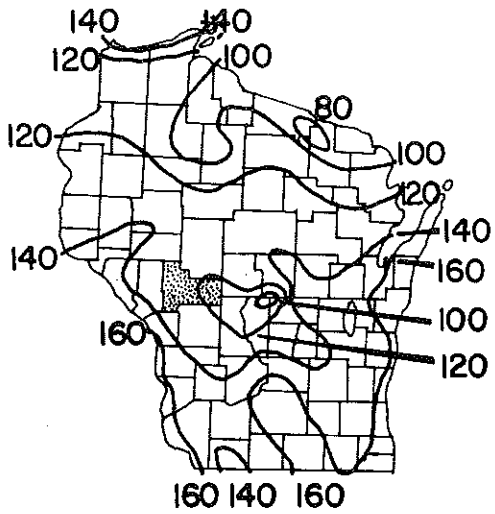


Fig. 4a. The location of Jackson County within growing season isolines. Numbers and isolines represent the number of days between the last freeze and the first in the fall. Source: NRCSA (1964).



Land Use

Land use is illustrated in an inventory of the forest resources of Jackson County (Wis. Cons. Dept., 1955). Of the total land area, 52 percent is classed as commercial forest, 4 percent as noncommercial forest, and 44 percent as nonforest land. Hardwood types (oak, scrub oak, and aspen) cover 61.7 percent of the commercial forest land, while 28.7 percent is softwoods (jack pine, white pine, red pine, black spruce, and tamarack), and 9.6 percent is grass and brush. Oak is the largest single type, constituting 30.3 percent of the forest area. Jack pine, aspen and scrub oak make up the larger portion of the balance. Of the commercial forest land, the public (federal, state and county) owns 43.7 percent, farmers 33.7 percent, large private owners 3 percent, and small private owners 18.6 percent.

The noncommercial forest area is comprised mainly of stagnant aspen stands. Of the nonforest land, 76 percent is in farms, 18 percent is marsh, 1 percent is devoted to recreation, industrial and residential areas, 4 percent to right-of-way, and less than 1 percent to rock outcrops and sand dunes.

Since about 1920, dairying and dairy products have been the most important source of farm income, but other livestock products are important. The county ranks first in the state's strawberry production and third in its cranberry production. Wood and wood products and sphagnum moss provide incomes for many families. With such a high proportion of land in forest land watershed conditions can be described as very favorable for clean, stable water supplies.

According to Marshall, Serie and Titus (1964), the land in farms declined from 316,699 acres, or 49.5 percent of the land area, in 1954 to 304,355 acres, 47.6 percent of the land area, in 1959--a decline of 1.9 percent in five years. During the same period, the number of farms in Jackson County declined from 1,740 to 1,457; however, the average size of farms increased from 177.2 to 208.9 acres.

Mineral production is limited to sand and gravel at this time; however, low-grade iron ore production is expected shortly. Sand and gravel extraction is not of such a dimension that it affects surface waters. What affect iron ore production will have is unknown at this time.

ALPHABETICAL LISTING AND DESCRIPTION OF ALL LAKES AND STREAMS

Lakes and impoundments have been defined for inventory purposes. Lakes are all waters navigable, meandered, or public that are wet nine out of ten years. Impoundments are those bodies of water which owe one-half or more of their maximum depth to an artificial impounding structure.

Each named lake and impoundment is listed in alphabetical order. Unnamed lakes and impoundments are listed in alphabetical order according to political township. A numbering system has been devised for unnamed lakes based on township, range, section and sixteenth section, etc., in which they are located. The system is described on the resource maps.

Data included in the description of each lake and impoundment are location, area, degree of irregularity (S.D.F.) and known maximum depth. The latter is the maximum depth found during investigations and it may vary with water levels or small deeps may have been missed. Characteristics of the waters presented include color, hardness, and transparency. The term "clear" refers to the turbidity of the water. Among resources, significant fish species present are listed and waterfowl and furbearer use is noted where known. Circumstances contributing to use of the waters are presented in terms of the degree of public access and amount of public development. If problems affecting the use of these waters are encountered, they are cited. A more detailed description of the named lakes and impoundments is provided than for the unnamed ones that follow them. The description of unnamed lakes and impoundments is presented in tabular form for quick reference. All of these waters are located on the resource maps. Physical and chemical data for all lakes and impoundments are provided in Appendix I and IA.

Many of the lakes and flowages within the Black River State Forest are managed by the State for waterfowl. While there is considerable nesting, most of the waterfowl are found on these waters during their spring and fall migrations. Several of the waters are periodically drawn down during the growing season and planted to waterfowl foods. These areas are then flooded in the fall to provide resting areas and food for migrating birds.

Streams referred to in this inventory are natural waters that have permanent or continuous flow. No ditches are included. Named streams are listed in alphabetical order. Unnamed streams are listed in alphabetical order according to the political township in which they are located. The numbering system devised for unnamed lakes is also used for unnamed streams.

All streams are described by the location of their confluence with another stream or flowage, or by the point they exit the county, by surface acres, length, and gradient where it is known. The general direction of flow, basic fishery, amount of bank cover, and impoundments, if any, are given. Public access, including road crossings and public lands bordering

streams, is noted. The description of unnamed streams is less detailed than for named streams and is presented in tabular form. The description of each stream in this report is based on only that part of the stream having continuous flow during the investigation. The physical and chemical characteristics of all streams are given in Appendix II. Most of the descriptive terms are defined in Appendix III.

Lake and stream names used in this report are those found on U.S.G.S. quadrangle maps. Where a local name for a particular water differs from that on the quadrangle maps, the local name is given in parenthesis following the official name. For a water that has a local name, but none is shown on the quadrangle map, the water is considered unnamed and is given a number, but the local name follows in parenthesis.

Named Lakes

Battle Point Flowage T21N, R2W, Section 10
Surface Acres = 26.8, S.D.F. = 1.79, Maximum Depth = 7.0 feet

A very soft water drainage impoundment located in the Black River State Forest. Its maximum depth is controlled by stoplogs. The water has a medium brown color, is acid, and has a low transparency. Largemouth bass and black bullhead comprise the fishery. There is public access from a state trail and there is a picnic area. Winterkill is a problem and it is necessary to restock bass following severe winters. Bufflehead ducks (divers) use this flowage during migration.

Black Duck Flowage T21N, R2W, Section 13
Surface Acres = 16.9, S.D.F. = 4.00, Maximum Depth = 7.5 feet

A very soft water drainage impoundment located within the Black River State Forest. Water levels are controlled by two stoplog structures. The water has a light brown color, is acid, and has a low transparency. It is managed for waterfowl and there is wilderness public access. Though it is not managed for fish, black bullhead are likely inhabitants. Winterkill conditions are likely. Mallard and wood duck nest at the flowage and puddle ducks, coot and Canada geese use it while migrating.

Black River Flowage T21N, R4W, Section 15
Surface Acres = 111.0, S.D.F. = 4.38, Maximum Depth = 35.0 feet

A soft water drainage impoundment located on the Black River at Black River Falls. The dam is owned by the city and is used for the creation of electric power. The water has a light brown color, is alkaline and has a low transparency. Muskellunge, northern pike, largemouth bass, smallmouth bass, walleye, channel catfish, bluegill, pumpkinseed, crappie, rock bass, perch, and bullhead comprise the sport fishery. Access is possible from a boat launching site having a small parking area near the dam and from the Black River. Carp are present but do not present a problem. Additional access with boat launching facilities and parking is desirable. There are 41 dwellings on the flowage. Beaver are present. Mallard and wood duck nest at the flowage and puddle and diving duck species use it while migrating.

Douglas Pond T19N, R5W, Section 9
Surface Acres = 16.3, S.D.F. = 1.65, Maximum Depth = 7.0 feet

This soft water drainage impoundment is clear, alkaline and has a low transparency. It is located on Douglas Creek within the Village of Melrose. The dam has a 3½ foot head and is owned by the village. Largemouth bass, crappie, bluegill, and bullhead comprise the fishery. Access is possible from the stream and from road rights-of-way. Teal and wood duck nest at the flowage as well as migrating puddle ducks.

Dry Land Flowage T22N, R3W, Section 25
Surface Acres = 4.1, S.D.F. = 3.31, Maximum Depth = 5.0 feet

This is a drained lake having very soft water. It is acid and the water has a light brown color and a low transparency. It is located within the Black River State Forest and has unimproved access. The lake is managed for waterfowl and it is subject to winterkill conditions. Bullhead may be present. The water control structure is an emergency spillway. During dry weather periods, this flowage has very little water area. Nesting waterfowl include mallard and teal and puddle ducks make use of the flowage during migration.

Funmaker Flowage T22N, R3W, Section 36
Surface Acres = 8.5, S.D.F. = 1.72, Maximum Depth = 3.0 feet

A drained impoundment located within the Black River State Forest. It has very soft, light brown colored water, a low transparency, and a neutral pH. It is managed for waterfowl. Bullhead are reported to be present. The lake is subject to winterkill conditions. It has an unimproved access. During dry weather periods, there is very little water area. The water control structure is an emergency spillway. Mallard and teal nest at the flowage and it receives relatively light use by migrating puddle ducks.

Goodyear Lake T20N, R1E, Section 8
Surface Acres = 5.5, S.D.F. = 1.52, Maximum Depth = 0.5 feet

A very soft water drainage impoundment located on a drainage ditch system. The water control structure is inoperative. In reality, this area more resembles a shallow marsh than a lake. The entire area has a medium density of sedge growth. It has very acid, light brown colored water. No fish are known to be present. Mallard and other dabbler ducks may be observed. The water is subject to winterkill conditions. There is no public access.

Horse Shoe Lake T19N, R5W, Section 1
Surface Acres = 29.3, S.D.F. = 2.38, Maximum Depth = 3.5 feet

This is a very soft water seepage lake. During high water periods, the Black River backs up into the lake area. The water has a medium brown color, a low transparency, and it is alkaline. Because of its water exchange with the Black River, it has many of the fish species found in the river. Largemouth bass, northern pike, crappie, bluegill, bullhead, and carp are the usual inhabitants. The lake is subject to winterkill. There is no public access. Black and wood ducks nest at the flowage and light use of it is made by migrating puddle ducks.

Lee Lake T20N, R2W, Section 29
Surface Acres = 34.4, S.D.F. = 2.34, Maximum Depth = 14.0 feet

A very soft water drainage impoundment located on Wyman Creek at Millston. Its water level is controlled by an overflow. The water is alkaline, light brown colored, and has a low transparency. Brown trout, largemouth bass, pumpkinseed, white crappie, black bullhead, brown bullhead, and white sucker comprise the fishery. The trout are stocked annually. The public has access from County Trunk Highway "O" at the lower end of the flowage and from a roadway near the upper end of the flowage. Boats may be launched from the upper access, but there is no parking except along the roadway. There are four dwellings on the flowage. Light use of the flowage is made by diving ducks.

Little Bear Flowage T21N, R2W, Section 8
Surface Acres = 11.2, S.D.F. = 1.72, Maximum Depth = 5.0 feet

This is a very soft water drainage impoundment located on Dickey Creek within the Black River State Forest. The water control structure is comprised of stoplogs. The water has a medium brown color, is alkaline, and has a low transparency. Bullhead pumpkinseed, and white sucker are present. The flowage is used in waterfowl management. It is subject to winterkill conditions. There is unimproved access. Wood duck nest at the flowage and migrating puddle ducks make light use of it.

Little Thunder Flowage T21N, R2W, Section 3
Surface Acres = 11.3, S.D.F. = 1.15, Maximum Depth = 3.0 feet

This drainage impoundment is located in the Black River State Forest. Water levels are controlled by stoplogs. The water is very soft, alkaline, has a dark brown color, and a low transparency. Bullheads are present. The flowage is managed for waterfowl. Winterkill conditions exist. There is public access with parking and a picnic site. Migrating diving ducks use the flowage.

Mallard Flowage T21N, R2W, Section 23
Surface Acres = 27.4, S.D.F. = 1.50, Maximum Depth = 4.5 feet

A drained impoundment located within the Black River State Forest. The water is very soft, is slightly acid, has a medium brown color, and a low transparency. Stoplogs control the water level. Bullhead are present. Winterkill conditions exist. The lake is managed for waterfowl. There is a wilderness access. Migrating puddle ducks use the flowage.

Oakwood Lake (Upper Merrillan Pond) T23N, R4W, Section 27
Surface Acres = 13.6, S.D.F. = 2.34, Maximum Depth = 14.0 feet

This soft water drainage impoundment has clear (not turbid), alkaline water with a low transparency. It is located on Halls Creek. The dam, once used for power, has a 20 foot height and is owned by the Village of Merrillan. There are 19 dwellings and one motel located on this flowage.

Oakwood Lake (Upper Merrillan Pond) - Cont.

The fishing primarily consists of largemouth bass, green sunfish, pumpkinseed, white crappie and bullhead. A few trout are present, at least seasonally. Access is possible from a road right-of-way and from Oakwood Park. Migrating puddle and diving ducks use the flowage and nesting wood ducks may be observed.

Partridge Crop Flowage T21N, R2W, Section 12
Surface Acres = 16.5, S.D.F. = 2.99, Maximum Depth = 3.5 feet

A very soft water drainage impoundment located on a ditch within the Black River State Forest. It has medium brown colored water, a low transparency and it is slightly alkaline. Bullhead are present. There is a stoplog water control structure. The flowage is managed for waterfowl. Wilderness access is possible from a state trail. Winterkill conditions exist. Muskrat are significant. Teal, mallard, and wood ducks nest at the flowage and it is also used by migrating puddle ducks, divers and Canada geese.

Pigeon Creek Flowage T20N, R2W, Section 16
Surface Acres = 33.5, S.D.F. = 1.60, Maximum Depth = 9.0 feet

This very soft water drainage impoundment is located on Pigeon Creek within the Black River State Forest. The water is alkaline, has a low transparency, and a medium brown color. The water control structure is a combination stoplog-gate valve arrangement. This flowage was formerly managed for brook trout but at present it is being managed for largemouth bass and channel catfish. Bullhead and pumpkinseed are also present. The flowage has a past history of winterkill conditions. There is a multiple use access which includes boat launching, swimming, picnic site, and campground. Mallard and wood duck nesting may be noted and puddle and diving ducks use the flowage while migrating.

Potter Flowage T21N, R1W, Section 17
Surface Acres = 202.8, S.D.F. = 7.46, Maximum Depth = 25.0 feet

A very soft water drainage impoundment having a 22 foot head and located on Morrison, Hawkins, and McKenna Creeks. It is a reservoir used in cranberry culture. The water is acid, has a medium brown color, and a low transparency. The fishery consists of muskellunge, northern pike, largemouth bass, smallmouth bass, black crappie, pumpkinseed, black bullhead, yellow perch, and brown bullhead. It is probably best known for its muskellunge, northern pike and crappie fishing. Smallmouth bass are insignificant. There is public access from the north on the Morrison Creek fork and from the south on the Hawkins Creek fork. An unimproved boat landing is present at the latter access. Beaver are present. Mallard, teal, wood duck and coot nest at the flowage and it receives use by migrating puddle and diving ducks, coot and Canada geese.

Rangeline Flowage T21N, R2W, Section 12
Surface Acres = 10.0, S.D.F. = 1.58, Maximum Depth = 7.0 feet

This very soft water, drainage impoundment is located on Townline Creek within the Black River State Forest. The control structure consists of a stoplog-gate valve combination. The light brown colored water is alkaline and has a low transparency. Pumpkinseed, black bullhead, brown bullhead, black crappie, and yellow perch comprise the fishery. There is public access with a picnic site. Light use of the flowage is made by migrating diving ducks.

Seventeen Flowage T21N, R2W, Section 11
Surface Acres = 177.7, S.D.F. = 4.98, Maximum Depth = 4.0 feet

A very soft water drainage impoundment located on a ditch system within the Black River State Forest. Water levels are controlled by stoplogs. The water is alkaline, has a light brown color and a low transparency. Bullhead are present and winterkill conditions exist. Dabble ducks and Canada geese nest at this flowage. It is used by migrating Canada geese, coot and puddle and diving ducks. There is no public access as the flowage is located within a Department of Natural Resources closed area.

Squaw Mound Flowage T21N, R2W, Section 20
Surface Acres = 13.9, S.D.F. = 1.90, Maximum Depth = 6.5 feet

This very soft water drainage impoundment is alkaline and the water has a medium brown color. It is located on Levis Creek within the Black River State Forest. Stoplogs control the water level. Bullhead are likely inhabitants. The flowage is subject to winterkill conditions. There is public access with parking. Wood duck nest at the flowage. Migrating puddle ducks also use it.

Staffon School Flowage T22N, R2W, Section 32
Surface Acres = 7.0, S.D.F. = 3.50, Maximum Depth = 1.2 feet

A very soft water drainage impoundment located on Hay Creek within the State Forest. The water is acid, has a light brown color and a low transparency. In addition to an emergency spillway, it has two water control structures in which stoplogs are used. Bullhead may be present; however, there are periodic drawdowns for waterfowl management. Winterkill conditions exist. There is public access and parking. Migrating Canada geese and puddle ducks make use of the flowage.

Stevens (Stebbins, Stebbs, Millers) Lake T19N, R5W, Section 20
Surface Acres = 11.6, S.D.F. = 2.10, Maximum Depth = 6.0 feet

This clear, soft water drained lake is alkaline and has a low transparency. During high water periods, the Black River backs up into this lake and there is an exchange of fish and water. The fishery is usually comprised of northern pike, largemouth bass, crappie, bluegill, pumpkinseed, yellow perch, and bullhead. There are two dwellings. There is public access along road rights-of-way without parking. Muskrat are significant. Mallard and wood duck nest at the lake and it also receives use by migrating puddle ducks.

Tanner Flowage T21N, R2W, Section 24
Surface Acres = 16.3, S.D.F. = 1.70, Maximum Depth = 6.5 feet

This is a very soft water drained impoundment located within the State Forest. The water has a low transparency, has a medium brown color, and is acid. The water control structure has stoplogs. Bullhead are present. Winterkill conditions prevail. It is managed for waterfowl. There is unimproved access and a picnic site. This impoundment receives relatively light use by migrating puddle and diving ducks.

Teal Flowage T21N, R3W, Section 1
Surface Acres = 11.2, S.D.F. = 2.77, Maximum Depth = 10.0 feet

A very soft water, light brown colored drainage impoundment located on Dickey Creek within the State Forest. The water is alkaline and has a low transparency. The water level is controlled by stoplogs. Prior to a chemical eradication project in 1967, the fishery was comprised of largemouth bass, bluegill, pumpkinseed, crappie, yellow perch, black bullhead and brown bullhead. It is now being managed for largemouth bass and channel catfish. This is one of the few lakes or impoundments located within the Black River State Forest that has, in general, provided satisfactory fishing over a period of years and which has not had a history of winterkill conditions. There is public access and a picnic site. Beaver are present. Mallard and wood duck nest at the flowage. Migrating puddle ducks also use the water.

Townline Flowage T21N, R2W, Section 4
Surface Acres = 142.5, S.D.F. = 4.19, Maximum Depth = 6.5 feet

This is a very soft water drainage impoundment located on two unnamed streams and Hay Creek within the State Forest. The flowage is managed for waterfowl and there are four pools and five water control structures. Water levels are controlled by stoplogs. The water is alkaline, has a medium brown color, and a low transparency. The basic fishery is bullheads; however, northern pike are frequently creeled and attempts have been made to manage largemouth bass. It has a past history of winterkill conditions. There is public access from S.T.H. 54. Muskrat are significant. Wood duck, mallard and teal nest at the flowage. It is also used by migrating Canada geese and puddle and diving ducks.

Trow Lake (Lower Merrillan Pond) T23N, R4W, Section 26
Surface Acres = 37.1, S.D.F. = 2.63, Maximum Depth = 9.0 feet

This soft water drainage impoundment has clear (not turbid), alkaline water with a low transparency. The dam has a 17 foot height and is located on Halls Creek. It is owned by the Village of Merrillan. The sport fishery consists of largemouth bass, crappie, bluegill, pumpkinseed and perch. Carp are present and chemical eradication of this species has been considered. There is a boat launching site with parking, a park area, and shoreline access around a portion of the flowage. At the time of the survey, there were 18 dwellings. Migrating diving and puddle ducks use the water and nesting wood ducks may be noted.

Weber Flowage T21N, R2W, Section 14
Surface Acres = 18.8, S.D.F. = 1.32, Maximum Depth = 3.5 feet

A very soft water drainage impoundment located on a ditch system within the State Forest. There are two water control structures; each has stoplogs. The water has a low transparency, is alkaline, and has a light brown color. Bullhead are likely inhabitants. It is managed for waterfowl. Winterkill conditions exist. There is an unimproved access. Migrating Canada geese and puddle and diving ducks use the flowage.

Whitetail Flowage T21N, R2W, Section 10
Surface Acres = 93.5, S.D.F. = 1.70, Maximum Depth = 8.0 feet

This very soft water drainage impoundment has light brown colored water and is alkaline. It is located on an unnamed stream (partially ditched) within the State Forest. The water level is controlled by stoplogs. Northern pike, largemouth bass, pumpkinseed, and black bullhead comprise the fishery. The flowage has a past history of winterkill conditions. Beginning in 1968, this flowage will no longer be intensively managed for fish. Rather, the Bureau of Game Management will manage it for waterfowl. There is public access and an unimproved boat launching site with parking. Mallard, teal, wood duck and coot nest at this impoundment. Canada geese and puddle and diving ducks use the water when migrating.

Wildcat Flowage T21N, R2W, Section 28
Surface Acres = 14.1, S.D.F. = 1.22, Maximum Depth = 3.0 feet

The water color is light brown and is slightly acid at this very soft water, artificial seepage lake within the Black River State Forest. It has a low transparency. Bullhead may be present. Winterkill conditions exist. There is wilderness access and a picnic site. Wood duck nest at this water and migrating puddle and diving ducks also make relatively light use of it.

Wilson Marsh Flowage T21N, R2W, Section 9
Surface Acres = 24.3, S.D.F. = 2.76, Maximum Depth = 8.5 feet

A very soft water drained impoundment that has medium brown colored water, is acid, and has a low transparency. Though it is located at the upper end of Dickey Creek within the State Forest, there is generally very little, if any, flow out of this impoundment. Stoplogs control the water level. Bullhead are present. It is subject to winterkill conditions and it is managed for wildlife. There is unimproved access. Beaver are present. Mallard, teal, wood duck and coot may be observed nesting. Migrating Canada geese, coot and puddle and diving duck species also use it.

Wyman Lake T20N, R2W, Section 34
Surface Acres = 6.4, S.D.F. = 1.82, Maximum Depth = 8.0 feet

A clear, very soft water drainage impoundment located on Wymand Creek near Millston. It is alkaline and has a low transparency. The dam has a seven foot head and it is owned by the Wyman Lake Club. It is managed for brook trout by members of the club. Bullhead and pumpkinseed are also present. There are 15 dwellings on the banks. Except for the navigable water access, there is no public access. Beaver are present. Wood duck nest at the flowage. Light use is made of it by migrating puddle ducks.

Unnamed Lakes. The description of each of the following is presented in tabular form for quick reference.

Adams Township, T21, 22N, R3, 4W

T21N, R4W

5-14
Surface Acres - 3.0
S.D.F. - 2.46
Maximum Depth - 16.0 feet
Very soft water, drainage impoundment
Clear, alkaline water with low transparency
Fishery - Rainbow trout
Access - Agreement with State by owner to permit public trespass for fishing
Developments - Three-foot diameter tube as outlet structure
Game - Migrating diving ducks

T22N, R3W

3-9
Surface Acres - 4.4
S.D.F. - 1.87
Maximum Depth - 12.0 feet
Very soft water, artificial seepage lake
Clear, alkaline water with low transparency
Fishery - Largemouth bass, crappie, perch, pumpkinseed, bullhead
Access - None
Developments - 11 dwellings

3-14
Surface Acres - 0.38
S.D.F. - 1.16
Maximum Depth - 5.0 feet
Very soft water, artificial seepage lake
Light brown, alkaline water with low transparency
Fishery - Forage species
Access - None

3-15
Surface Acres - 0.95
S.D.F. - 1.31
Maximum Depth - 9.5 feet
Soft water, artificial seepage lake
Clear, alkaline water with low transparency
Fishery - Forage species
Access - None

8-10
Surface Acres - 3.1
S.D.F. - 1.71
Maximum Depth - 9.0 feet
Very soft water, drainage impoundment
Light brown, alkaline water with low transparency
Fishery - Largemouth bass and bluegill
Access - None
Developments - Height of dam 8 feet, private campgrounds and trailer court, licensed private fish hatchery.

10-6 (Arbutus Canal and backwaters)
Surface Acres - 79.0
S.D.F. - 7.07
Maximum Depth - 19 feet
Soft water, drainage impoundment
Light brown, alkaline water with low transparency
Fishery - Muskellunge, northern pike, largemouth bass, channel catfish, walleye, crappie, bluegill, pumpkinseed, perch, bullhead
Access - Road right-of-way
Developments - Power dam with 10-foot head
Game - wood duck nesting, migrating puddle ducks

Bear Bluff Township, T20, 21N, R1E

T20N

2-15
Surface Acres - 7.6
S.D.F. - 4.53
Maximum Depth - 5 feet
Very soft water, drainage impoundment
Light brown, very acid water with low transparency
Fishery - Bullhead
Access - None
Developments - Height of dam 3 feet
Game - Nesting wood duck and mallard, migrating puddle and diving ducks

3-4
Surface Acres - 8.5
S.D.F. - 4.17
Maximum Depth - 5.5 feet
Very soft water, drainage impoundment
Light brown water, very acid, with low transparency
Fishery - Bullhead
Access - Road right-of-way
Developments - Height of dam 7 feet
Game - Nesting mallard and wood duck, migrating puddle and diving ducks

3-9
Surface Acres - 2.3
S.D.F. - 3.05
Maximum Depth - 5.5 feet
Very soft water, drainage impoundment
Light brown, very acid water with low transparency
Fishery - Bullhead
Access - None
Developments - Height of dam 7 feet
Game - Nesting mallard and wood duck, migrating puddle and diving ducks

3-13
Surface Acres - 21.6
S.D.F. - 2.88
Maximum Depth - 6.0 feet
Very soft water, drainage impoundment
Light brown, very acid water with low transparency
Fishery - Bullhead
Access - Road right-of-way
Developments - Height of dam 9 feet
Game - Nesting wood duck and mallard, migrating diving and puddle ducks

12-7
Surface Acres - 8.7
S.D.F. - 2.21
Maximum Depth - 4.5 feet
Very soft water, drainage impoundment
Light brown water, very acid, with low transparency
Fishery - Bullhead
Access - None
Developments - Height of dam 6 feet
Game - Nesting mallard and wood duck, migrating diving and puddle ducks

13-8
Surface Acres - 109.5
S.D.F. - 3.43
Maximum Depth - 4.0 feet
Very soft water, drainage impoundment
Light brown, very acid water with low transparency
Fishery - Northern pike, bluegill, bullhead
Access - None
Developments - Three dams with one having a height of 5 feet, another 6 feet and the third 6.5 feet
Game - Nesting mallard and wood duck, migrating puddle and diving ducks

13-9
Surface Acres - 11.7
S.D.F. - 1.69
Maximum Depth - 5.5 feet
Very soft water, drainage impoundment
Light brown, alkaline water with low transparency
Fishery - Northern pike, bluegill, bullhead
Access - None
Developments - Dam height of 7 feet
Game - Nesting mallard and wood duck, migrating puddle and diving ducks

13-13
Surface Acres - 25.1
S.D.F. - 1.15
Maximum Depth - 7.0 feet
Very soft water, drainage impoundment
Light brown, slightly acid water with low transparency
Fishery - Northern pike, bluegill, bullhead
Access - From road right-of-way
Developments - Dam height of 6.5 feet
Game - Nesting wood duck and mallard, migrating puddle and diving ducks

13-14
Surface Acres - 35.9
S.D.F. - 1.44
Maximum Depth - 7.0 feet
Very soft water, drained impoundment
Light brown, neutral water with low transparency
Fishery - Northern pike, bluegill, and bullhead
Access - None
Developments - Dam height of 4.5 feet
Game - Nesting mallard and wood duck, migrating diving and puddle ducks

14-6
Surface Acres - 12.2
S.D.F. - 1.31
Maximum Depth - 2.0 feet
Very soft water, seepage lake
Medium brown, acid water with low transparency
Fishery - Winterkill
Access - None
Game - Nesting wood duck, light use by migrating puddle ducks

16-1
Surface Acres - 8.6
S.D.F. - 3.24
Maximum Depth - 4.0 feet
Very soft water, man-made drainage lake
Light brown, acid water with low transparency
Fishery - Northern pike, bullhead
Access - Navigable water via ditch
Game - Wood duck nesting, migrating puddle ducks

16-13
Surface Acres - 21.1
S.D.F. - 4.34
Maximum Depth - 6.0 feet
Very soft water, drainage impoundment
Medium brown, acid water with low transparency
Fishery - Northern pike, bullhead
Access - Navigable water via ditch
Developments - Eight dams with four having a height of 2.5 feet, two having a height of 7.5 feet, and two having a dam height of 7.0 feet
Game - Nesting mallard and teal, migrating diving and puddle ducks

19-11
Surface Acres - 11.8
S.D.F. - 3.54
Maximum Depth - 4.0 feet
Very soft water, man-made drainage lake
Dark brown, slightly acid water with low transparency
Fishery - Bullhead
Access - Road right-of-way
Game - Nesting wood duck, migrating puddle ducks

20-2
Surface Acres - 5.1
S.D.F. - 1.26
Maximum Depth - 4.5 feet
Very soft water, man-made drainage lake
Light brown, very acid water with low transparency
Fishery - Bullhead
Access - Navigable water via ditch
Game - Nesting wood duck, migrating puddle ducks

20-13
Surface Acres - 14.1
S.D.F. - 3.39
Maximum Depth - 4.0 feet
Very soft water, drainage impoundment
Light brown, acid water with low transparency
Fishery - Bullhead
Access - None
Developments - Dam height of 1.5 feet
Game - Nesting wood duck, migrating puddle ducks

21-2
Surface Acres - 2.8
S.D.F. - 2.10
Maximum Depth - 5.5 feet
Very soft water, man-made drainage lake
Medium brown, acid water with a low transparency
Fishery - Bullhead
Access - Navigable water via ditch
Developments - Dam height 6.5 feet
Game - Migrating puddle ducks

21-6
Surface Acres - 4.6
S.D.F. - 1.17
Maximum Depth - 3.0 feet
Very soft water, man-made drainage lake
Light brown, acid water with low transparency
Fishery - Bullhead
Access - None
Developments - One dwelling
Game - Migrating puddle ducks

21-10
Surface Acres - 6.1
S.D.F. - 1.28
Maximum Depth - 5.5 feet
Very soft water, drainage impoundment
Light brown, acid water with low transparency
Fishery - Bullhead
Access - None
Developments - Dam height of 16 feet
Game - Migrating puddle ducks

23-10
Surface Acres - 0.5
S.D.F. - 2.02
Maximum Depth - 6.5 feet
Very soft, man-made drainage lake
Light brown, acid water with low transparency
Fishery - Bullhead
Access - Navigable water via ditch
Game - Wood duck nesting, migrating puddle ducks

24-2
Surface Acres - 6.6
S.D.F. - 1.63
Maximum Depth - 9.0 feet
Very soft water, drained lake
Light brown, alkaline water with low transparency
Fishery - Northern pike, bullhead
Access - None
Game - Nesting mallard and wood duck, migrating puddle ducks

24-6
Surface Acres - 5.7
S.D.F. - 3.29
Maximum Depth - 4.5 feet
Very soft water, drainage impoundment
Light brown, acid water with low transparency
Fishery - Northern pike, bullhead
Access - None
Developments - Two dams with one having a height of 7 feet and the other a height of 4.5 feet
Game - Nesting mallard and wood duck, migrating puddle ducks

25-11
Surface Acres - 0.5
S.D.F. - 2.93
Maximum Depth - 3.5 feet
Very soft water, drained impoundment
Light brown, slightly acid water with low transparency
Fishery - Bullhead
Access - None
Developments - Dam height of 6 feet
Game - Migrating puddle ducks

26-11
Surface Acres - 0.71
S.D.F. - 1.19
Maximum Depth - 5.0 feet
Very soft water, drainage impoundment
Light brown, slightly acid water with low transparency
Fishery - Bullhead
Access - None
Developments - Dam height of 4 feet, two dwellings
Game - Migrating puddle ducks

31-2
Surface Acres - 181.9
S.D.F. - 1.31
Maximum Depth - 5.0 feet (as per landowner
Very soft water, drained impoundment
Light brown, acid water with low transparency
Fishery - Bullhead
Access - None
Game - Nesting mallard and wood duck, migrating diving and puddle ducks

31-5
Surface Acres - 110.02
S.D.F. - 1.13
Fishery - Bullhead
Access - None
Game - Mallard and wood duck nesting, migrating puddle ducks

31-6
Surface Acres - 92.9
S.D.F. - 1.30
Fishery - Bullhead
Access - None
Game - Nesting wood duck, migrating puddle ducks
Note: Owner of land around Lakes 31-2, 31-5, and 31-6 would not permit investigators on waters except to gather water sample from 31-2. Suspect all have similar depths and water chemistries. All are drained impoundments. Information concerning fish species obtained from Conservation Warden.

36-15
Surface Acres - 1.4
S.D.F. - 1.39
Maximum Depth - 1.5 feet
Very soft, drained impoundment
Light brown, alkaline water with low transparency
Fishery - Bullhead
Access - None
Developments - Height of dam 8 feet
Game - Wood duck nesting, migrating puddle ducks

T21N

25-4
Surface Acres - 42.3
S.D.F. - 4.49
Maximum Depth - 6.5 feet
Very soft water, drainage impoundment
Medium brown, slightly acid water with low transparency
Fishery - Bullhead
Access - Road right-of-way
Developments - Three dams with one having a height of 5 feet, another 8 feet, and the third 10 feet
Game - Muskrat significant, nesting mallard & wood ducks, migrating puddle & diving ducks

26-16
Surface Acres - 0.15
S.D.F. - 2.77
Maximum Depth - 3.5 feet
Very soft water, drainage impoundment
Medium brown, acid water with low transparency
Fishery - Bullhead
Access - None
Developments - Dam height of 2.5 feet
Game - Mallard and wood duck nesting, migrating puddle ducks

34-2
Surface Acres - 22.5
S.D.F. - 4.83
Maximum Depth - 7.0 feet
Very soft water, drainage impoundment
Medium brown, acid water with low transparency
Fishery - Bullhead
Access - None
Developments - Two dams with one having a height of 8 feet and the other a height of 6.5 feet
Game - Mallard and wood duck nesting, migrating diving and puddle ducks

34-4
Surface Acres - 0.3
S.D.F. - 1.95
Maximum Depth - 6.0 feet
Very soft water, drainage impoundment
Medium brown, acid water with low transparency
Fishery - Bullhead
Access - None
Developments - Dam height of 9 feet
Game - Wood duck nesting, migrating puddle ducks

35-13
Surface Acres - 30.1
S.D.F. - 2.34
Maximum Depth - 5.5 feet
Very soft water, drainage impoundment
Light brown, very acid water with low transparency
Fishery - Bullhead
Access - None
Developments - Three dams with one having a height of 4 feet, another 7 feet and the third has a height of 8 feet
Game - Wood duck nesting, migrating puddle ducks

35-14
Surface Acres - 27.3
S.D.F. - 3.43
Maximum Depth - 4.0 feet
Very soft water, drainage impoundment
Light brown water, acid, with low transparency
Fishery - Bullhead
Access - Road right-of-way
Developments - Three dams with two having a height of 7 feet and one with a height of 4 feet
Game - Wood duck nesting, migrating puddle and diving ducks

Brockway Township, T21N, R3, 4W

R3W

30-11
Surface Acres - 22.0
S.D.F. - 2.28
Maximum Depth - 5.0 feet
Very soft water, drainage impoundment
Light brown, alkaline water with low transparency
Fishery - Crappie, bullhead
Access - None
Developments - Dam with 4-foot height
Game - Wood duck nesting, migrating puddle ducks, beaver are present

31-3
Surface Acres - 24.9
S.D.F. - 2.12
Maximum Depth - 7.0 feet
Very soft water, drainage impoundment
Clear, alkaline water with a low transparency
Fishery - Crappie, bullhead, trout reported
Access - Navigable water via Perry Creek
Developments - Two dams with one having a height of 8 feet and the other a height of 6 feet
Game - Beaver are present, nesting wood duck and migrating puddle ducks

31-6
Surface Acres - 12.5
S.D.F. - 2.02
Maximum Depth - 7.0 feet
Very soft water, drainage impoundment
Light brown, neutral water with a low transparency
Fishery - Crappie, bullhead
Access - Navigable water via Perry Creek
Developments - Dam with 8-foot height
Game - Beaver present, wood duck nesting, migrating puddle ducks

R4W

25-16
Surface Acres - 0.5
S.D.F. - 1.61
Maximum Depth - 3.0 feet
Very soft water, drainage impoundment
Light brown, slightly acid water with low transparency
Fishery - Crappie, bullhead
Access - None
Developments - Two dams with one having a height of 4 feet and the other a height of 6 feet, one dwelling
Game - Beaver present, wood duck nesting, migrating puddle ducks

City Point Township, T21, 22N, R1E

T21N

1-6
Surface Acres - 3.5
S.D.F. - 1.25
Maximum Depth - 6.5 feet
Very soft water, drainage impoundment
Medium brown, alkaline water with low transparency
Fishery - Bullhead
Access - None
Developments - Two dams with one having a height of 9.5 feet and the other a height of 10.5 feet
Game - Beaver present, nesting wood duck, migrating puddle ducks

2-14
Surface Acres - 48.2
S.D.F. - 2.06
Maximum Depth - 12.0 feet
Very soft water, drainage impoundment
Medium brown, acid water with low transparency
Fishery - Bullhead
Access - Wilderness from county highway
Developments - One dam with height of 22 feet
Game - Beaver present, nesting mallard and wood duck, migrating puddle ducks

7-6
Surface Acres - 5.0
S.D.F. - 1.34
Maximum Depth - 4.0 feet
Very soft water, drained lake
Light brown, acid water with low transparency
Fishery - Bullhead
Access - Wilderness from town road
Game - Beaver present, nesting wood duck, migrating puddle ducks

9-2
Surface Acres - 8.5
S.D.F. - 2.57
Maximum Depth - 6.0 feet
Very soft water, drainage impoundment
Medium brown, acid water with low transparency
Fishery - Bullhead
Access - Wilderness from town road
Developments - Four dams with one having a height of 4 feet, another of 5 feet, one of 5.5 feet and the fourth with a height of 6 feet
Game - Beaver present, nesting wood duck and mallard, migrating puddle ducks

T22N

11-13
Surface Acres - 1.3
S.D.F. - 1.19
Maximum Depth - 1.5 feet
Very soft water, drained lake
Light brown, acid water with low transparency
Fishery - Forage species
Access - None
Developments - one dwelling
Game - Wood duck nesting, migrating puddle ducks

15-13
Surface Acres - 19.0
S.D.F. - 2.53
Maximum Depth - 12.0 feet
Very soft water, drained impoundment
Light brown, alkaline water with low transparency
Fishery - Bullhead
Access - Wilderness from town road
Developments - Dam with 12-foot height
Game - Beaver present, mallard and wood duck nesting, migrating puddle ducks

15-14
Surface Acres - 1.3
S.D.F. - 2.75
Maximum Depth - 7.0 feet
Very soft water, drainage impoundment
Light brown, alkaline water with low transparency
Fishery - Bullhead
Access - Wilderness from town road
Developments - Dam with 10-foot height
Game - Beaver present, mallard and wood duck nesting, migrating puddle ducks

15-15a
Surface Acres - 2.1
S.D.F. - 1.37
Maximum Depth - 7.0 feet
Very soft water, drainage impoundment
Light brown, alkaline water with low transparency
Fishery - Bullhead
Access - Wilderness from town road
Developments - Five dams with each having a height of 6 feet
Game - Beaver present, mallard and wood duck nesting, migrating puddle ducks

15-15b
Surface Acres - 5.6
S.D.F. - 1.32
Maximum Depth - 12.5 feet
Very soft water, drainage lake
Light brown, alkaline water with low transparency
Fishery - Bullhead
Access - Wilderness from town road
Game - Beaver present, mallard and wood duck nesting, migrating puddle ducks

17-1
Surface Acres - 0.5
S.D.F. - 1.31
Maximum Depth - 1.0 foot
Very soft water, man-made seepage lake
Light brown, very acid water with low transparency
Fishery - Winterkill
Access - None
Game - Wood duck nesting, migrating puddle ducks

17-13
Surface Acres - 0.35
S.D.F. - 1.45
Maximum Depth - 2.5 feet
Very soft water, man-made drainage lake
Light brown, very acid water with low transparency
Fishery - Forage species
Access - None
Game - Wood duck nesting, migrating puddle ducks

21-7
Surface Acres - 17.4
S.D.F. - 2.89
Maximum Depth - 9.0 feet
Very soft water, drainage impoundment
Light brown, alkaline water with low transparency
Fishery - Bullhead
Access - None
Developments - Three dams with one having a height of 3.5 feet, another 5.0 feet and the third has a height of 7.5 feet
Game - Wood duck nesting, migrating puddle ducks

22-2
Surface Acres - 5.4
S.D.F. - 1.17
Maximum Depth - 6.0 feet
Very soft water, artificial seepage lake
Light brown, slightly acid water with low transparency
Fishery - Bullhead
Access - None
Game - Wood duck nesting, migrating puddle ducks

31-3
Surface Acres - 3.3
S.D.F. - 1.72
Maximum Depth - 5.5 feet
Very soft water, man-made seepage lake
Clear, alkaline water with low transparency
Fishery - Bullhead, bluegill
Access - Unimproved from town road
Developments - Picnic site

33-10
Surface Acres - 0.83
S.D.F. - 1.40
Maximum Depth - 5.0 feet
Very soft water, man-made seepage lake
Clear, alkaline water with low transparency
Fishery - Forage species
Access - Unimproved from state highway

36-7
Surface Acres - 28.4
S.D.F. - 2.01
Maximum Depth - 3.0 feet
Very soft water, drainage impoundment
Medium brown, slightly acid water with low transparency
Fishery - Bullhead
Access - None
Developments - Three dams with one having a height of 10.0 feet and each of the other two dams having a height of 8.0 feet
Game - Beaver present, nesting mallard, teal and wood duck, migrating puddle and diving duck species

36-11
Surface Acres - 17.3
S.D.F. - 2.04
Maximum Depth - 8.0 feet
Very soft water, drainage impoundment
Medium brown, slightly acid water with low transparency
Fishery - Bullhead
Access - None
Developments - Two dams with each having a height of 12 feet
Game - Beaver present, nesting mallard & wood duck, migrating puddle ducks

Hixton Township, T22N, R5W

30-1
Surface Acres - 1.1
S.D.F. - 1.09
Maximum Depth - 7.0 feet
Very soft water, drainage impoundment
Clear, alkaline water with low transparency
Fishery - Bullhead
Access - Unimproved, but with parking area some distance from water
Developments - Dam with height of 6 feet
Game - Migrating puddle ducks

30-4 (Lowe Creek Pond)
Surface Acres - 4.9
S.D.F. - 1.61
Maximum Depth - 6.0 feet
Very soft water, drainage impoundment
Clear, alkaline water with low transparency
Fishery - Brook trout, bullhead
Access - With parking
Developments - Dam with 6-foot height
Game - Beaver present, nesting teal, mallard and wood duck, migrating puddle ducks

Irving Township, T20N, R4, 5W

R4W

5-9
Surface Acres - 0.19
S.D.F. - 1.64
Maximum Depth - 2.5 feet
Very soft water, seepage lake
Light brown, alkaline water with low transparency
Fishery - Forage species, winterkill
Access - None
Game - Nesting teal, mallard and wood duck, migrating puddle ducks

10-2
Surface Acres - 1.75
S.D.F. - 2.43
Maximum Depth - 12.0 feet
Soft water, drainage impoundment
Clear, alkaline water with low transparency
Fishery - Brown trout, rainbow trout
Access - From Trout Run Creek
Developments - Concrete spillway having a height of 12 feet
Game - Beaver present, nesting wood duck, migrating puddle ducks

11-3
Surface Acres - 0.33
S.D.F. - 1.49
Maximum Depth - 2.5 feet
Medium hard water, drainage impoundment
Clear, alkaline water with low transparency
Fishery - Brown trout
Access - Road right-of-way
Developments - Concrete spillway
Game - Migrating puddle ducks

Knapp Township, T20, 21N, R1W

T20N

2-7
Surface Acres - 4.8
S.D.F. - 1.29
Maximum Depth - 8.5 feet
Very soft water, drainage impoundment
Light brown, very acid water with low transparency
Fishery - Crappie, bullhead
Access - None
Developments - Two dams with one having a height of 13.0 feet and the other a height of 4.5 feet
Game - Mallard and wood duck nesting, migrating puddle ducks

3-14
Surface Acres - 28.6
S.D.F. - 2.08
Maximum Depth - 11.0 feet
Very soft water, drainage impoundment
Light brown, very acid water with low transparency
Fishery - Crappie, bullhead
Access - None
Developments - Two dwellings, three dams with one having a height of 10.0 feet, another 4.5 feet, and the third has a height of 3.5 feet
Game - Mallard and wood duck nesting, migrating puddle and diving duck species

3-15
Surface Acres - 3.1
S.D.F. - 1.22
Maximum Depth - 12.0 feet
Very soft water, drainage impoundment
Light brown, very acid water with low transparency
Fishery - Crappie, bullhead
Access - None
Developments - One dam with height of 12 feet
Game - Mallard and wood duck nesting, migrating puddle ducks

5-1
Surface Acres - 0.4
S.D.F. - 1.81
Maximum Depth - 6.0 feet
Very soft water, drainage impoundment
Light brown, acid water with low transparency
Fishery - Bullhead
Access - None
Development - Dam with height of 6.5 feet
Game - Wood duck nesting, migrating puddle ducks

5-3
Surface Acres - 11.8
S.D.F. - 1.66
Maximum Depth - 7.0 feet
Very soft water, drainage impoundment
Light brown, very acid water with low transparency
Fishery - Bullhead
Access - None
Developments - Dam with height of 5 feet
Game - Nesting wood ducks, migrating puddle ducks

5-4
Surface Acres - 19.1
S.D.F. - 1.63
Maximum Depth - 11.0 feet
Very soft water, drainage impoundment
Light brown, very acid water with low transparency
Fishery - Bullhead
Access - None
Developments - Dam with height of 7.5 feet
Game - Wood duck nesting, migrating puddle ducks

21-1
Surface Acres - 2.1
S.D.F. - 1.86
Maximum Depth - 8.0 feet
Very soft water, drainage impoundment
Light brown, acid water with low transparency
Fishery - Bullhead
Access - Road right-of-way
Developments - Dam with height of 7 feet
Game - Wood duck nesting, migrating puddle ducks

25-1
Surface Acres - 2.6
S.D.F. - 2.04
Maximum Depth - 5.0 feet
Very soft water, drainage impoundment
Medium brown, alkaline water with low transparency
Fishery - Largemouth bass, bluegill, crappie, perch, bullhead
Access - Navigable water via ditch
Developments - Three dams with each having a height of 6.0 feet, one pump for sprinkling system
Game - Mallard and wood duck nesting, migrating puddle and diving duck species

25-6
Surface Acres - 39.8
S.D.F. - 1.14
Maximum Depth - 12.5 feet
Very soft water, drainage impoundment
Light brown, alkaline water with low transparency
Fishery - Largemouth bass, bluegill, crappie, perch, bullhead
Access - Navigable water via ditch
Developments - Three dams with each having a height of 6 feet, one pump for sprinkling system
Game - Mallard and wood duck nesting, migrating puddle and diving duck species

26-6
Surface Acres - 33.3
S.D.F. - 1.48
Maximum Depth - 5.0 feet
Very soft water, drainage impoundment
Light brown, alkaline water with low transparency
Fishery - Largemouth bass, bluegill, crappie, perch, bullhead
Access - Navigable water via ditch
Developments - Dam with 6-foot height
Game - Wood duck nesting, migrating puddle and diving duck species

27-2
Surface Acres - 13.4
S.D.F. - 1.82
Maximum Depth - 9.5 feet
Very soft water, drainage impoundment
Medium brown, alkaline water with low transparency
Fishery - Largemouth bass, crappie, bluegill, perch, bullhead
Access - Navigable water via E. Fk. Lemonweir River
Developments - Dam with 10-foot height
Game - Wood duck nesting, migrating puddle and diving duck species

35-3
Surface Acres - 30.6
S.D.F. - 1.76
Maximum Depth - 11.5 feet
Very soft water, drainage impoundment
Clear, alkaline water with a low transparency
Fishery - Largemouth bass, crappie, bluegill, perch, bullhead
Access - None
Developments - Dam with 7-foot height, sprinkling system
Game - Beaver present, mallard and wood duck nesting, migrating puddle and diving duck species

35-6
Surface Acres - 34.8
S.D.F. - 1.25
Maximum Depth - 4.5 feet
Very soft water, drainage impoundment
Light brown, alkaline water with low transparency
Fishery - Largemouth bass, bluegill, crappie, perch, bullhead
Access - Navigable water via E. Fk. Lemonweir River and road rights-of-way
Developments - Dam with 6-foot height
Game - Beaver present, wood duck nesting, migrating puddle and diving duck species

35-9
Surface Acres - 61.6
S.D.F. - 1.51
Maximum Depth - 10.0 feet
Very soft water, drainage impoundment
Clear, alkaline water, with a low transparency
Fishery - Largemouth bass, crappie, bluegill, perch, bullhead
Access - None
Developments - Two dams with one having a height of 6.0 feet and the other a height of 4.0 feet, one dwelling
Game - Beaver present, wood duck nesting, migrating puddle and diving duck species

36-14
Surface Acres - 170.0
S.D.F. - 2.76
Maximum Depth - 6.5 feet
Very soft water, drainage impoundment
Light brown, alkaline water with a low transparency
Fishery - Largemouth bass, crappie, perch, bluegill, bullhead
Access - Navigable water via E. Fk. Lemonweir River
Developments - Two dams with each having a height of 12 feet
Game - Beaver present, wood duck nesting, migrating puddle and diving duck species

T21N

3-11
Surface Acres - 23.1
S.D.F. - 1.41
Maximum Depth - 16.0 feet
Very soft water, drained impoundment
Light brown, acid water with low transparency
Fishery - Crappie, bullhead
Access - None
Developments - One dam having 14-foot height
Game - Mallard and wood duck nesting, migrating puddle and diving duck species

9-4
Surface Acres - 8.1
S.D.F. - 1.63
Maximum Depth - 10.0 feet
Very soft water, drainage impoundment
Light brown, acid water with low transparency
Fishery - Crappie, bullhead
Access - None
Developments - Three dams with two having a height of 7.0 feet and another having a height of 5.0 feet
Game - Wood duck and mallard nesting, migrating puddle and diving duck species

9-13
Surface Acres - 13.6
S.D.F. - 1.54
Maximum Depth - 7.0 feet
Very soft water, drainage impoundment
Light brown, acid water with low transparency
Fishery - Crappie, bullhead
Access - None
Developments - Dam having 7-foot height, two dwellings
Game - Nesting mallard and wood ducks, migrating puddle and diving duck species

10-6
Surface Acres - 4.9
S.D.F. - 4.20
Maximum Depth - 10.0 feet
Very soft water, drainage impoundment
Light brown, acid water with low transparency
Fishery - Crappie, bullhead
Access - None
Developments - Three dams with one having a height of 8.0 feet, another 10.0 feet, and the third has a height of 12.0 feet
Game - Nesting mallard and wood ducks, migrating diving and puddle duck species

10-7
Surface Acres - 9.3
S.D.F. - 1.47
Maximum Depth - 6.5 feet
Very soft water, drainage impoundment
Light brown, acid water with a low transparency
Fishery - Crappie, bullhead
Access - None
Developments - Dam with 7-foot height
Game - Nesting mallard and wood ducks, migrating puddle and diving duck species

10-10
Surface Acres - 5.2
S.D.F. - 1.36
Maximum Depth - 8.0 feet
Very soft water, drainage impoundment
Light brown, very acid water with low transparency
Fishery - Crappie, bullhead
Access - Wilderness from town road
Developments - Three dams with each having a height of 7 feet
Game - Nesting mallard and wood duck, migrating puddle and diving ducks

16-5
Surface Acres - 5.4
S.D.F. - 2.16
Maximum Depth - 4.5 feet
Very soft water, man-made seepage lake
Medium brown, slightly acid water with low transparency
Fishery - Bullhead
Access - Wilderness from town road
Game - Beaver present, nesting mallard and wood duck, migrating puddle and diving ducks

17-7
Surface Acres - 8.9
S.D.F. - 1.68
Maximum Depth - 5.0 feet
Very soft water, drained impoundment
Light brown, alkaline water with a low transparency
Fishery - Northern pike, crappie, bluegill, perch, bullhead
Access - Road right-of-way
Developments - Dam having height of 8 feet
Game - Beaver present, mallard and wood duck nesting, migrating diving and puddle duck species

18-14
Surface Acres - 17.3
S.D.F. - 1.45
Maximum Depth - 7.0 feet
Very soft water, drainage impoundment
Light brown, alkaline water with low transparency
Fishery - Crappie, bluegill, perch, bullhead
Access - Road right-of-way and navigable ditch
Developments - Two dams with one having a height of 8.0 feet and the other a height of 10.0 feet
Game - Beaver present, nesting mallard and wood duck, migrating puddle and diving ducks

27-10
Surface Acres - 18.3
S.D.F. - 1.79
Maximum Depth - 6.0 feet
Very soft water, drainage impoundment
Light brown, acid water with low transparency
Fishery - Northern pike, large-mouth bass, crappie, bullhead
Access - Navigable ditch
Developments - Three dams with two having a height of 8.0 feet and one having a height of 9.0 feet, one dwelling
Game - Nesting mallard and wood ducks, migrating puddle and diving ducks

27-15
Surface Acres - 11.5
S.D.F. - 2.31
Maximum Depth - 8.0 feet
Very soft water, drainage lake
Light brown, acid water with low transparency
Fishery - Northern pike, largemouth bass, crappie, bullhead
Access - Creek 28-2 and road right-of-way
Game - Nesting mallard and wood ducks, migrating puddle and diving ducks

29-16
Surface Acres - 11.5
S.D.F. - 2.10
Maximum Depth - 6.0 feet
Very soft water, drainage impoundment
Light brown, alkaline water with low transparency
Fishery - Bullhead
Access - None
Developments - Two dams each has a height of 8.0 feet
Game - Nesting wood ducks, migrating puddle ducks

31-6
Surface Acres - 30.3
S.D.F. - 2.02
Maximum Depth - 6.0 feet
Very soft water, drainage impoundment
Medium brown, alkaline water with low transparency
Fishery - Bullhead
Access - Townline Creek and wilderness from town road
Developments - Constructed spillway
Game - Nesting mallard and wood duck, migrating puddle and diving ducks

32-4
Surface Acres - 1.6
S.D.F. - 1.93
Maximum Depth - 12.0 feet
Very soft water, drainage impoundment
Light brown, alkaline water with low transparency
Fishery - Bullhead
Access - None
Developments - Dam having 9-foot height
Game - Nesting wood duck, migrating puddle ducks

32-13
Surface Acres - 14.2
S.D.F. - 2.27
Maximum Depth - 12.0 feet
Very soft water, drainage impoundment
Light brown, slightly acid water with low transparency
Fishery - Bullhead
Access - Wilderness from town road
Developments - Two dams with one having a height of 10.0 feet and the other a height of 8.0 feet
Game - Wood duck nesting, migrating puddle ducks

34-8
Surface Acres - 25.5
S.D.F. - 2.28
Maximum Depth - 12.5 feet
Very soft water, drainage impoundment
Light brown, very acid water with low transparency
Fishery - Northern pike, largemouth bass, perch, crappie, bullhead
Access - Road right-of-way
Developments - Three dams with one having a height of 14 feet, another 11 feet and the third has a height of 8 feet
Game - Nesting mallard and wood duck, migrating diving and puddle ducks

35-6
Surface Acres - 21.5
S.D.F. - 1.93
Maximum Depth - 7.5 feet
Very soft water, drainage impoundment
Light brown, very acid water with low transparency
Fishery - Bluegill, crappie, bullhead
Access - Wilderness from town road
Developments - Dam having 10-foot height
Game - Nesting mallard and wood duck, migrating puddle ducks

Komensky Township, T22N, R2, 3W

R2W

29-8
Surface Acres - 2.6
S.D.F. - 1.99
Maximum Depth - 6.5 feet
Very soft water, drainage impoundment
Light brown, alkaline water with low transparency
Fishery - Northern pike, crappie, bluegill
Access - Wilderness from state trail
Developments - Dam with 6-foot height

R3W

23-3 (Morrison Creek Oxbow Trout Pond)
Surface Acres - 5.5
S.D.F. - 5.59
Maximum Depth - 5.0 feet
Very soft, spring impoundment
Clear, alkaline water with low transparency
Fishery - Rainbow trout, brook trout
Access - With parking
Developments - Drop inlet with approximately 8-foot height
Game - Nesting wood duck, migrating puddle ducks

Manchester Township, T20N, R3, 4W

R3W

30-9
Surface Acres - 0.6
S.D.F. - 1.75
Maximum Depth - 2.5 feet
Very soft water, drainage impoundment
Light brown, alkaline water with low transparency
Fishery - Forage species
Access - Road right-of-way
Developments - Concrete spillway at road crossing with 3.5-foot height, one dwelling
Game - Nesting mallard and wood duck, migrating puddle ducks

R4W

4-8
Surface Acres - 2.7
S.D.F. - 1.52
Maximum Depth - 7.0 feet
Very soft water, spring impoundment
Clear, alkaline water with low transparency
Fishery - Brook trout
Access - None
Developments - Dam with 5-foot height
Game - Nesting wood duck, migrating puddle ducks

Millston Township, T20, 21N, R2W

T20N

22-2
Surface Acres - 8.6
S.D.F. - 1.76
Maximum Depth - 5.5 feet
Very soft water, drainage impoundment
Medium brown, neutral water with a low transparency
Fishery - Crappie, pumpkinseed, bullhead
Access - None
Developments - Dam with 8-foot height
Game - Nesting wood duck, migrating puddle ducks

23-15
Surface Acres - 65.0
S.D.F. - 1.78
Maximum Depth - 13.0 feet
Very soft water, drainage impoundment
Medium brown, slightly acid water with low transparency
Fishery - Largemouth bass, pumpkinseed, bullhead, trout
Access - Wilderness from county highway, navigable water access via Beltz Creek
Developments - Two dams with each having a height of 12 feet
Game - Nesting mallard and wood ducks, migrating puddle ducks

27-1
Surface Acres - 37.6
S.D.F. - 2.13
Maximum Depth - 5.0 feet
Very soft water, drainage impoundment
Light brown, alkaline water with low transparency
Fishery - Largemouth bass, bluegill, bullhead
Access - Navigable water via Beltz Creek, wilderness from county highway
Developments - Four dams with two having a height of 6 feet, one has a height of 8 feet, and another dam has a height of 12 feet
Game - Nesting mallard and wood ducks, migrating puddle and diving ducks

27-3
Surface Acres - 2.4
S.D.F. - 2.53
Maximum Depth - 4.5 feet
Very soft water, drainage impoundment
Medium brown, alkaline water with low transparency
Fishery - Largemouth bass, pumpkinseed, bullhead
Access - Road right-of-way
Developments - Overflow tube, three dwellings
Game - Nesting mallard and wood duck, migrating puddle ducks

27-13
Surface Acres - 10.5
S.D.F. - 2.05
Maximum Depth - 4.5 feet
Very soft water, drainage impoundment
Light brown, alkaline water with low transparency
Fishery - Largemouth bass, pumpkinseed, bullhead
Access - Navigable water via Rudds Creek
Developments - One dam rendered inoperative by fill
Game - Nesting mallard and wood ducks, migrating puddle ducks

T21N

8-4 (Big Bear Flowage)
Surface Acres - 6.9
S.D.F. - 1.24
Maximum Depth - 6.0 feet
Very soft water, drainage impoundment
Medium brown, slightly acid water with low transparency
Fishery - Bullhead
Access - Wilderness from state trail
Developments - One dam with 6-foot height
Game - Nesting mallard, teal and wood ducks, migrating puddle ducks

9-10 (Lower Wilson Flowage)
Surface Acres - 3.6
S.D.F. - 1.36
Maximum Depth - 6.5 feet
Very soft water, drainage impoundment
Light brown, alkaline water with low transparency
Fishery - Bullhead
Access - Wilderness from town road
Developments - Dam with 6-foot height
Game - Nesting mallard, teal, and wood ducks, migrating puddle ducks

13-6
Surface Acres - 1.1
S.D.F. - 1.50
Maximum Depth - 1.7 feet
Very soft water, drained impoundment
Light brown, alkaline water with low transparency
Fishery - Winterkill, forage species
Access - In closed area within Black River State Forest. Closed to vehicular traffic and all hunting except deer
Developments - Dam with 5-foot height
Game - Nesting mallard, teal, and wood duck, migrating puddle ducks
Note: Efforts being made to prevent all trespass except during deer gun season

13-8
Surface Acres - 0.98
S.D.F. - 2.88
Maximum Depth - 2.0 feet
Very soft water, seepage lake
Light brown, alkaline water with low transparency
Fishery - Forage species, winterkill
Access - In closed area within Black River State Forest. See Lake 13-6 for explanation.
Game - Nesting teal, mallard and wood duck, migrating diving and puddle ducks

14-14
Surface Acres - 0.06
S.D.F. - 1.75
Maximum Depth - 1.5 feet
Very soft water, seepage lake
Light brown, alkaline water
Fishery - Forage species, winterkill
Access - In closed area within Black River State Forest. See Lake 13-6 for explanation.

North Bend Township, T19N, R6W

31-14 (Horse Shoe Lake)
Surface Acres - 7.5
S.D.F. - 4.42
Maximum Depth - 3.5 feet
Soft water, seepage lake
Light brown, alkaline water with low transparency
Fishery - Northern pike, largemouth bass, bluegill, pumpkinseed, bullhead
Access - Unimproved from county road. During high water periods, the Black River backs up into this lake area.
Game -Nesting mallard and wood duck, migrating puddle ducks

Named Streams

Allen Creek, T21N, R4W, Section 2
Surface Acres = 2.60, Miles = 3.3, Gradient = 50.9 feet per mile

This soft, clear water stream flows in a southeasterly direction and is a tributary to the Black River. Sand and gravel are the bottom types with the former being dominant. This is a brook trout stream and the entire length is classed as a type one trout stream. Two ponds are located near the headwaters and were formerly licensed as private fish hatchery ponds. The larger one is now being managed by the state and will be open for public trout fishing for the first time in 1968. The winter aerial groundwater survey conducted about five years ago found open water at the upper end and scattered throughout the entire length of the stream. There is one road crossing and access is also possible from the Black River.

Amo Creek, T22N, R5W, Section 12
Surface Acres = 1.09, Miles = 2.0, Gradient = 33.3 feet per mile

A clear, very soft water stream that flows in a westerly direction and is a tributary of that portion of the Trempealeau River locally known as the south branch of the Trempealeau River. Sand is the dominant bottom type followed by silt, like amounts of gravel and detritus, and a little clay hardpan. Although the fishery is primarily forage species, there are a few brook trout present. Portions of the stream have been ditched. Access is possible from two road crossings and from the Trempealeau River. Migrating puddle ducks use the stream.

Beaver Creek (No. Br. Beaver Cr.), T20N, R6W, Section 18
Surface Acres = 5.77, Miles = 5.6, Gradient = 30.4 feet per mile

This is a clear, medium hard water stream that flows in a westerly direction and joins the south branch at Ettrick in Trempealeau County. Sand is the dominant bottom type followed by silt, gravel, clay hardpan, and detritus in that order of abundance. Brook and brown trout inhabit the water and all of it in Jackson County is classed as a type two trout stream. Adjoining wetlands amount to about 63 acres. There are several road crossings and 1.2 miles of public frontage on state-owned wildlife land. Beaver are present. Migrating puddle ducks use the stream.

Beaver Creek, T23N, R6W, Section 29
Surface Acres = 3.30, Miles = 4.5, Gradient = 26.7 feet per mile

A clear, medium hard water stream that flows in a southerly direction and joins Pigeon Creek at York. Sand dominates the bottom types with silt, gravel, detritus, and clay present in that order of abundance. Forage fish species are found in the stream. Bank erosion is severe in areas along the water course. Scattered open water areas were found during the winter aerial groundwater survey conducted about five years ago. There are several road crossings and there is navigable water access from Pigeon Creek. In addition, there is 0.6 mile of public frontage. Beaver are present. Mallards nest along the stream and migrating puddle ducks may be noted.

Beaver Creek, South Branch, T19N, R6W, Section 7
Surface Acres = 1.89, Miles = 3.9, Gradient = 38.7 feet per mile

A clear, hard water stream that flows westward into Trempealeau County. The predominant bottom type is sand followed by gravel, silt, and rubble in that order of abundance. Forage fish species dominate the fishery. There are 80 acres of adjoining wetland. Within the boundary of state-owned wildlife land, there are four miles of public frontage. Access is also possible from three road crossings.

Big Slough Creek, T22N, R6W, Section 6
Surface Acres = 1.1, Miles = 2.5, Gradient = 31.6 feet per mile

This is a light brown colored, soft water stream that flows in a northwesterly direction into Trempealeau County where it joins Pigeon Creek. Sand is the dominant bottom type with gravel, silt, and a few boulders present. Forage fish species dominate the stream. Access is possible from Pigeon Creek and from one road crossing. There are 180 acres of adjoining wetland. Migrating puddle ducks use the stream.

Black River, T19N, R6W, Section 31
Surface Acres = 1,371.5, Miles = 51.2

A soft water stream having light brown colored water that flows in a general southwesterly direction into Trempealeau County. It is the major stream in Jackson County and it is a tributary of the Mississippi River. Sand is the predominant bottom type; however, there are significant amounts of gravel, rubble, boulder, and bedrock. Dominant game fish and panfish species present include muskellunge, northern pike, walleye, largemouth bass, smallmouth bass, channel catfish, rock bass, crappie, bluegill, pumpkinseed, perch, and bullhead. Two power dams having a total height of 112 feet are located within Jackson County. Fourteen dwellings have been built along the river. There are 2,500 acres of adjoining wetland. Boating on the river is common and it is included in the canoe trails of Wisconsin. Sand bars provide overnight campsites and swimming areas. In regard to the latter, the stream has a shifting sand bottom and drop-offs are common. There are 19.1 miles of public frontage. There are boat landings at the mouth of Halls Creek and off S.T.H. 108 south of Melrose. Other access sites are found at the mouth of Perry Creek (Perry Creek Park) and at the mouth of Morrison Creek. South of Black River Falls on S.T.H. 54 there is the Hoffman Wayside which provides a picnic area and a beautiful view of the river. Access is also possible from four road crossings. Beaver are present. Nesting mallard and wood ducks may be observed and migrating puddle and diving ducks and Canada geese usethe stream.

Black River, East Fork, T22N, R2W, Section 6
Surface Acres = 143.6, Miles = 23.7

This medium brown colored, very soft water stream flows in a westerly direction and joins the Black River in Arbutus Lake, Clark County. Sand is by far the most abundant bottom type with some rubble, bedrock, and silt present. Game and panfish present are similar to those found in the Black River. There are 48 acres of adjoining wetland. Boating is possible though it is necessary to drag boats over shallow areas during low-water periods. Access is provided from four road crossings, 17.5 miles of public frontage, and from the state-owned East Fork Recreation Area. This recreation site is located at the lower end of the river where it enters Clark County and it includes a boat landing and campgrounds. Beaver are present and muskrat significant. Mallard and wood duck nesting along stream and migrating puddle ducks use the river.

Black Slough Creek, T20N, R5W, Section 21
Surface Acres = 0.48, Miles = 1.6, Gradient = 33.3 feet per mile

This clear, medium hard water stream flows in a southeasterly direction and is a tributary of Roaring Creek. Clay and silt are the dominant bottom types with very small amounts of detritus and sand present. The fishery consists of forage species although occasional brook trout are reportedly creeled. There are 135 acres of adjoining wetlands. Access is possible from two road crossings.

Brooks Creek, T23N, R6W, Section 14
Surface Acres = 1.4, Miles = 2.0, Gradient = 22.2 feet per mile

A clear, soft water stream that flows in a southerly direction and is a tributary of Pigeon Creek. Silt is the dominant bottom type followed closely by sand with lesser amounts of clay hardpan, detritus, and gravel in that order of abundance. Forage fish species are present. There is navigable water access from Pigeon Creek and from one road crossing. Scattered open water areas were noted downstream from the road crossing during the winter aerial groundwater survey conducted about in 1963.

Buffalo River (No. Fork Beef River), T24N, R6W, Section 6
Surface Acres = 6.25, Miles = 8.6, Gradient = 18.7 feet per mile

A clear, very soft water stream that flows in a westerly direction into Trempealeau County. It is a tributary of the Mississippi River. The bottom is predominantly sand with silt and gravel present in that order of abundance. Brook and brown trout inhabit the stream. The upper three miles is classed as type one trout water and the remainder of the stream in Jackson County is type two. During the winter aerial groundwater survey conducted in 1963, scattered open water areas were observed throughout the entire stream in Jackson County. Access is possible from several road crossings. Mallard, teal, and wood ducks nest along the stream. It is also used by migrating puddle ducks.

Buffalo River, So. Fork (So. Fork Beef River), T24N, R6W, Section 19
Surface Acres = 7.96, Miles = 7.3, Gradient = 16 feet per mile

This clear, very soft water stream flows in a westerly direction and joins the north fork in Trempealeau County. Sand is the basic bottom type though a fair amount of silt is present followed by clay hardpan and gravel in about equal abundance. The entire stream in Jackson County is considered type two trout water. Brook and rainbow trout are present. Scattered open water areas were noted below levees during the winter aerial groundwater survey conducted about in 1963. There are 200 acres of adjoining wetlands. Several road crossings provide access and public frontage amounts to 0.75 mile. Migrating puddle ducks use the stream and nesting teal, mallard, and wood ducks may be observed.

Cisna Creek, T23N, R4W, Section 22
Surface Acres = 1.0, Miles = 2.7, Gradient = 20 feet per mile

This stream is classed as type one trout water inhabited by brook trout. It has light brown colored water and is very soft. It flows in a northerly direction and is a tributary of the South Fork of Halls Creek. The bottom types are sand, silt, gravel, and rubble in that order of abundance. There are nearly 45 acres of adjoining wetlands. Access is possible from four road crossings.

Clear Creek (So. Branch of Robinson Creek), T20N, R3W, Section 29
Surface Acres = 5.38, Miles = 3.7, Gradient = 13.3 feet per mile

This is a very soft water stream having a light brown color. It heads in Monroe County, flows in a northerly direction, and is a tributary of Robinson Creek. Most of the bottom is sand, but some silt is present. All of the stream in Jackson County is classed as type three trout water and brown trout are present. Scattered open water areas were found during the winter aerial groundwater survey conducted about five years ago. There are 1.6 miles of public frontage and one road crossing the stream. There is also navigable water access from Robinson Creek. Four dwellings are located along the stream. Migrating puddle ducks use the stream.

Crawford Creek, T22N, R2W, Section 35
Surface Acres = 1.5, Miles = 3.1

This is a very soft water stream having a medium brown color that flows in a westerly direction and is a tributary of Morrison Creek. Sand is the dominant bottom type with lesser amounts of silt and gravel in that order of abundance. Forage fish species predominate. There are 180 acres of adjoining wetlands. Public frontage along the stream amounts to 4.6 miles. Access is possible from one bridge crossing and from Morrison Creek. Beaver are present. Wood duck nest along the stream as well as migrating puddle ducks.

Curran Creek, T22N, R6W, Section 35
Surface Acres = 2.73, Miles = 4.5, Gradient = 21 feet per mile

A very light brown colored, medium hard water that flows in a southerly direction into the Trempealeau River. The dominant bottom type is sand followed by gravel, clay, and silt in that order of abundance. Forage fish species are present. There is one-half mile of public frontage. Access is possible from the Trempealeau River and from several road crossings. Puddle ducks use the stream while migrating.

Davis Creek, T19N, R6W, Section 36
Surface Acres = 1.36, Miles = 0.75

This is a clear, medium hard water stream that heads in La Crosse County, flows in a northwesterly direction and joins the Black River in Jackson County. Sand is the bottom type with very little silt present. Forage fish species make up the fishery. Access is possible from the Black River and from one road crossing. Migrating puddle ducks use the stream.

Davis Creek, T22N, R3W, Section 3
Surface Acres = 0.36, Miles = 0.5

A very soft, medium brown colored stream heads in Clark County and flows in a southerly direction into a backwater area of the Arbutus Canal near Hatfield. The dominant bottom type is sand; however, there is considerable silt and a little gravel. Forage fish species are present. There are about 15 acres of adjoining wetland. One road crosses the stream. Migrant puddle ducks may be noted.

Dickey Creek, T22N, R3W, Section 29
Surface Acres = 10.59, Miles = 7.6

A very soft, medium brown colored water that flows in a general northwesterly direction and is a tributary of Morrison Creek. The predominant bottom type is sand with gravel, bedrock, and rubble present in that order of abundance. Forage fish species dominate the fishery, but some brook trout are present. There are 19 acres of adjoining wetland. The stream heads at Wilson Marsh Flowage and flows through four more flowages. Often the stream is intermittent between Teal Flowage and the first flowage upstream from it, Little Bear Flowage. The total dam height on the stream is about 28 feet. There are 12.8 miles of public frontage and several road crossings. Beaver are present. Mallard and wood ducks nest along the stream and it is also used by migrating puddle ducks.

Douglas Creek (Shake Hollow Creek), T19N, R5W, Section 9
Surface Acres = 14.9, Miles = 8.2, Gradient = 22.8 feet per mile

This is a clear, medium hard water stream that flows in a general southerly direction into the Black River near Melrose. Locally the stream is known as Shake Hollow Creek. Sand is the dominant bottom type with silt and a little gravel present. That part of the stream above C.T.H. "H" crossing is classed as a type two trout stream. Brook trout are present. There are 85 acres of adjoining wetland. A flowage is located on the stream at Melrose. It has a 34-foot head. Access is possible from four road crossings. Teal nest along the stream and it is also used by migrating puddle ducks.

Fall Coulee Creek (Stony Creek), T22N, R5W, Section 18
Surface Acres = 5.14, Miles = 5.3, Gradient = 35.5 feet per mile

A clear, soft water stream that flows in a southerly direction into the Trempealeau River at Sechlerville. Silt is the dominant bottom type with sand and a little clay present. The entire stream is considered as type two trout water. Brook trout are present. About 150 acres of wetland adjoin the stream. There is 0.15 mile of public frontage and four roads cross the stream. Mallard and wood duck nest along the stream and migrant puddle ducks make use of the water.

French Creek, T21N, R6W, Section 5
Surface Acres = 9.56, Miles = 8.3, Gradient = 11.4 feet per mile

This is a clear, soft water stream that flows in a northwesterly direction and joins the Trempealeau River near Taylor. The dominant bottom type is sand, but there is considerable silt and a little gravel present. The entire stream is considered type two trout water and brook trout are present. A few northern pike inhabit the stream, especially the lower end, at least seasonally. During the winter aerial groundwater survey conducted about in 1963, open water was observed at the upper reaches of the stream and at one location further downstream. There are 126 acres of adjoining wetland. Access is possible from several road crossings. Beaver are present. Teal, mallard and wood duck nesting may be observed and migrant puddle ducks use the stream.

Glen Creek, T20N, R3W, Section 24
Surface Acres = 3.39, Miles = 3.5, Gradient = 20 feet per mile

A dark brown colored, very soft water stream that flows in a southwesterly direction and joins Robinson Creek west of Millston. Sand and silt are the bottom types with the former dominant. Brown trout inhabit the water and the entire stream is classed as type three trout water. There are seven miles of public frontage. Two road crossings provide additional access. Nesting wood duck and migrant puddle ducks make use of this stream.

Halls Creek, T22N, R3W, Section 30
Surface Acres = 56.5, Miles = 22.1, Gradient = 11.3 feet per mile

A light brown colored, very soft water stream that flows in a general southeasterly direction. It is a tributary of the Black River. That part of the stream above the upper flowage at Merrillan is locally known as Stockwell Creek. This portion of the stream has a predominantly sand bottom with silt, gravel, bedrock, rubble, clay and detritus also present in that order of abundance. The bottom types in the remainder of the stream in their order of abundance are gravel, bedrock, rubble, sand, and boulder. The upper 11.8 miles, that part known as Stockwell Creek, is considered trout water with natural populations of brook and brown trout. That portion upstream from C.T.H. "F" road crossing is classed as a type two trout stream while the remainder is classed as type three. Downstream from the upper flowage at Merrillan the fishery consists of northern pike, smallmouth bass, crappie, rock bass, and pumpkinseed. The northern pike and smallmouth bass are restricted to that part of the stream below the lower flowage at Merrillan. During the winter aerial groundwater survey conducted a few years ago, scattered open water areas were observed in the Stockwell Creek portion of the stream. This portion of the stream also has 48 acres of adjoining wetland. There are 8.6 miles of public frontage of which 5.0 miles are located along the Stockwell Creek portion. In addition to the two permanent dams that have a combined head of 37 feet, there is a dam on the stream that is operated seasonally. It is located at Camp Bradfield, a Y.M.C.A. camp, and the water is impounded prior to camp opening in the summer and usually drained during August, after the close of the camp. A resort is located on the Stockwell Creek portion of the stream. Three road crossings provide access to the lower portion of the stream while there are nine crossings along the trout water portion. Mallard, teal, and wood duck nesting may be observed as well as migrating puddle ducks.

Halls Creek, East Fork, T23N, R4W, Section 26
Surface Acres = 24.0, Miles = 9.0, Gradient = 14.5 feet per mile

This very soft, light brown colored stream flows in a southerly direction and joins Halls Creek at the lower flowage at Merrillan. Bottom types in order of abundance are sand, silt, gravel, rubble, boulder, and bedrock. Forage fish species make up most of the fishery. There are 3.8 miles of public frontage and access is also possible from seven road crossings. Puddle ducks may be observed during migration periods.

Halls Creek, South Fork, T23N, R4W, Section 22
Surface Acres = 8.45, Miles = 7.7, Gradient = 17 feet per mile

A light brown colored, soft water stream that flows in an easterly direction and joins Hall (Stockwell) Creek just above the upper flowage at Merrillan. Silt is the dominant bottom type with gravel, sand, rubble, detritus, boulder, and bedrock present in that order of abundance. Forage fish species comprise the fishery. There are 89.6 acres of adjoining wetland. Access is possible from seven road crossings. Puddle ducks may be observed while they are migrating.

Hawkings Creek, T21N, R1W, Section 29
Surface Acres = 2.71, Miles = 2.8

This very soft, medium brown colored water flows in a northerly direction and becomes a part of Morrison Creek in Potter Flowage. Because of the large number of reservoirs (there are five flowages having a total head of 43.5 feet), much of the stream has lost its identity. Sand is the dominant bottom type. Silt is also present. Bullhead and forage species comprise the fishery. There are 125 acres of adjoining wetland. Access is possible from Potters Flowage. There is 0.6 mile of public frontage. Beaver are present. Wood ducks nest along the water and migrant puddle ducks use the stream.

Hay Creek, T22N, R1E, Section 12
Surface Acres = 5.51, Miles = 3.5

This very soft, medium brown colored water heads in Clark County, flows in a southeasterly direction through the northeast corner of Jackson County and joins the east fork of the Black River in Wood County. Gravel, sand, silt, rubble, and boulder are the bottom types in that order of abundance. Bullhead and forage species are present. There are 210 acres of adjoining wetland. Access is possible from one road crossing. Public frontage amounts to 3.0 miles. Puddle ducks use the stream during periods of migration.

Hay Creek, T22N, R3W, Section 22
Surface Acres = 6.55, Miles = 6.0

This very soft water stream has a medium brown color. It flows in a northwesterly direction and is a tributary of Morrison Creek. The dominant bottom type is sand with some gravel and a small amount of rubble. Forage fish species make up most of the fishery. There are 155 acres of adjoining wetland. Two flowages having a total head of about eight feet are located on the stream. There are 11.5 miles of public frontage. Access is possible from three road crossings. Nesting wood ducks and migrant puddle ducks may be observed.

Hoffman Creek, T21N, R4W, Section 18
Surface Acres = 0.97, Miles = 1.6, Gradient = 22.2 feet per mile

A clear, medium hard water stream that flows in a southerly direction and is a tributary of Kenyon Creek. Except for a very little silt, sand is the bottom type. Forage fish species comprise the fishery. Six road crossings provide access.

Holmes Creek, T22N, R5W, Section 19
Surface Acres = 0.76, Miles = 1.8, Gradient = 20 feet per mile

A soft water, light brown colored stream that flows in a northwesterly direction and is a tributary of the Trempealeau River. Sand dominates the bottom types with relatively small amounts of silt and detritus present. Forage fish species comprise the fishery. Access is possible from four road crossings. Teal nest along the stream and use is also made of the water by migrant puddle ducks.

Indian Creek, T22N, R1E, Section 26
Surface Acres = 4.27, Miles = 4.4

This medium brown colored, very soft water stream is a tributary of the east fork of the Black River and it flows in a general northerly direction. Except for very small amounts of gravel and silt, sand is the bottom type. Forage fish species are present. Three flowages with a total head of 33 feet are located on the stream. There are 150 acres of adjoining wetland and 1.5 miles of public frontage. Access is possible from the river and two road crossings. Beaver are present. Nesting mallard, wood duck, and teal may be observed as well as migrant puddle ducks.

Indian (Valentine) Creek, T22N, R3W, Section 28
Surface Acres = 2.28, Miles = 2.9

A very soft, light brown colored water stream that flows in a westerly direction and is a tributary of Morrison Creek. Sand is the dominant bottom type with gravel, rubble, boulder, and bedrock present in that order of abundance. The stream is suited to brook trout and its entire length is classed as type one trout water. There are 39 acres of adjoining wetland. Access is possible from five road crossings and there are 4.2 miles of public frontage.

Indian Grave Creek, T21N, R3W, Section 8
Surface Acres = 3.21, Miles = 5.3

This is a very soft water stream that has light brown colored water. It flows in a northwesterly direction and is a tributary of Levis Creek. Sand is the dominant bottom type. A small amount of silt is present. Forage fish species comprise the fishery. During the winter aerial groundwater survey conducted about five years ago, scattered open water areas were observed in the lower two miles of the stream. Possible access is from three road crossings.

Jay Creek, T20N, R1W, Section 34
Surface Acres = 3.22, Miles = 3.8

A very soft, light brown colored water that flows in a general southerly direction and is a tributary of the east fork of the Lemonweir River. Silt and muck are the two dominant bottom types which are present in near equal amounts. Two other types present are sand and detritus. This is a brook trout stream and it is classed as type two water. There are 330 acres of adjoining wetland and 1.8 miles of public frontage. Two roads cross the stream. Mallard, teal, and wood duck nesting may be noted as well as migrant puddle ducks.

Jonah Coulee Creek, T21N, R6W, Section 4
Surface Acres = 0.56, Miles = 2.3, Gradient = 48 feet per mile

A clear, soft water stream that flows in a southerly direction to the Trempealeau River. Sand, Gravel, and muck are the bottom types in that order of abundance. Forage fish species are present. There are 85 acres of adjoining wetland. Access is possible from two road crossings.

Judkins Creek, T23N, R5W, Section 33
Surface Acres = 1.44, Miles = 3.4, Gradient = 16 feet per mile

This clear, soft water stream flows southwesterly and is a tributary of the north branch of the Trempealeau River. Sand and silt are bottom types present in about equal amounts and there is also a small amount of clay. Though it isn't classed as trout water, brook trout are present, especially near its lower end. During the winter aerial groundwater survey conducted about five years ago, open water was observed in the lower reaches of the stream. Access is possible from three road crossings. Migrating puddle ducks use the stream.

Kay Creek, T24N, R6W, Section 5
Surface Acres = 0.48, Miles = 2.0, Gradient = 61.5 feet per mile

This is a clear, very soft water stream that flows northerly into the Buffalo River (north fork of the Beef River). Sand is the dominant bottom type with silt, detritus, and gravel also present in that order of abundance. Forage fish species are present. There are 16 acres of adjoining wetland. Two roads cross the stream.

Kenyon Creek, T21N, R4W, Section 20
Surface Acres = 2.91, Miles = 3.0, Gradient = 37.5 feet per mile

This is a clear, soft water stream that flows in a southeasterly direction into Squaw Creek. Most of the bottom is sand, but other bottom types present in order of abundance are bedrock, clay, and gravel. Brook trout inhabit the stream and it is classed as type two trout water its entire length. Access is possible from three road crossings.

Ketchum Creek, T20N, R2W, Section 20
Surface Acres = 2.21, Miles = 2.6, Gradient = 20 feet per mile

A very soft water stream having medium brown colored water that flows in a westerly direction and is a tributary of Robinson Creek. Although sand is the dominant bottom type, there is a considerable amount of silt. Forage fish species are present. There are about 137 acres of adjoining wetland and 4.7 miles of public frontage. One flowage is located on the stream near its headwaters. Two roads cross the stream. Nesting wood ducks and migrant puddle ducks use the stream.

Kunes Creek, T19N, R5W, Section 2
Surface Acres = 0.73, Miles = 1.5, Gradient = 60 feet per mile

A clear, very hard water stream that flows in a general southerly direction into the Black River. Except for very little gravel, sand is the bottom type. Forage fish species are present. There are 25 acres of adjoining wetland and two road crossings.

Lemonweir River, East Fork (Fish Creek), T20N, R1W, Section 36
Surface Acres = 1.36, Miles = 2.25

This tributary of the Lemonweir River flows in a general southerly direction and joins the parent stream in Monroe County. Its water is very soft and it has a medium brown color. Silt is the dominant bottom type followed by sand and detritus. All of the stream in the county is classed as type two trout water. Brook trout are present. There are 0.2 mile public frontage and 85 acres of adjoining wetland. Four flowages are located on the stream having a total head of approximately 56 feet. Access is possible from some of the flowages and from public lands. Nesting wood duck and mallard as well as migrant puddle ducks use the water.

Levis Creek, T21N, R4W, Section 11
Surface Acres = 26.71, Miles = 11.6

This is a very soft, medium brown colored water that flows in a general westerly direction and joins the Black River via the flowage at Black River Falls. The dominant bottom type is sand followed in order of abundance by rubble and silt, bedrock, and gravel. The entire stream is considered trout water (brown trout) with the lower four miles classed as type two and the remainder as type three. During the winter aerial groundwater survey conducted about 1963, open water was observed for a short distance downstream from the junction of Indian Grave Creek. One flowage, having a five-foot head, is located on the stream. There are 143 acres of adjoining wetlands and 4.1 miles of public frontage. Several road crossings provide access. Beaver are present. Migrant puddle ducks and nesting wood ducks use the stream.

Lowe Creek, T22N, R6W, Section 24
Surface Acres = 1.64, Miles = 2.7, Gradient = 30 feet per mile

A clear, very soft water stream that flows in a northwesterly direction and is a tributary of the Trempealeau River. Sand, detritus, and silt are the bottom types in that order of abundance. The entire stream is considered brook trout water. The upper 1.2 miles is classed type two trout water and the remainder as type three. During the winter aerial groundwater survey conducted about 1963, open water was observed for a short distance immediately below the dam of a flowage located on the stream. Access with parking is available as well as three road crossings. There is 0.8 mile of public frontage. Beaver are present. Nesting mallard, teal, and wood duck may be noted and puddle ducks use the stream while migrating.

Lyons Creek, T23N, R6W, Section 14
Surface Acres = 0.44, Miles = 1.8, Gradient = 50 feet per mile

This light brown colored, soft water stream flows in a northerly direction into Pigeon Creek east of Northfield. Most of the bottom is silt, there is a little detritus and very little sand. Forage fish species comprise the fishery. Access is possible from two road crossings.

McKenna Creek, T21N, R1W, Section 28
Surface Acres = 2.9, Miles = 3.0

A very soft, medium brown colored water that flows in a general northerly direction to Potter Flowage where it becomes a part of Morrison Creek. Toward the upper end, this stream is ditched and is joined by several other ditches. As it was difficult to distinguish this stream from another ditch, only the natural portion of the stream is considered in this survey (mouth upstream to about west edge $SE\frac{1}{4}$ $NE\frac{1}{4}$ S35, T21N, R1W). Except for less than 10 percent of the bottom which is silt, the bottom type is sand. Forage fish species dominate the fishery, but panfish, especially bullhead, are present. One flowage having a 10-foot head is located on the stream. There are approximately 1,682 acres of adjoining wetland and three miles of public frontage. One road crosses the natural portion of stream. Beaver are present. Migrant puddle ducks and nesting wood ducks may be observed.

Mill Creek, T19N, R6W, Section 29
Surface Acres = 1.56, Miles = 3.7, Gradient = 31.1 feet per mile

A very hard water, clear stream that flows in a southerly direction and joins the Black River at North Bend. Sand, silt, and gravel are the bottom types in that order of abundance. Forage fish species dominate the fishery. There are 30 acres of adjoining wetland. Access is possible from several road crossings.

Mollies Creek, T22N, R3W, Section 22
Surface Acres = 12.27, Miles = 9.2

This medium brown colored, very soft water stream is a tributary of Morrison Creek and flows in a westerly direction. Sand is the dominant bottom type with silt being the next most abundant. Other types present include gravel, rubble, and boulders. Forage fish species dominate the fishery, but rock bass and pumpkinseed are present. About the upper half of the stream is ditched. There are about 14.2 miles of public frontage and about 211 acres of adjoining wetland. Access is possible from three road crossings and from Morrison Creek. Beaver are present. Nesting wood duck and migrant puddle ducks use the stream.

Morrison Creek, T22N, R3W, Section 29
Surface Acres = 94.69, Miles = 21.7

A very soft, medium brown colored stream that flows in a general westerly direction to the Black River. Sand dominates the bottom types, but others present in their order of abundance include boulders, bedrock, rubble, gravel, and silt. Northern pike, walleye, muskellunge, smallmouth bass, rock bass, pumpkinseed, and bullhead constitute the fishery. One flowage is located on the stream. There are 130 acres of adjoining wetlands and 37.9 miles of public frontage. There is a parking area near the Komensky Cemetery and access is also possible from five road crossings. Boating is limited. Beaver are present. Nesting mallard and wood ducks as well as migrant puddle ducks may be observed.

Plaines Creek, T23N, R4W, Section 14
Surface Acres = 0.40, Miles = 3.3, Gradient = 25 feet per mile

This medium brown colored, very soft water stream has a predominantly gravel bottom with sand and rubble present. It flows in a general southerly direction and is a tributary of the east fork of Halls Creek. Forage fish species dominate the fishery. Adjoining wetlands amount to about 99 acres. Access is possible from one road crossing and there are 6.1 miles of public frontage.

Papoose Creek, T21N, R4W, Section 19
Surface Acres = 1.16, Miles = 1.6, Gradient = 32 feet per mile

A clear, soft water stream that has, except for about one percent of silt and gravel, a sand bottom. The stream flows in a northeasterly direction into Squaw Creek. The fishery is primarily forage species, but some brook trout are present. There is access from Squaw Creek.

Perry Creek, T21N, R4W, Section 27
Surface Acres = 12.13, Miles = 7.7, Gradient = 25.5 feet per mile

A light brown colored, very soft water stream that flows in a general westerly direction to the Black River. The dominant bottom type is sand with gravel, bedrock, silt, and rubble present in that order of abundance. During the winter aerial groundwater survey, open water was observed near the headwaters and at two small areas below U. S. Highway 12. That portion of stream above the flowage in S31, T21N, R3W is considered trout water. Brook and brown trout are present and it is classed as type two trout water. Below the flowages, the fishery is primarily forage species, but a few brown trout are present. There are 435 acres of adjoining wetlands. Two flowages are located on the stream. Access is possible from three road crossings and there are 3.7 miles of public frontage. At its junction with the Black River, there is a park area which fronts both this stream and the river. Beaver are present. Migrant puddle ducks and nesting teal, mallard, and wood duck use the stream.

Pigeon Creek, T20N, R2W, Section 17
Surface Acres = 1.42, Miles = 4.7, Gradient = 38.1 feet per mile

This very soft, medium brown colored water flows in a general westerly direction and is a tributary of Glen Creek. Sand is the most abundant bottom type with silt and gravel present in that order of abundance. The stream is classed as a type two brook trout stream. Pigeon Creek Flowage is located on the stream. There are 245 acres of adjoining wetland. Five road crossings provide public access and there are 6.9 miles of public frontage on the stream. Nesting wood duck and migrant puddle ducks use the stream.

Pigeon Creek, T23N, R6W, Section 30
Surface Acres = 12.13, Miles = 9.1, Gradient = 15.4 feet per mile

This light brown colored, soft water stream flows in a general westerly direction into Trempealeau County where it joins the Trempealeau River. The most abundant bottom type is sand followed by silt and considerably lesser amounts of clay hardpan, gravel, rubble, and detritus. The entire stream in Jackson County is considered type two brook trout water. At the time of the winter aerial groundwater survey in about 1963, most of the stream was open above the junction of Brooks Creek and there were scattered open areas downstream as far as York. About 190 acres of wetland adjoin the stream. There is 0.5 mile of public frontage and several roads cross the stream. Nesting teal, mallard and wood ducks as well as migrant puddle ducks use the stream.

Pine Creek, T22N, R6W, Section 34
Surface Acres = 5.33, Miles = 5.5, Gradient = 20 feet per mile

A tributary of the Trempealeau River, this stream has clear, very soft water and it flows in a general northerly direction. Except for less than three percent silt and gravel, the bottom type is sand. The entire stream is classed as type two trout water. Brook trout are present. There are about 83 acres of adjoining wetland. During the winter aerial groundwater survey conducted about 1963, open water was observed in about the upper half of the stream. Access is possible from five road crossings. Nesting wood duck and migrant puddle ducks use the stream.

Pine Grove Creek, T20N, R4W, Section 5
Surface Acres = 1.06, Miles = 2.2, Gradient = 53 feet per mile

A clear, very hard water stream that flows in a southeasterly direction into the Black River. Sand is the dominant bottom type. Some silt is present. Forage fish species are present. Three roads cross the stream.

Roaring Creek, T20N, R5W, Section 36
Surface Acres = 5.12, Miles = 4.7, Gradient = 23 feet per mile

This clear, medium hard water stream flows in a southeasterly direction into the Black River. Bottom types present in order of abundance are sand, silt, detritus and about equal amounts of gravel and clay hardpan. Forage fish species dominate the fishery, but occasional brook trout are reportedly creeled toward the upper end of the stream. Four road crossings provide access. Nesting teal and migrant puddle ducks may be observed along the stream.

Robinson Creek, T20N, R4W, Section 17
Surface Acres = 86.54, Miles = 21.0, Gradient = 9 feet per mile

A tributary of the Black River, this light brown colored, very soft water stream flows in a general westerly direction. That portion of the stream above the junction of Ketchum Creek is sometimes called Patterson Creek. A sand bottom dominates the bottom types, but bedrock, silt, and gravel are present. That portion of the stream above a town road crossing in S16, T20N, R4W is considered type two trout water with brook and brown trout present. In the lower reaches of the stream, especially in the area downstream from S.T.H. 27, fish species found in the Black River such as northern pike, crappie, walleye, pumpkinseed, largemouth bass, and bullhead are present and there are relatively few trout. The winter aerial groundwater survey conducted about 1963, found scattered open water areas downstream from the junction of Wyman Creek. There are nine dwellings and one organizational camp located on the stream. Adjoining wetlands amount to 1,800 acres. There are 16 miles of public frontage. Boating use is limited and there are seven road crossings which provide additional access. Beaver are present. Migrant puddle ducks and nesting teal, mallard, and wood ducks may be observed along the stream.

Rock Creek, T22N, R2W, Section 4
Surface Acres = 4.02, Miles = 1.3

This medium brown colored, very soft water stream flows in a general southwesterly direction out of Clark County and is a tributary of the East Fork of the Black River. The bottom types are sand, boulders, rubble, and about equal amounts of silt and gravel in that order of abundance. The principal fish are forage species. There is 0.77 of a mile of public frontage and wilderness access is possible from a town road. The river also provides access to this stream. Nesting wood duck and migrant puddle ducks may be observed along the stream.

Rudes (Rudds, Zahrtes, Sawdust) Creek, T20N, R2W, Section 29
Surface Acres = 3.49, Miles = 3.6, Gradient = 13.3 feet per mile

A tributary of Wyman Creek, this stream heads in Monroe County, flows northward in Jackson County and eventually westward to Wyman Creek. It is shown on topographic maps as Sawdust and Rudes Creeks. The water has a medium brown color and is very soft. Sand dominates the bottom types with silt and detritus present. The entire stream in Jackson County is classed as type three brown trout water in the 1966 edition of "Wisconsin Trout Streams"; however, recent investigations indicate it should be removed from the trout stream list. Two cranberry flowages are located on the stream. There are 5.7 miles of public frontage and 35 acres of adjoining wetland. Access is possible from Wyman Creek and from two road crossings. Migrant puddle ducks and nesting mallard and wood ducks may be seen along the stream.

Sand Creek, T19N, R5W, Section 29
Surface Acres = 7.88, Miles = 2.6, Gradient = 20 feet per mile

This stream flows westward from Monroe County and is a tributary of the Black River in Jackson County. It is a clear, soft water stream that except for a very little silt has almost a complete sand bottom. It is a brook trout stream that is classed as type one trout water. During the winter aerial groundwater survey conducted about 1963, open water was noted the entire length in Jackson County. Access is possible from the river and from one road crossing. Beaver are present. Nesting wood ducks and migrant puddle ducks may be noted along the stream.

Sands Creek, T23N, R6W, Section 28
Surface Acres = 1.06, Miles = 2.5, Gradient = 30 feet per mile

A soft water, light brown colored stream that flows in a northwesterly direction to Pigeon Creek. Silt is the dominant bottom type though sand predominates in the lower end of the stream. Traces of gravel and clay hardpan are also present. Forage fish species are present. Access is possible from three road crossings and from Pigeon Creek.

Schermerhorn Creek, T23N, R6W, Section 31
Surface Acres = 2.18, Miles = 4.0, Gradient = 25 feet per mile

This light brown colored, medium hard water stream heads in Jackson County and flows in a northwesterly direction into Trempealeau County where it joins Pigeon Creek. Silt is the dominant bottom type followed by clay hardpan, sand, and gravel in that order of abundance. Forage fish species dominate the fishery. There is 0.6 mile of public frontage and six road crossings provide access. Teal, mallard, and wood ducks nest along the stream and puddle ducks use the water while migrating.

Shake Hollow Creek - See Douglas Creek

Shamrock Creek, T20N, R4W, Section 25
Surface Acres = 2.80, Miles = 2.2, Gradient = 20 feet per mile

This clear, medium hard water stream heads in Monroe County and flows northward into Jackson County where it joins Stony Creek near Shamrock. Except for about five percent silt, the bottom is sand. The stream is classed as type two brook trout water. All of the stream was open during the winter aerial groundwater survey conducted about 1963. Two road crossings provide access. Wood duck nest along the stream and migrant puddle ducks make light use of the water.

Skutley Coulee Creek, T21N, R6W, Section 7
Surface Acres = 2.18, Miles = 4.5, Gradient = 21.3 feet per mile

This is a clear, medium hard water stream that flows in a northwesterly direction and joins the Trempealeau River west of Taylor. Sand, clay hardpan, and silt are the bottom types in that order of abundance. The entire stream is considered brook trout water with the upper two miles classed as type two and the remainder of the stream as type three. Ninety acres of wetland adjoin the stream. The winter aerial groundwater survey conducted about 1963, found open water in the upper end of the stream. Access is possible from the river and from five road crossings.

Snow Creek, T21N, R4W, Section 2
Surface Acres = 1.53, Miles = 2.8, Gradient = 50 feet per mile

The entire water is classed as a type one brook trout stream. It has clear, very soft water and it flows in a general southerly direction to the Black River. Sand is the basic bottom type with very small amounts of muck and gravel present. During the winter aerial groundwater survey conducted about 1963, open water was noted at the upper end of the stream. Access is possible from the river and from three road crossings.

Solam Creek, T24N, R6W, Section 11
Surface Acres = 0.13, Miles = 0.7, Gradient = 26.7 feet per mile

A clear, very soft water stream that flows in a northwesterly direction to Buffalo River (N. Br. Beef River). Silt dominates the bottom types but sand is abundant. This is brook trout water and should probably be classified as a type one trout stream. There are 78 acres of adjoining wetland. Access is possible from the river and from one road crossing.

Spring Creek, T21N, R4W, Section 33
Surface Acres = 1.52, Miles = 2.5, Gradient = 83.3 feet per mile

This clear, hard water stream flows in a southeasterly direction and is a tributary of the Black River. Except for very small amounts of gravel and clay, sand is the bottom type. Forage fish species are present. Access is possible from several road crossings.

Squaw Creek, T21N, R4W, Section 33
Surface Acres = 14.20, Miles = 7.1, Gradient = 24 feet per mile

This tributary of the Black River flows in a southeasterly direction. It has clear, soft water. All of it is classed as type two trout water and is suited to brook trout. The lower end of the stream isn't usually considered as good as the upper portion. Sand is the bottom type. Only a very small amount of silt is present. Three flowages are located on the stream. During the winter aerial groundwater survey in about 1963, open water areas were observed scattered along its entire length. Access is possible from the river and from six road crossings.

Stanton Creek, T20N, R2W, Section 17
Surface Acres = 0.36, Miles = 0.6, Gradient = 40 feet per mile

A short tributary of Glen Creek, this light brown colored, very soft water stream flows in a southerly direction. Silt and sand dominate the bottom types with the former more abundant. A small amount of detritus is also present. Forage fish species are present. There are 200 acres of adjoining wetland and 1.2 miles of public frontage. Access is possible from Glen Creek and also from a town road that parallels a portion of the stream.

Stockwell Creek - See Halls Creek

Stony Creek, T20N, R4W, Section 24
Surface Acres = 2.42, Miles = 2.5, Gradient = 34.3 feet per mile

This class two brook trout stream flows in a northerly direction and is a tributary of Robinson Creek. It has clear soft water and a predominantly sand bottom. Other bottom types present in their order of abundance are silt and about equal amounts of bedrock and gravel. There are 183 acres of adjoining wetland and one mile of public frontage. One water control structure is located at C.T.H. "O" crossing. Access is possible from two road crossings and from Robinson Creek. Migrant puddle ducks make light use of the stream.

Tank Creek, T22N, R5W, Section 17
Surface Acres = 6.36, Miles = 5.0, Gradient = 18.2 feet per mile

This tributary of the Trempealeau River flows in a northwesterly direction. It has clear, very soft water and a predominantly sand bottom. Silt, gravel, and clay hardpan are other bottom types present. The entire stream is classed as type one brook trout water. There are 1.12 miles of public frontage. Access is possible from several road crossings. The winter aerial groundwater survey of about 1963, found open water along about the upper two-thirds of the stream. Beaver are present. Nesting mallard, teal, and wood duck may be observed. Migrant puddle ducks make relatively light to medium use of the water.

Timber Creek, T23N, R6W, Section 30
Surface Acres = 1.69, Miles = 3.5, Gradient = 38.9 feet per mile

A clear, medium hard water stream that flows southerly into Pigeon Creek. Sand dominates the bottom types with silt, about equal amounts of clay and gravel, and rubble present in that order of abundance. Forage fish species are present. Access is possible from Pigeon Creek and from two road crossings. Migrant puddle ducks make light use of the water.

Town Creek, T21N, R4W, Section 15
Surface Acres = 2.91, Miles = 3.0, Gradient = 56 feet per mile

This clear, soft water stream flows in a southeasterly direction into the Black River at Black River Falls. This stream provides the water supply for Black River Falls and there is a small dam on the stream at the pumping station. Another dam owned by a private individual is located further upstream. A park area is near its mouth in Black River Falls. Over 90 percent of the bottom is sand, and gravel comprises the rest of the bottom. Forage fish species are present. Open water was found near the upper end of the stream during the winter aerial groundwater survey conducted about five years ago. There is 0.1 mile of public frontage. Additional access is possible from three road crossings.

Townline Creek, T21N, R2W, Section 12
Surface Acres = 2.73, Miles = 4.1

A tributary of Morrison Creek, this stream flows in a northerly direction. It has medium brown colored, very soft water. Sand and silt comprise the bottom types with the former predominating. Forage species make up the bulk of the fishery. A few brook trout have been reported and bullhead are likely inhabitants. Two flowages are located on the stream. There are 208 acres of adjoining wetland and three miles of public frontage. Navigable water access is possible from Morrison Creek and Range Line Flowage and there is one road crossing. Beaver are present. Mallard and wood duck nest along the stream. There is also light use by migrant puddle ducks.

Trempealeau River, T21N, R6W, Section 7
Surface Acres = 50.5, Miles = 17.9, Gradient = 9.7 feet per mile

This tributary of the Mississippi River heads in Jackson County and flows in a general southwesterly direction into Trempealeau County. It is a clear, soft water stream that has a predominantly sand bottom. Other bottom types present in order of their abundance are silt and gravel. Above the junction of the north branch of the Trempealeau River, a very small amount of rubble is also present.

Trempealeau River, (Cont.)

Locally, that portion of stream above the junction of the north branch of the Trempealeau River is known as the south branch of the Trempealeau River. It is six miles in length and is classed as type two brook trout water. A portion of this branch is ditched and a milk products plant has caused a pollution problem in past years. In the main stream, below the junction of the two branches, an occasional trout is creeled. The bulk of the fishery is comprised of northern pike, rock bass, carp and forage species. There is limited boating on the "main" stream. A total of about 323 acres of wetland adjoin the whole stream with approximately 13 acres of this total along the "south branch." Access is possible from several road crossings on both portions of this stream. During the winter aerial groundwater survey conducted about 1963, open water was observed in the vicinity of Hixton and on most of the stream known locally as the south branch. Beaver are present. Nesting mallard, teal, and wood duck may be observed as well as migrating puddle ducks.

Trempealeau River, North Branch, T22N, R5W, Section 9
Surface Acres = 9.16, Miles = 7.2, Gradient = 28.5 feet per mile

This is a clear, soft water stream that flows in a southward direction to join the main stream near Hixton. Sand, silt, clay, and detritus are the bottom types in that order of abundance. The entire stream is considered trout water and brook and brown trout are present. The upper six miles is classed as type one while the remainder is type two. Open water was found in most of the stream above the first road crossing during the winter aerial groundwater survey conducted about 1963. There are 180 acres of adjoining wetland. Access is possible from seven road crossings and there are 11.2 miles of public frontage. Nesting mallard, teal, and wood duck may be observed as well as relatively few migrant puddle ducks.

Trempealeau River, South Branch - See Trempealeau River

Trout Run Creek, T20N, R4W, Section 19
Surface Acres = 27.98, Miles = 7.0, Gradient = 25 feet per mile

A clear, medium hard water stream that flows in a southeasterly direction and is a tributary of the Black River. Over 90 percent of the bottom is sand while most of the remainder is gravel. There are traces of rubble, boulder, and silt. The entire stream is classed as type three brook trout water. There are about 60 acres of adjoining wetland. One flood control dam is located on the stream. Near the upper end of the stream is a county park called Gullickson's Glen. Indian carvings of historical interest are found there. Public frontage amounts to about 0.2 mile and there are five road crossings that provide additional access. Beaver are present. Teal and wood duck nest along the stream. There is also light use by migrant puddle ducks.

Trump Coulee Creek, T21N, R6W, Section 30
Surface Acres = 2.18, Miles = 3.0, Gradient = 25 feet per mile

This clear, medium hard water stream heads in Jackson County, flows in a northwesterly direction, and joins the Trempealeau River in Trempealeau County. The dominant bottom type is sand followed by silt, muck and clay in that order of abundance. All of the stream in Jackson County is classed as type two brook trout water. Scattered open water areas were noted, amounting to about half of the stream, during the winter aerial groundwater survey conducted about 1963. There are 33 acres of adjoining wetland. Access is possible from three road crossings. Nesting wood duck and a few migrant puddle ducks use the stream.

Vismal Creek, T22N, R3W, Section 17
Surface Acres = 2.55, Miles = 3.0, Gradient = 40 feet per mile

A tributary of the Black River that flows in a general southerly direction. It has very soft, light brown colored water. A sand bottom covers about 90 percent of the bottom, followed by gravel, rubble and boulder in that order of abundance. Classed as a type one trout water, this stream is suited to brook trout. There are about 15 acres of adjoining wetland. Four road crossings provide access. Beaver are present. The stream is also used by nesting wood ducks and some migrant puddle ducks.

Vosse Coulee Creek, T21N, R6W, Section 7
Surface Acres = 1.00, Miles = 1.0, Gradient = 13.4 feet per mile

This clear, medium hard water tributary of the Trempealeau River flows in a southerly direction. The stream heads in Trempealeau County. Sand, gravel, silt, and clay are the bottom types in that order. Although a few trout may occasionally be found in the Jackson County portion of the stream, it is not classed as trout water. Forage fish species dominate. Most of the stream in Jackson County has been ditched. Access is possible from two road crossings. Nesting wood ducks and relatively few migrant puddle ducks make use of the stream.

White Creek, T19N, R5W, Section 5
Surface Acres = 1.87, Miles = 2.2, Gradient = 40 feet per mile

This is a clear, hard water stream that flows in a southerly direction and is a tributary of Douglas (Shake Hollow) Creek. Sand is the predominant bottom type with less than 5 percent silt present. Forage fish species comprise the fishery. Adjoining wetland amounts to 20 acres. There are three road crossings that provide access.

White Creek, T22N, R2W, Section 20
Surface Acres = 5.16, Miles = 7.1

A dark brown colored, very soft water stream that flows in a westerly direction and is a tributary of Morrison Creek. The upper portion is ditched. Gravel is the dominant bottom type with sand, silt, and rubble present in that order of abundance. Forage fish species are present. There are about 235 acres of adjoining wetland. Public frontage amounts to 14.2 miles. Access is possible from Morrison Creek and from two road crossings. Beaver are present. Wood duck nesting occurs along the stream and relatively few migrant puddle ducks use the water.

Wilson Creek, T19N, R6W, Section 32
Surface Acres = 4.35, Miles = 3.6, Gradient = 46.7 feet per mile

A tributary of the Black River that flows in a southerly direction, this stream has clear, hard water. Most of the bottom is sand with small amounts of silt and gravel. Forage fish species are present. There are 30 acres of adjoining wetlands. In addition to the river, five road crossings provide access. Nesting wood ducks may be observed as well as puddle ducks during their migration.

Wolf Creek, T20N, R4W, Section 31
Surface Acres = 2.40, Miles = 2.2, Gradient = 50 feet per mile

This clear, soft water stream heads in Monroe County and joins the Black River in Jackson County after flowing in a westerly direction. Sand is the bottom type. Forage fish species are present. There is access from the Black River.

Wyman Creek, T20N, R2W, Section 19
Surface Acres = 4.24, Miles = 3.5, Gradient = 20 feet per mile

This tributary of Robinson Creek flows in a northwesterly direction. It has very soft, light brown colored water. Sand is the dominant bottom type with some silt and a very small amount of rubble present. It is classed as type two brook trout water. Two flowages are located on the stream (Lee and Wyman Lakes). Open water areas were found between the two lakes during the winter aerial groundwater survey conducted about 1963. There are five miles of public frontage. Access is possible from Robinson Creek, the two flowages, and from two road crossings. Beaver are present. Wood ducks nest along the stream and relatively few migrant puddle ducks use the water.

Unnamed Streams The description of each of the following is presented tabular form for quick reference.

Adams Township, T21, 22N, R3, 4W

T21N, R4W

2-4
Surface acres - 0.48
Miles - 2.0
Gradient - 40 feet per mile
Water - Clear, very soft
Direction of flow - Southwesterly
Tributary of - Snow Creek
Bottom types - Sand dominates with silt, gravel, and rubble present
Fishery - Forage species
Access - Three road crossing

2-11
Surface acres - 0.30
Miles - 1.0
Gradient - 53.3 feet per mile
Water - Clear, medium hard
Direction of flow - Southerly
Tributary of - Allen Creek
Bottom types - Sand dominates with gravel and silt
Fishery - Forage species
Access - One road crossing

T22N, R3W

10-8
Surface acres - 0.58
Miles - 0.8
Water - Soft, light brown colored
Direction of flow - Southeasterly
Tributary of - Black River
Bottom types - Sand dominant with gravel, silt and rubble
Fishery - Forage species
Access - Black River
Game - Nesting wood ducks, migrant puddle ducks

17-2
Surface acres - 0.36
Miles - 1.0
Gradient - 50 feet per mile
Water - Light brown colored, very soft
Direction of flow - Southeasterly
Tributary of - Vismal Creek
Bottom types - Sand with a little gravel and rubble.
Fishery - Forage species
Adjoining wetland - About 35 acres
Access - Two road crossings
Remarks - One dam on stream

18-10
Surface acres - 0.97
Miles - 2.0
Gradient - 62.5 feet per mile
Water - Clear, very soft
Direction of flow - Easterly
Tributary of - Halls Creek
Bottom types - Sand dominant with gravel, rubble, silt, bedrock, and boulder
Fishery - Few brook trout reported, forage species dominate
Access - Three road crossings
Remarks - Two farm ponds on a very short tributary of this stream; open water in vicinity of junction of Creek 13-6 during winter groundwater survey.

19-6
Surface acres - 0.29
Miles - 1.2
Gradient - 100 feet per mile
Water - Very soft, medium brown colored
Direction of flow - Easterly
Tributary of - Halls Creek
Bottom types - Sand with gravel, detritus, and silt
Fishery - Forage species
Access - Halls Creek

19-14
Surface acres - 0.47
Miles - 1.3
Gradient - 114.3 feet per mile
Water - Very soft, medium brown colored
Direction of flow - Easterly
Tributary of - Halls Creek
Bottom types - Sand with small amounts of gravel, silt and detritus
Fishery - Forage species
Access - One road crossing

31-6
Surface acres - 0.73
Miles - 2.0
Gradient - 71.4 feet per mile
Water - Clear, very soft
Direction of flow - Easterly
Tributary of - Black River
Bottom types - Sand and silt dominant with gravel, bedrock, and rubble
Fishery - Forage species
Access - Three road crossings
Remarks - 0.4 mile public frontage

T22N, R4W

27-16
Surface acres - 0.15
Miles - 0.6
Gradient - 133.3 feet per mile
Water - Clear, very soft
Direction of flow - Southerly
Tributary of - Snow Creek
Bottom types - Sand with small amounts of gravel, silt and rubble
Fishery - Forage species
Access - One road crossing
Remarks - One farm pond on stream

33-2
Surface acres - 0.40
Miles - 1.1
Gradient - 10 feet per mile
Water - Clear, very soft
Direction of flow - Southerly
Tributary of - Allen Creek
Bottom types - Sand with little gravel, silt, clay, and rubble
Fishery - Forage species, brook trout likely
Access - None

33-5
Surface acres - 0.29
Miles - 0.7
Gradient - 10 feet per mile
Water - Clear, very soft
Direction of flow - Easterly
Tributary of - Allen Creek
Bottom types - Sand with little gravel and silt
Fishery - Forage species dominate, brook trout likely
Access - None
Remarks - Stream open during winter aerial groundwater survey conducted about 1963

Albion Township, T21N, R4, 5W

R4W

32-5
Surface acres - 0.4
Miles - 1.1
Gradient - 66.7 feet per mile
Water - Clear, hard
Direction of flow - Easterly
Tributary of - Spring Creek
Bottom types - Sand, very little gravel
Fishery - Forage species
Access - None

R5W

5-3
Surface acres - 0.44
Miles - 1.8
Gradient - 57.1 feet per mile
Water - Clear, very soft
Direction of flow - Northwest
Tributary of - Pine Creek
Bottom types - Mostly silt, some sand
Fishery - Forage species
Access - Two road crossings

13-10
Surface acres - 0.16
Miles - 1.3
Gradient - 40 feet per mile
Water - Clear, soft
Direction of flow - Easterly
Tributary of - Squaw Creek
Bottom types - Sand, little silt, clay bedrock
Fishery - Brook trout, type two trout water
Access - One road crossing
Remarks - Scattered open water areas during winter groundwater survey (about 1963)

13-12
Surface acres - 1.95
Miles - 2.3
Gradient - 30 feet per mile
Water - Clear, very soft
Direction of flow - Northeasterly
Tributary of - Squaw Creek
Bottom types - Sand with very small amounts of clay and silt
Fishery - Few brook trout, mostly forage species
Access - One road crossing

14-14
Surface acres - 0.53
Miles - 1.1
Gradient - 80 feet per mile
Water - Clear, very soft
Direction of flow - Southeasterly
Tributary of - Creek 13-10
Bottom types - Sand with very little silt
Fishery - Brook trout
Access - Two road crossings

Alma Township, T22, 23N, R4W

T22N

12-3
Surface acres - 1.09
Miles - 1.8
Gradient - 83.3 feet per mile
Water - Clear, very soft
Direction of flow - Easterly
Tributary of - Halls Creek
Bottom types - Sand with very little amount of gravel, silt, boulder, rubble, and bedrock
Fishery - Forage species
Access - One road crossing

13-3
Surface acres - 0.64
Miles - 2.1
Gradient - 62.6 feet per mile
Water - Clear, very soft
Direction of flow - Northeasterly
Tributary of - Creek 18-10 (T22N, R3W)
Bottom types - Sand with very little silt, gravel and rubble
Fishery - Forage species
Access - Two road crossings

13-6
Surface acres - 0.61
Miles - 1.0
Gradient - 100 feet per mile
Water - Clear, soft
Direction of flow - Easterly
Tributary of - Creek 18-10 (T22N, R3W)
Bottom types - Sand, very small amounts of bedrock, gravel, silt
Fishery - Few brook trout reportedly creeled, forage species
Access - One road crossing
Remarks - Open water noted near mouth during winter aerial groundwater survey (about 1963)

14-4
Surface acres - 0.05
Miles - 0.9
Gradient - 80 feet per mile
Water - Clear, soft
Direction of flow - Easterly
Tributary of - Creek 13-6 (T22N, R4W)
Bottom types - Sand, very small amounts of bedrock, gravel, silt
Fishery - Forage species
Access - None

18-16
Surface acres - 0.15
Miles - 1.2
Gradient - 50 feet per mile
Water - Soft, medium brown colored
Direction of flow - Northerly
Tributary of - Trempealeau River (So. Br. Trempealeau R.)
Bottom types - Sand, very little silt
Fishery - Forage species
Access - One road crossing

T23N

4-5
Surface acres - 0.18
Miles - 1.0
Gradient - 26.7 feet per mile
Water - Clear, very soft
Direction of flow - Southeasterly
Tributary of - East fork Halls Creek
Bottom types - Sand, little silt
Fishery - Forage species
Access - Two road crossings

11-16
Surface acres - 0.73
Miles - 1.5
Gradient - 16.7 feet per mile
Water - Very soft, medium brown colored
Direction of flow - Westerly
Tributary of - Paines Creek
Bottom types - Sand and gravel dominant, little silt
Fishery - Forage species
Access - One road crossing
Remarks - Mostly ditched; 3.0 miles of public frontage; 70.4 acres adjoining wetland.

Brockway Township, T21N, R3, 4W

R3W

9-13
Surface acres - 0.10
Miles - 0.5
Water - Medium brown colored very soft
Direction of flow - Westerly
Tributary of - Levis Creek
Bottom types - Silt, little sand
Fishery - Forage species
Access - One road crossing
Remarks - 92 acres adjoining wetlands

14-9
Surface acres - 2.72
Miles - 3.2
Water - Very soft, light brown colored
Direction of flow - Northwesterly
Tributary of - Levis Creek
Bottom types - Sand dominant, silt
Fishery - Forage species
Access - One road crossing
Remarks - Considerable ditching; 75 acres adjoining wetland

24-2
Surface acres - 0.34
Miles - 0.8
Water - Light brown color, very soft
Direction of flow - Southwesterly
Tributary of - Levis Creek
Bottom types - Detritus and sand dominant, silt
Fishery - Forage species
Access - One road crossing
Remarks - 44 acres adjoining wetland; 0.8 mile public frontage

24-5
Surface acres - 1.39
Miles - 2.3
Water - Light brown color, very soft
Direction of flow - Northwesterly
Tributary of - Levis Creek
Bottom types - Sand, little silt
Fishery - Forage species
Access - One road crossing
Remarks - 1,600 acres adjoining wetland;
216 miles public frontage

R4W

22-1 (Depot Creek)
Surface acres - 0.62
Miles - 1.7
Gradient - 60 feet per mile
Direction of flow - Westerly
Tributary of - Black River
Bottom types - Sand, little gravel and silt
Fishery - Forage species; few trout reported several years ago
Access - One road crossing
Game - Teal duck nesting and light use by migrant puddle ducks

City Point Township, T22N, R1E, W

R1E

1-11
Surface acres - 0.93
Miles - 1.1
Water - Very soft, light brown color
Direction of flow - Southerly
Tributary of - Hay Creek
Bottom types - Sand, little silt and gravel
Fishery - Forage species
Access - One road crossing
Remarks - 2.2 miles public frontage; 102 acres adjoining wetland

20-3
Surface acres - 0.27
Miles - 1.5
Water - Very soft, medium brown color
Direction of flow - Southerly
Tributary of - East fork Black River
Bottom types - Gravel and silt dominant, sand and detritus present
Fishery - Forage species
Access - One road crossing
Remarks - Farm pond on stream; 10 acres adjoining wetland

21-7
Surface acres - 2.29
Miles - 2.7
Water - Dark brown color, very soft
Direction of flow - Southwesterly
Tributary of - East fork Black River
Bottom types - Sand and gravel dominant, little rubble and silt
Fishery - Forage species
Access - One road crossing
Remarks - 2.8 miles public frontage; 650 acres adjoining wetland; dam on stream

27-1
Surface acres - 1.67
Miles - 2.3
Water - Dark brown color, very soft
Direction of flow - Westerly
Tributary of - East fork Black River
Bottom types - Detritus
Fishery - Forage species
Access - One road crossing
Game - Beaver present, wood duck nesting and light use by migrant puddle ducks
Remarks - 479 acres adjoining wetland; 2 miles public frontage

35-3
Surface acres - 1.45
Miles - 2.0
Water - Medium brown color, very soft
Direction of flow - Easterly
Tributary of - Indian Creek
Bottom types - Sand with considerable detritus, silt, muck
Fishery - Forage species
Access - Two road crossings
Remarks - Considerable ditching; one mile public frontage; 249 acres adjoining wetland

R1W

3-12
Surface acres - 0.44
Miles - 1.2
Water - Very soft, light brown color
Direction of flow - Southerly
Tributary of - Creek 10-7 (22N, R1W)
Bottom types - Gravel, little sand
Fishery - Forage species
Access - Wilderness from town road
Remarks - One mile public frontage; 11.4 acres adjoining wetland

5-11
Surface acres - 0.36
Miles - 1.5
Water - Very soft, light brown color
Direction of flow - Southwesterly
Tributary of - East fork Black River
Bottom types - Silt and detritus dominate, little sand
Fishery - Forage species
Access - Wilderness from town road
Remarks - 51.3 acres adjoining wetland; 0.4 mile public frontage

7-1
Surface acres - 0.51
Miles - 1.4
Water - Very soft, light brown color
Direction of flow - Northeasterly
Tributary of - East fork Black River
Bottom types - Gravel and sand dominate, little silt
Fishery - Forage species
Access - E. Fk. Black River, wilderness from town road
Remarks - Two miles public frontage; 20.9 acres adjoining wetland

7-4
Surface acres - 0.30
Miles - 1.0
Water - Dark brown color, very soft
Direction of flow - Northwesterly
Tributary of - Creek 7-1 (T22N, R1W)
Bottom types - Sand and gravel dominate with silt present
Fishery - Forage species
Access - Wilderness from town road
Remarks - Two miles public frontage; 41.8 acres adjoining wetland

9-4
Surface acres - 1.49
Miles - 3.1
Water - Dark brown color, very soft
Direction of flow - Northerly
Tributary of - East fork Black River
Bottom types - Gravel dominant with sand and rubble present
Fishery - Forage species
Access - Two road crossings
Remarks - One mile public frontage; 228 acres adjoining wetland

10-7
Surface acres - 2.61
Miles - 3.31
Water - Very soft, medium brown color
Direction of flow - Southwesterly
Tributary of - East fork Black River
Bottom types - Gravel and sand dominant, little rubble and boulder
Fishery - Forage species
Access - One road crossing
Remarks - 224.2 acres adjoining wetland; 4.6 miles public frontage

11-10
Surface acres - 1.67
Miles - 2.3
Water - Dark brown color, very soft
Direction of flow - Northerly
Tributary of - East fork Black River
Bottom types - Silt and detritus dominant
Fishery - Forage species
Access - Wilderness from town road
Remarks - 32.3 acres adjoining wetland; 3.6 miles public frontage

11-15
Surface acres - 3.39
Miles - 3.5
Water - Medium brown color, very soft
Direction of flow - Southerly
Tributary of - East fork Black River
Bottom types - Gravel with some sand, little rubble
Fishery - Forage species
Access - One road crossing
Remarks - Six miles public frontage; 174.8 acres adjoining wetland

12-5
Surface acres - 0.28
Miles - 1.15
Water - Very soft, medium brown color
Direction of flow - Southwesterly
Tributary of - Creek 11-15 (T22N-R1W)
Bottom types - Muck and detritus dominant, little sand
Fishery - Forage species
Access - One road crossing
Remarks - 45.6 miles adjoining wetland; 2.3 miles public frontage

13-7b
Surface acres - 5.23
Miles - 3.6
Water - Medium brown color, very soft
Direction of flow - Southwesterly
Tributary of - East fork Black River
Bottom types - Silt and detritus
Fishery - Forage species
Access - One road crossing
Remarks - 6.2 miles public frontage; 47 acres adjoining wetland

24-3b
Surface acres - 1.69
Miles - 2.8
Water - Dark brown color, very soft
Direction of flow - Northerly
Tributary of - East fork Black River
Bottom types - Gravel and sand predominate
Fishery - Forage species
Access - One road crossing
Remarks - Over half of stream ditched; 3.85 miles public frontage; 500 acres adjoining wetland

24-13
Surface acres - 2.84
Miles - 3.1
Water - Light brown color, very soft
Direction of flow - Northwesterly
Tributary of - East fork Black River
Bottom types - Sand and silt dominant with about equal amounts gravel and detritus
Fishery - Forage species dominate
Access - Three road crossings
Remarks - One mile public frontage; 279 acres adjoining wetland

Cleveland Township, T24N, R5W

2-5a (Schoolhouse Creek)

Surface acres - 1.53
Miles - 2.8
Gradient - 16 feet per mile
Water - Very soft, clear
Direction of flow - Northeasterly
Tributary of - Black Creek, Eau Claire Co.
Bottom types - Sand and silt dominant, little gravel
Fishery - Type two trout stream (brook and brown trout)
Access - Eight road crossings
Remarks - 70 acres adjoining wetland; much of stream open during winter aerial groundwater survey of about 1963.

2-5b
Surface acres - 0.84
Miles - 2.3
Gradient - 18 feet per mile
Water - Clear, very soft
Direction of flow - Northerly
Tributary of - Creek 2-5a (T24N, R5W)
Bottom types - Sand, little silt and gravel.
Fishery - Type two, brook and brown trout
Access - Three road crossings
Remarks - Open water near upper end during winter groundwater survey (about 1963)

10-6
Surface acres - 0.21
Miles - 0.6
Water - Clear, very soft
Direction of flow - Northerly
Tributary of - Creek 2-5a (T24N, R5W)
Bottom types - Silt dominant, detritus
Fishery - Brook trout, type two trout stream
Access - One road crossing
Remarks - Entire stream open during winter aerial groundwater survey of about 1963.

25-1
Surface acres - 0.24
Miles - 0.8
Gradient - 36 feet per mile
Water - Clear, very soft
Direction of flow - Easterly
Tributary of - East fork Halls Creek (Clark County)
Bottom types - Sand, little silt
Fishery - Forage species
Access - One road crossing
Remarks - Farm pond near upper end on intermittent portion of stream

Curran Township, T22N, R6W

1-2
Surface acres - 0.18
Miles - 1.5
Gradient - 53.3 feet per mile
Water - Light brown color, medium hard
Direction of flow - Southerly
Tributary of - Fall Coulee Creek
Bottom types, Sand dominant, Considerable silt
Fishery - Forage species
Access - One road crossing

1-3
Surface acres - 0.12
Miles - 1.0
Gradient - 26.7 feet per mile
Water - Clear, soft
Direction of flow - Easterly
Tributary of - Fall Coulee Creek
Tottom types - Sand, little silt and detritus
Fishery - Forage species
Access - None

1-16
Surface acres - 0.18
Miles - 1.0
Gradient - 40 feet per mile
Water - Light brown color, medium hard
Direction of flow - Southerly
Tributary of - Fall Coulee Creek
Bottom types - Sand, some silt, little detritus
Fishery - Forage species
Access - Three road crossings

10-12
Surface acres - 0.22
Miles - 0.9
Gradient - 50 feet per mile
Water - Light brown color, soft
Direction of flow - Westerly
Tributary of - Curran Coulee Creek
Bottom types - Sand, some silt, little gravel
Fishery - Forage species
Access - None

12-4
Surface acres - 0.73
Miles - 1.5
Gradient - 40 feet per mile
Water - Light brown color, medium hard
Direction of flow - Southeasterly
Tributary of - Fall Coulee Creek
Bottom types - Silt
Fishery - Forage species
Access - One road crossing

15-12
Surface acres - 0.2
Miles - 0.5
Water - Clear, very soft
Direction of flow - Southerly
Tributary of - Curran Coulee Creek
Bottom types - Sand and silt dominant, some gravel, little clay, rubble, boulder
Fishery - Forage species
Access - Unimproved from town road

21-1
Surface acres - 0.12
Miles - 1.0
Gradient - 40 feet per mile
Water - Clear, soft
Direction of flow - Southeasterly
Tributary of - Creek 22-5 (T22N, R6W)
Bottom types - Silt, lesser amounts of clay and sand, trace rubble
Fishery - Forage species
Access - None

21-4
Surface acres - 0.18
Miles - 1.0
Gradient - 50 feet per mile
Water - Clear, soft
Direction of flow - Easterly
Tributary of - Creek 22-5 (T22N, R6W)
Bottom types - Sand, little gravel, silt, clay
Fishery - Forage species
Access - Two road crossings

22-5
Surface acres - 4.55
Miles - 1.5
Gradient - 44.4 feet per mile
Water - Clear, soft
Direction of flow - Northeasterly
Tributary of - Curran Coulee Creek
Bottom types - Silt, some sand and detritus
Fishery - Forage species
Access - Two road crossings

30-7
Surface acres - 0.36
Miles - 1.0
Gradient - 50 feet per mile
Water - Clear, soft
Direction of flow - Southwesterly
Tributary of - Vosse Coulee Creek (Tremp. Co.)
Bottom types - Sand, little gravel and silt
Fishery - Brook trout, type two stream
Access - None

Franklin Township, T20N, R6W

7-10
Surface acres - 0.24
Miles - 0.8
Gradient - 100 feet per mile
Water - Clear, medium hard
Direction of flow - Southerly
Tributary of - Beaver Creek (N. Br. Beaver Cr.), Trempealeau Co.
Bottom types - Gravel and sand dominant, some silt, little rubble and clay
Fishery - Type two trout water
Access - One road crossing

9-13
Surface acres - 0.25
Miles - 1.4
Gradient - 80 feet per mile
Water - Clear, medium hard
Direction of flow - Southerly
Tributary of - Beaver Creek (N. Br. Beaver Cr.)
Bottom types - Sand, little silt, gravel
Fishery - Forage species dominant
Access - Beaver Creek

10-10
Surface acres - 0.24
Miles - 1.0
Gradient - 30 feet per mile
Water - Clear, soft
Direction of flow - Northwesterly
Tributary of - Beaver Creek (N. Br. Beaver Cr.)
Bottom types - Sand, little silt, gravel
Fishery - Forage species dominate
Access - One road crossing

17-2
Surface acres - 0.68
Miles - 1.6
Gradient - 50 feet per mile
Water - Clear, medium hard
Direction of flow - Northerly
Tributary of - Beaver Cr. (N. Br. Beaver Cr.)
Bottom types - Sand, little silt
Fishery - Forage species dominate
Access - One road crossing

17-5
Surface acres - 0.64
Miles - 1.5
Gradient - 40 feet per mile
Water - Clear, medium hard
Direction of flow - Southerly
Tributary of - Beaver Cr.
(N. Br. Beaver Cr.)
Bottom types - Sand, little gravel, clay, silt
Fishery - Forage species dominant
Access - Two road crossings
Remarks - Farm pond on stream; two small open areas observed during winter aerial groundwater survey about 1963

18-4
Surface acres - 0.73
Miles - 1.5
Gradient - 50 feet per mile
Water - Clear, medium hard
Direction of flow - Northerly
Tributary of - Beaver Cr.
(N. Br. Beaver Cr.)
Bottom types - Sand, little silt and clay
Fishery - Forage species dominant
Access - One road crossing

18-10
Surface acres - 0.15
Miles - 1.6
Gradient - 40 feet per mile
Water - Clear, medium hard
Direction of flow - Northwesterly
Tributary of - Beaver Cr.
(N. Br. Beaver Cr.), Trempealeau Co.
Bottom types - Sand and silt
Fishery - Forage species dominant
Access - One road crossing

25-5
Surface acres - 0.29
Miles - 1.2
Gradient - 33.3 feet per mile
Water - Clear, medium hard
Direction of flow - Southeasterly
Tributary of - Douglas Cr.
(Shake Hollow Cr.)
Bottom types - Sand, some silt
Fishery - Type two brook trout water; forage species dominant
Access - Two road crossings

Garden Valley Township, T23N, R5W

12-6
Surface acres - 3.2
Miles - 3.3
Gradient - 20 feet per mile
Water - Clear, very soft
Direction of flow - Southeasterly
Tributary of - Halls (Stockwell) Creek
Bottom types - Sand, some silt, little gravel, sand, rubble
Fishery - Type two trout water, mostly brook trout, some brown trout
Access - Three road crossings
Game - Teal duck nesting and light use by migrant puddle ducks
Remarks - Portions of stream open during winter aerial groundwater survey of about 1963; 0.6 mile public frontage

20-16
Surface acres - 0.29
Miles - 1.6
Gradient - 60 feet per mile
Water - Clear, soft
Direction of flow - Southeasterly
Tributary of - North fork Trempealeau River
Bottom types - Silt
Fishery - Forage species
Access - Unimproved
Remarks - 0.1 mile public frontage

33-6
Surface acres - 0.12
Miles - 0.5
Gradient - 42 feet per mile
Water - Clear, soft
Direction of flow - Easterly
Tributary of - North Branch Trempealeau River
Bottom types - Silt, some sand, little gravel, detritus
Fishery - Forage species
Access - No. Br. Trempealeau River
Remarks - 0.6 mile public frontage

Garfield Township, T24N, R6W

19-16
Surface acres - 1.0
Miles - 3.0
Gradient - 36.4 feet per mile
Water - Clear, very soft
Direction of flow - Northerly
Tributary of - So. fork Buffalo (Beef) River
Bottom types - Sand, little silt
Fishery - Type two brook trout water
Access - Two road crossings

22-11 (Jermstad Creek)
Surface acres - 0.67
Miles - 2.8
Gradient - 27.3 feet per mile
Water - Clear, very soft
Direction of flow - Northwesterly
Tributary of - So. fork Buffalo (Beef) River
Bottom types - Sand, little silt
Fishery - Type two brook trout water
Access - Two road crossings

23-11
Surface acres - 0.24
Miles - 1.0
Gradient - 33.3 feet per mile
Water,- Light brown color, very soft
Direction of flow - Southerly
Tributary of - So. fork Buffalo (Beef) River
Bottom types - Sand and silt
Fishery - Primarily forage species, few brook trout
Access - So. fork Buffalo River

29-1
Surface acres - 1.19
Miles - 2.8
Gradient - 25 feet per mile
Water - Clear, very soft
Direction of flow - Northwesterly
Tributary of - So. fork Buffalo (Beef) River
Bottom types - Silt, considerable sand, little detritus
Fishery - Type two brook trout water
Access - Four road crossings

Hixton Township, T22N, R5W

26-7
Surface acres - 0.65
Miles - 1.8
Gradient - 23.5 feet per mile
Water - Clear, very soft
Direction of flow - Northerly
Tributary of - Tank Creek
Bottom types - Sand, some clay and silt, little detritus
Fishery - Forage species dominate
Access - One road crossing

Irving Township, T20N, R4, 5W

R4W

17-8
Surface acres - 0.47
Miles - 1.3
Gradient - 87.5 feet per mile
Water - Clear, hard
Direction of flow - Southeasterly
Tributary of - Black River
Bottom types - Sand, little silt, gravel
Fishery - Forage species
Access - One road crossing

29-10
Surface acres - 1.01
Miles - 1.4
Gradient - 45.4 feet per mile
Water - Clear, medium hard
Direction of flow - Westerly
Tributary of - Black River
Bottom types - Sand, little gravel
Fishery - Forage species
Access - Black River

R5W

10-2
Surface acres - 2.29
Miles - 2.1
Gradient - 77.8 feet per mile
Water - Clear, soft
Direction of flow - Southeasterly
Tributary of - Trout Run Creek
Bottom types - Sand dominant, some gravel, little silt
Fishery - Type three brook trout water
Access - One road crossing
Remarks - Water backed up at lower end from dam on Trout Run Creek; land near headwaters and on small headwater tributary purchased by Wis. Conservation Division and fish rearing ponds are being constructed; open water was observed at the upper end of the stream during the winter aerial groundwater survey (about 1963).

11-14 (East Branch Trout Run Creek)
Surface acres - 2.18
Miles - 3.0
Gradient - 26.7 feet per mile
Water - Clear, medium hard
Direction of flow - Southerly
Bottom types - Sand dominant, some silt, little clay, detritus, gravel
Fishery - Type three brook trout water
Access - One road crossing
Remarks - 1.4 miles public frontage; county constructed dam near lower end to protect roadway from erosion; open water was observed in about one-half the stream, middle portion, during the winter aerial groundwater survey (about 1963).

16-15
Surface acres - 0.24
Miles - 1.0
Gradient - 66.7 feet per mile
Water - Clear, soft
Direction of flow - Southerly
Tributary of - Black Slough Creek
Bottom types - Clay, little silt, sand
Fishery - Forage species
Access - One road crossing
Remarks - Old ditching

30-15(North Branch Shake Hollow Creek)
Surface acres - 3.03
Miles - 3.5
Gradient - 45.1 feet per mile
Water - Clear, medium hard
Direction of flow - Southerly
Tributary of - Douglas (Shake Hollow) Cr.
Bottom types - Sand dominant, some silt, little gravel, clay
Fishery - Type two brook trout water
Access - Three road crossings
Remarks - Open water observed in about one-half the stream during the winter aerial groundwater survey (about 1963)

31-4a (Woodward Creek)
Surface acres - 1.03
Miles - 1.7
Gradient - 35.6 feet per mile
Water - Clear, medium hard
Direction of flow - Southerly
Tributary of - Douglas (Shake Hollow) Cr.
Bottom types - Sand and silt
Fishery - Forage species
Access - Four road crossings

31-4d
Surface acres - 1.00
Miles - 1.5
Gradient - 50 feet per mile
Water - Clear, medium hard
Direction of flow - Easterly
Tributary of - Douglas (Shake Hollow) Cr.
Bottom types - Sand, little silt, gravel
Fishery - Forage species
Access - Douglas Creek

32-10
Surface acres - 0.15
Miles - 0.8
Gradient - 71.4 feet per mile
Water - Clear, hard
Direction of flow - Easterly
Tributary of - Douglas (Shake Hollow) Cr.
Bottom types - Silt, some sand
Fishery - Forage species
Access - Douglas Creek

Knapp Township, T21N, R1W

19-6
Surface acres - 0.14
Miles - 0.8
Water - Dark brown color, very soft
Direction of flow - Northwesterly
Tributary of - Townline Creek
Bottom types - Sand, some silt
Fishery - Forage species
Access - Wilderness from town roads
Remarks - 0.5 mile public frontage; 380 acres adjoining wetland

28-2
Surface acres - 2.40
Miles - 3.3
Water - Dark brown, very soft
Direction of flow - Northerly
Tributary of - McKenna Creek
Bottom types - Sand, some silt, little detritus
Fishery - Forage species dominant
Access - Wilderness from town road
Remarks - Five dams on stream; 0.58 mile public frontage; 255 acres adjoining wetland

Komensky Township, T22N, R2, 3W

R2W

18-10
Surface acres - 0.74
Miles - 1.53
Water - Dark brown, very soft
Direction of flow - Southwesterly
Tributary of - Mollies Creek
Bottom types - Sand dominant, some silt, little detritus, gravel
Fishery - Forage species
Access - One road crossing
Remarks - Suspect stream becomes intermittent from time to time; 1.1 miles public frontage; 60.8 acres adjoining wetland

29-2
Surface acres - 3.49
Miles - 3.8
Water - Medium brown color, very soft
Direction of flow - Northwesterly
Tributary of - Morrison Creek
Bottom types - Sand and muck dominant, little silt
Fishery - Forage species dominate
Access - Two road crossings
Remarks - Two dams on stream; 6.1 miles public frontage; mostly ditched; 245 acres adjoining wetland

29-8
Surface acres - 7.13
Miles - 4.9
Water - Medium brown color, very soft
Direction of flow - Northwesterly
Tributary of - Morrison Creek
Bottom types - Sand and detritus dominant, some muck silt
Fishery - Forage species dominant
Access - Two road crossings
Remarks - Four dams on stream; 9.8 miles public frontage; 65 acres adjoining wetland

R3W

2-9
Surface acres - 0.10
Miles - 0.8
Water - Dark brown color, very soft
Direction of flow - Northwesterly
Tributary of - Black River via Arbutus Lake
Bottom types - About equal amounts of sand and silt
Fishery - Forage species
Access - One road crossing
Remarks - 1.6 miles public frontage

3-16
Surface acres - 0.12
Miles - 0.5
Water - Medium brown color, very soft
Direction of flow - Westerly
Tributary of - Black River
Bottom types - Sand, little silt and gravel
Fishery - Forage species
Access - One road crossing
Remarks - 11.4 acres adjoining wetland

14-12
Surface acres - 1.16
Miles - 1.92
Water - Very soft, light brown colored
Direction of flow - Southerly
Tributary of - Mollies Creek
Bottom types - Sand dominant, also silt and a little detritus
Fishery - Forage species
Access - One road crossing
Remarks - 85.5 acres adjoining wetland; 2.76 miles public frontage.

24-12
Surface acres - 0.15
Miles - 0.5
Water - Very soft, medium brown color
Direction of flow - Northerly
Tributary of - Hay Creek
Bottom types - Sand, little silt, detritus, gravel
Fishery - Forage species
Access - One road crossing
Remarks - One mile public frontage; stream heads in Dry Land Flowage which has only a spillway outlet structure; stream may become intermittent when flowage level drops.

29-10 (Clear Creek)
Surface acres - 0.79
Miles - 1.0
Water - Clear, very soft
Direction of flow - Northwesterly
Tributary of - Black River
Bottom types - Sand and silt dominant, considerable detritus, little gravel, clay
Fishery - Type one brook trout water
Access - Black River, wilderness from town road
Game - Beaver present mallard and wood duck nesting, light use by migrant puddle ducks
Remarks - Two miles public frontage; entire stream had open water during winter aerial groundwater survey (about 1963)

Manchester Township, T20N, R3, 4W

R3W

19-10 (Johnson Creek)
Surface acres - 0.51
Miles - 1.2
Gradient - 40 feet per mile
Water - Medium brown color, very soft
Direction of flow - Southerly
Tributary of - Robinson Creek
Bottom types - Sand, little silt
Fishery - Type one brown trout water
Access - Robisnson Creek, also from driveable trail
Game - Beaver present, light use by migrant puddle ducks
Remarks - 91 acres adjoining wetland; 2.4 miles public frontage

19-16 (Jacobs Creek)
Surface acres - 0.25
Miles - 0.7
Gradient - 40 feet per mile
Water - Very soft, clear
Direction of flow - Southwesterly
Tributary of - Robinson Creek
Bottom types - Sand, little silt, gravel
Fishery - Type one brown trout water
Access - Wilderness town road, Robinson Creek
Remarks - 94 acres adjoining wetland; 0.1 mile public frontage

R4W

5-14
Surface acres - 0.51
Miles - 0.9
Water - Very soft, clear
Direction of flow - Southwesterly
Tributary of - Black River
Bottom types - Silt dominant, considerable sand, little muck
Fishery - Forage species
Access - One road crossing
Game - Light use by migrant puddle ducks
Remarks - 12 acres adjoining wetland; one mile public frontage

22-3
Surface acres - 0.59
Miles - 1.4
Gradient - 60 feet per mile
Water - Soft, clear
Direction of flow - Northerly
Tributary of - Robinson Creek
Bottom types - Sand, little gravel, clay, silt
Fishery - Forage species
Access - One road crossing

22-4
Surface acres - 0.47
Miles - 1.3
Gradient - 48 feet per mile
Water - Soft, clear
Direction of flow - Northerly
Tributary of - Robinson Creek
Bottom types - Sand, little silt and gravel
Fishery - Forage species
Access - One road crossing
Remarks - 28 acres adjoining wetland

Melrose Township, T19N, R5, 6W

R5W

20-2
Surface acres - 1.45
Miles - 2.4
Gradient - 45.1 feet per mile
Water - Hard, clear
Direction of flow - Southeasterly
Tributary of - Black River
Bottom types - Sand, little silt, gravel
Fishery - Forage species
Access - Two road crossings

R6W

25-11
Surface acres - 0.59
Miles - 0.7
Gradient - 80 feet per mile
Water - Hard, clear
Direction of flow - Southerly
Tributary of - Black River
Bottom types - Sand
Fishery - Forage species
Access - Black River

Millston Township, T20N, R2W

17-14
Surface acres - 0.36
Miles - 1.5
Gradient - 25 feet per mile
Water - Very soft, dark brown color
Direction of flow - Southwesterly
Tributary of - Pigeon Creek
Bottom types - Sand and silt with former little more dominant
Fishery - Forage species
Access - Unimproved from town road
Remarks - Three miles public frontage; 55 miles adjoining wetland

23-13 (Beltz Creek)
Surface acres - 1.64
Miles - 2.3
Gradient - 31.6 feet per mile
Water - Very soft, clear
Direction of flow - Southwesterly
Tributary of - Robinson Creek
Bottom types - Sand, little silt
Fishery - Type two brook trout water
Access - One road crossing
Game - Wood duck nesting and light use by migrant puddle ducks
Remarks - Three miles public frontage; farm pond near headwaters; two cranberry flowages near lower end; 510 acres adjoining wetland

28-3
Surface acres - 0.24
Miles - 1.0
Gradient - 25 feet per mile
Water - Very soft, clear
Direction of flow - Northerly
Tributary of - Rudes (Rudds, Sawdust) Creek
Bottom types - About equal amounts of silt and detritus
Fishery - Forage species
Access - One road crossing
Remarks - Two miles public frontage

North Bend Township, T19N, R6W

5-11
Surface acres - 0.8
Miles - 2.2
Gradient - 45.7 feet per mile
Water - Medium hard, clear
Direction of flow - Southerly
Tributary of - So. branch Beaver Creek
Bottom types - Sand, little gravel, silt, clay
Fishery - Forage species
Access - Two road crossings
Game - Beaver present, light use by migrant puddle ducks
Remarks - 0.2 mile public frontage

20-11
Surface acres - 0.34
Miles - 0.8
Gradient - 66.7 feet per mile
Water - Hard, clear
Direction of flow - Southerly
Tributary of - Wilson Creek
Bottom types - Sand, little silt, gravel
Fishery - Forage species
Access - None

32-4
Surface acres - 0.8
Miles - 1.1
Water - Medium hard, clear
Direction of flow - Northerly
Tributary of - Black River
Bottom types - Sand, little silt
Fishery - Forage species
Access - One road crossing
Game - Light use by migrant puddle ducks

Northfield Township, T23N, R6W

9-9
Surface acres - 0.32
Miles - 1.3
Gradient - 40 feet per mile
Water - Soft, light brown
Direction of flow - Southwesterly
Tributary of - Beaver Creek
Bottom types - Sand and silt predominate, also little clay and gravel
Fishery - Forage species
Access - One road crossing
Remarks - 0.6 mile public frontage

12-3
Surface acres - 0.42
Miles - 1.4
Gradient - 53.3 feet per mile
Water - Clear, soft
Direction of flow - Southeasterly
Tributary of - Pigeon Creek
Bottom types - Sand dominant, some silt, little detritus
Fishery - Forage species
Access - One road crossing

16-7
Surface acres - 0.36
Miles - 1.5
Gradient - 46.1 feet per mile
Water - Light brown, medium hard
Direction of flow - Southeasterly
Tributary of - Beaver Creek
Bottom types - Sand dominant, some silt, little clay
Fishery - Forage species
Access - Two road crossings

19-2
Surface acres - 0.09
Miles - 0.5
Water - Light brown, medium hard
Direction of flow - Southeasterly
Tributary of - Timber Creek
Bottom types - Sand, some silt
Fishery - Forage species
Access - One road crossing

22-8bb
Surface acres - 0.36
Miles - 1.0
Gradient - 50 feet per mile
Water - Clear, soft
Direction of flow - Southerly
Tributary of - Pigeon Creek
Bottom types - Clay dominant, some sand, little silt, detritus, gravel
Fishery - Forage species
Access - Pigeon Creek

22-8bc
Surface acres - 0.44
Miles - 1.8
Gradient - 48 feet per mile
Water - Light brown, hard
Direction of flow - Northwesterly
Tributary of - Pigeon Creek
Bottom types - Sand, little silt
Fishery - Forage species
Access - One road creossing

28-3
Surface acres - 0.15
Miles - 0.6
Gradient - 80 feet per mile
Water - Light brown, medium hard
Direction of flow - Northerly
Tributary of - Sands Creek
Bottom types - Silt, little sand
Fishery - Forage species
Access - Two road crossings

32-10
Surface acres - 0.27
Miles - 1.1
Gradient - 40 feet per mile
Water - Light brown, soft
Direction of flow - Northwesterly
Triburtary of - Schermerhorn Creek
Bottom types - Sand slightly predominant with about equal amounts of silt and detritus
Fishery - Forage species
Access - Two road crossings

Springfield Township, T2lN, R6W

23-1
Surface acres - 1.19
Miles - 2.8
Gradient - 33.3 feet per mile
Water - Clear, soft
Direction of flow - Northerly
Tributary of - French Creek
Bottom types - Sand, about equal amounts of gravel and silt, little clay
Fishery - Forage species
Access - One road crossing
Remarks - 55 acres adjoining wetland; open water noted near headwaters during winter aerial groundwater survey (about 1963).

24-4
Surface acres - 3.27
Miles - 4.5
Gradient - 32.3 feet per mile
Water - Clear, medium hard
Direction of flow - Northwesterly
Tributary of - French Creek
Bottom types - Silt, some sand
Fishery - Forage species
Access - Two road crossings
Remarks - 37 acres adjoining wetland

25-10
Surface acres - 0.24
Miles - 1.3
Gradient - 80 feet per mile
Water - Clear, medium hard
Direction of flow - Northeasterly
Tributary of - Creek 23-1 (T2lN-R6W)
Bottom types - Silt dominant, little sand and gravel
Fishery - Forage species
Access - One road crossing

ANALYSIS OF INVENTORY DATA

The following information, comments, tables, and maps have been compiled from all data presently available for waters, including a 1967 field inventory. Supplemental information was obtained from publications listed in the bibliography.

In order to provide a tabular summary of the physical and chemical characteristics of each body of water, two appendices are included. They contain specific information. The comments that follow evaluate some of the items and data presented in the appendices.

Quantitative Aspects

The total water surface in the county, excluding drainage ditches, is 5,439.5 acres. Of this total, 3,162.7 acres are included in 142 lakes and 2,276.8 acres in 204 streams.

Information concerning lakes by size classes is given in Table 3. Of the 142 lakes in Jackson County, 44 have areas of less than five surface acres and 100, or 70 percent, have less than 20 surface acres. Thirty-four have areas ranging from 20 to 99 acres and eight have 100 or more surface acres. About 82 percent have depths less than 10 feet and most of these are subject to winterkill conditions. Two have depths exceeding 19 feet (Table 4). Shallowness is a reflection of both their origin and intended function. Sand and detritus are the principal bottom types in the shoal areas of Jackson County lakes with sand being dominant in lakes of all but the 5 to 10 acres and the 20 to 50 acres size classes (Table 5). The shoreline development factor (S.D.F.) for all lakes ranges from 1.09 to 7.46 and averages 2.21. The average S.D.F. for the 15 landlocked lakes is 1.95 while it is 2.26 for the impounded waters.

Excluding drainage ditches, the total stream length in the county amounts to 668 linear miles of which 239.75 miles, about 36 percent of the total mileage, is considered trout water. Frontage on both sides of the streams in Jackson County totals 1,330.6 miles while the lake frontage is 187.8 miles. Although stream frontage is over seven times that of lake frontage, 177 streams, nearly 87 percent of the total number, have average widths of less than 10 feet. These small streams have approximately 59 percent of the total stream frontage, yet include only 11 percent of the total stream acreage. Table 2 illustrates stream length, acreage, and public frontage according to average stream width classes. Streams with average widths of 10 feet or greater are usually more desirable for recreational purposes. There are 27 such streams, or 13 percent of the total number, in the county. The two largest streams in the county are the Black River and the east fork of the Black River, Together, they comprise 11 percent of the total stream length and 67 percent of the total stream acreage.

Water Quality

As part of the collection of data for the inventory, measurements of total alkalinity, pH, specific conductance, water color, and transparency information were taken for each lake and stream so that evaluations of water quality could be made.

TABLE 2. Size classes of Jackson County streams.

AV. WIDTH (FEET)	NO.	PERCENT OF TOTAL NO.	LENGTH (MILES)	PERCENT OF TOTAL LENGTH	AREA (ACRES)	PERCENT OF TOTAL AREA	PUBLIC FRONTAGE* (MILES)	PERCENT OF TOTAL PUBLIC FRONTAGE
Less than 10	177	87	392.0	59	255.1	11	166.2	48
10 to 20	17	8	98.5	15	154.5	7	73.2	21
20 to 40	8	4	102.6	15	352.1	15	67.3	20
40 and wider	2	1	74.9	11	1,515.1	67	36.6	11
Totals	**204**		**668.0**		**2,276.8**		**343.3**	

* Does not include road crossings

TABLE 3. Size classes of Jackson County lakes.

SIZE CLASS (ACRES)	NO.	PERCENT OF TOTAL NO.	AREA (ACRES)	PERCENT OF TOTAL AREA	SHORE-LINE (MILES)	PERCENT OF TOTAL SHORELINE	PUBLIC FRONTAGE (MILES)	PERCENT TOTAL PUBLIC FRONTAGE	WITH BOAT LAUNCHING & PARKING	WITH BOAT LAUNCHING W/O PARKING	WITH PARKING W/O BOAT LAUNCHING	WITH MULTIPLE USE ACCESS	WITH UNIMPROVED ACCESS	WITH WIL-DERNESS ACCESS	WITH NAVIGABLE WATER ACCESS	WITHOUT PUBLIC ACCESS
Less than 5	44	31	84.9	3	15.3	8	3.855[1/]	6			1		8*	3	6	28***
5 to 10	25	17	174.2	6	21.5	11	8.26*	14			2		4*	6	5	10
10 to 20	31	22	438.9	14	32.9	18	13.44*	23			5		8*	5	11	9
20 to 50	29	20	867.3	27	49.6	26	10.95*	19	1	1	2	1	8*	4	10	9
50 to 100	5	4	392.0	12	16.6	9	2.70*	5	1				1*	2	3	2
100 to 200	7	5	1,002.6	32	37.0	20	7.11	12	1				1		2	4**
200 to 500	1	1	202.8	6	14.9	8	12.7	21	1						1	
Totals	**142**		**3,162.7**		**187.8**		**59.015**		**4**	**1**	**10**	**1**	**30**	**20**	**38**	**62**

1/ Road rights-of-way of 20 feet not included in total.

* Road rights-of-way - all or in part without parking. Includes 0.105 mi. and 4 waters in less than 5 size class, 0.28 mi. and 2 waters in 5 to 10 size class, 0.77 mi. and 5 waters in 10 to 20 size class, 2.00 mi. and 7 waters in 20 to 50 size class, and 0.02 mi. and 1 water in 50 to 100 size class

** Seventeen Flowage 9.3 miles state-owned frontage, and Lake 14-14 (T21N-R2W) with 0.04 mile of state-owned frontage, but both within closed area and are not open to public use.

*** One pond on private land, but public right to trespass by state agreement with owner. It has 0.6 mile of shoreline.

Table 4. Depth classes of Jackson County lakes

Maximum Depth Class (feet)	No. Lakes	Percent of Total	Area (acres)	Percent of Total	Shoreline (miles)	Percent of Total
Less than 5	40	28	625.8	20	42.1	22
5 to 10	77	54	1,679.5	53	91.1	49
10 to 15	20	14	438.5	14	23.0	12
15 to 20	3	2	105.1	3	10.3	6
20 to 25	0	0	-	-	-	-
25 and deeper	2	2	313.8	10	21.3	11
Totals	142		3,162.7		187.8	

Table 5. Littoral composition of Jackson County lakes according to size class.

Size Class (acres)	No. Lakes	Area (acres)	Shoreline (miles)	Percent Bottom Types in Littoral Zone* Sand	Gravel	Rock	Muck	Clay	Detritus	Silt
Less than 5	44	84.9	15.3	38			20	3	34	5
5 to 10	25	174.2	21.5	38		1	12	1	42	6
10 to 20	31	438.9	32.9	39			25		28	8
20 to 50	29	867.3	49.6	36			19		36	9
50 to 100	4	299.1	14.8	46			30		16	8
100 to 200	5	700.7	32.8	45	4	14	21		11	5
200 to 500	1	202.8	14.9	40					20	40
Averages				40.3	0.6	2.1	18.1	0.6	26.7	11.6

* Percent of littoral zone bottom types based on field observations and estimates rather than actual measurements.

Total alkalinity is commonly used as an index of fertility. Based on Moyle's classification values, the streams in general have a significantly higher index of fertility than do the lakes. This is easily understood when it is noted that the majority of the lakes are located in the eastern half of the county where sandy soils and peat predominate. These soils are rather low in fertility and the subsoils are periodically saturated with high groundwater. The fertility of these soils is reflected in fertility of the waters. Table 6 provides detailed chemical analysis data of two Jackson County lakes. Figure 5 shows the water fertility in the county and Tables 7 and 8 illustrate the classification, fertility, and productivity of Jackson County lakes and streams according to size classes. About 93 percent of the lakes and 53 percent of the streams are classed as having low fertility, 6 percent of the lakes and 21 percent of the streams as low to medium, 1 percent of the lakes and 19 percent of the streams as medium to high, and no lakes and 19 percent of the streams as having high fertility.

The pH (hydrogen concentration) ranges from 4.2 to 9.2 for lakes and from 4.9 to 8.6 for streams. One-half of the lakes and 41 of the streams are acid (a pH of less than 7.0).

Specific conductance measures the total concentration of dissolved electrolytes in water and the higher the conductance, the greater the fertility and productivity of the water. The mean specific conductance for Jackson County lakes, measured in micromhos at 77 degrees Fahrenheit, was 37 and ranged from 11 to 210. For streams, the mean was 106.5 and ranged from 18 to 510.

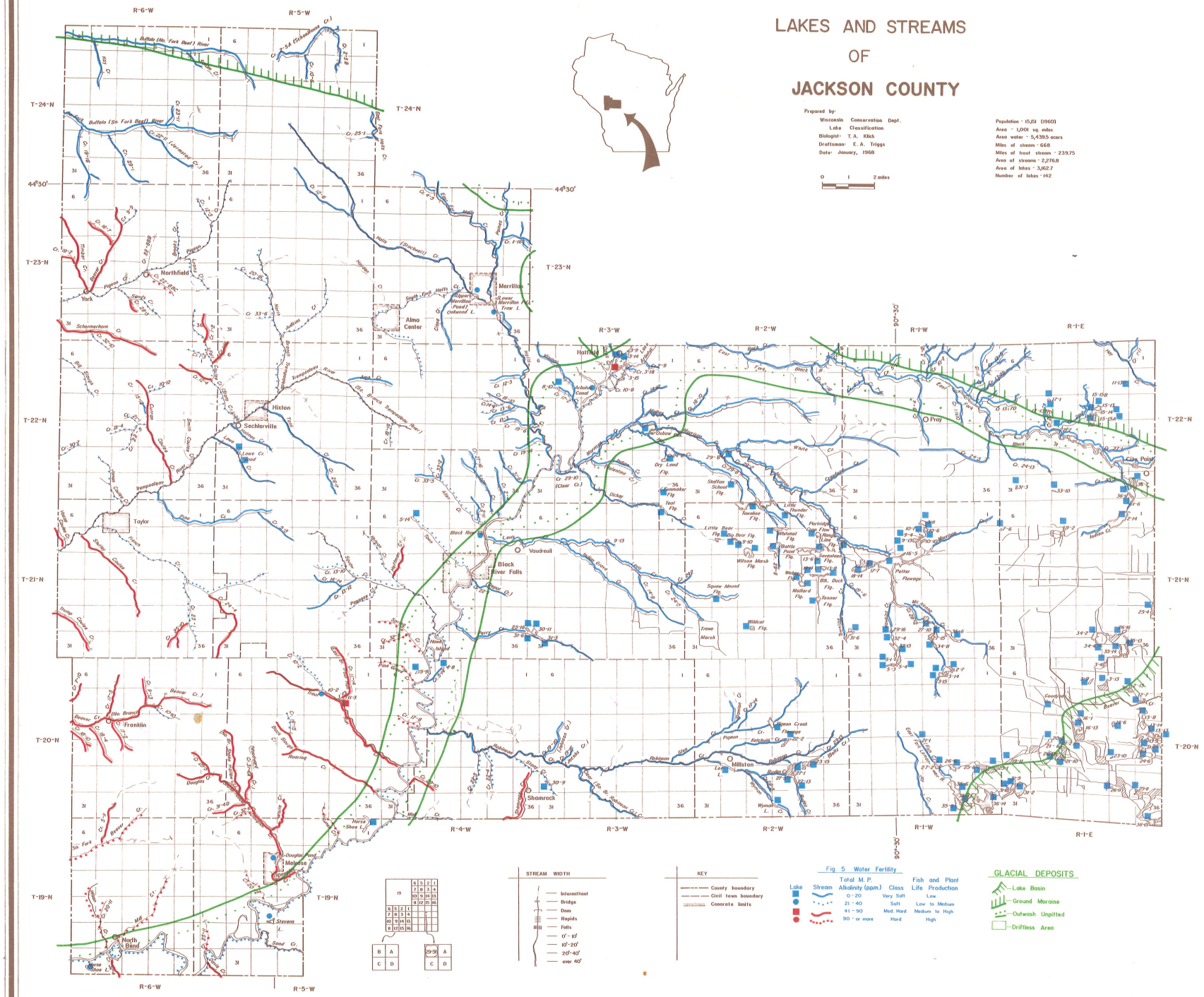
Water color ranged from colorless (clear) to dark brown for Jackson County lakes and streams. The color was usually dependent upon the type and extent of the drainage. Lakes and streams draining wetland areas, for example, generally had a darker color than those draining areas of higher elevation. The secchi disk reading in lakes did not exceed 7.0 feet and only six lakes had readings of 5.0 feet or greater. This indicates low light penetration which also affects productivity. Water color of lakes and streams by size classes is shown in Table 9.

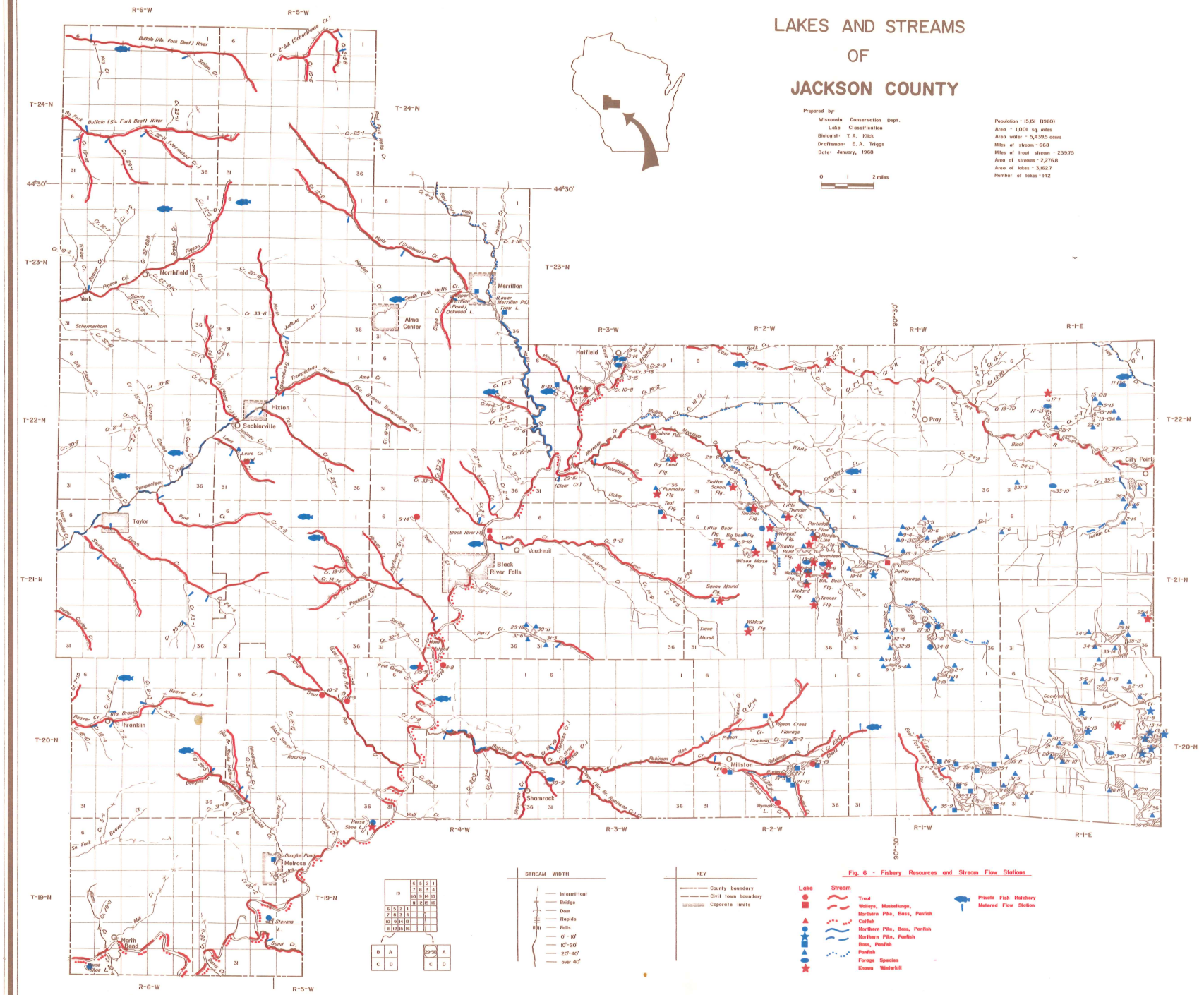
Fishery Resources

The fishery resource has been classified on the basis of predominant species and present management. In Figure 6, a color code has been used to indicate the classification of individual waters.

There are 239 miles of stream considered suitable for trout in Jackson County. This mileage includes all or part of 59 streams. All have natural trout populations, but most do not have sufficient numbers whereby fishermen can depend on natural stock for their angling pleasure. Additional opportunities for catching trout are provided by managing some of the impoundments for this species, often in conjunction with a warm water fishery.

Sport fish are scarce in most of the smaller warm water streams. All or parts of four larger streams are classed as smallmouth bass waters. Not


LAKES AND STREAMS
OF
JACKSON COUNTY
Prepared by:
Wisconsin Conservation Dept.
Lake Classification
Biologist: T. A. Klick
Draftsman: E. A. Triggs
Date: January, 1968
0 1 2 miles
Population - 15,151 (1960)
Area - 1,001 sq. miles
Area water - 5,439.5 acres
Miles of stream - 668
Miles of trout stream - 239.75
Area of streams - 2,276.8
Area of lakes - 3,162.7
Number of lakes - 142
R-6-W
R-5-W
R-4-W
R-3-W
R-2-W
R-1-W
R-1-E
T-24-N
T-23-N
T-22-N
T-21-N
T-20-N
T-19-N
44°30'
90°30'
Buffalo (No. Fork Beef) River
Buffalo (So. Fork Beef) River
Northfield
York
Hixton
Sechlerville
Taylor
Franklin
Melrose
North Bend
Merrillan
Almo Center
Hatfield
Voudreuil
Black River Falls
Millston
Shamrock
Proj
City Point
STREAM WIDTH
Intermittent
Bridge
Dam
Rapids
Falls
0' - 10'
10'-20'
20'-40'
over 40'
KEY
County boundary
Civil town boundary
Corporate limits
Fig 5 Water Fertility
Lake Stream
Total M. P. Alkalinity (ppm.)
0 - 20
21 - 40
41 - 90
90 - or more
Class
Very Soft
Soft
Med. Hard
Hard
Fish and Plant Life Production
Low
Low to Medium
Medium to High
High
GLACIAL DEPOSITS
Lake Basin
Ground Moraine
Outwash Unpitted
Driftless Area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0 1 2 miles
R-6-W
R-5-W
R-4-W
R-3-W
R-2-W
R-1-W
R-1-E
T-24-N
T-23-N
T-22-N
T-21-N
T-20-N
T-19-N
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Hixton
Sechlerville
Taylor
Hotfield
Black River Falls
Voudreuil
Pray
City Point
Franklin
Shamrock
Millston
Melrose
North Bend
Douglas Pond
Stevens L.
Horse Shoe L.
STREAM WIDTH
Intermittent
Bridge
Dam
Rapids
Falls
0'-10'
10'-20'
20'-40'
over 40'
KEY
County boundary
Civil town boundary
Corporate limits
Lake
Stream
Trout
Walleye, Muskellunge, Northern Pike, Bass, Panfish
Catfish
Northern Pike, Bass, Panfish
Northern Pike, Panfish
Bass, Panfish
Panfish
Forage Species
Known Winterkill
Private Fish Hatchery
Metered Flow Station
Fig. 6 - Fishery Resources and Stream Flow Stations

Table 6. Detailed chemical analysis of waters from two Jackson County lakes.

Lake	pH	Total Alkalinity (ppm)	Specific Conductance (mmhos at 77°F)	Cl (ppm)	SO_4 (ppm)	NH_4-N (ppm)	NO_3-N (ppm)	K-N (ppm)
Teal Flowage	5.4	7	43	0.8	4.0	.05	.24	.37
Trow Lake (Lower Merrillan Pond)	6.6	17	67	2.8	3.0	.04	.29	.39

Lake	Fe(T) (ppm)	PO_4(T) (ppm)	PO_4(D) (ppm)	Ca (ppm)	Mg (ppm)	Na (ppm)	K (ppm)	Date Sampled
Teal Flowage	.72	0.03	<0.01	2.1	2.3	0.78	1.62	5-7-65
Trow Lake (Lower Merrillan Pond)	.77	0.45	0.01	4.4	2.8	2.28	2.00	5-7-65

Total alkalinity - mg/l as $CaCO_3$

Specific Conductance - micromhos/cm at 25°C(77°F)
Cl - Chlorides - mg/l
SO_4 - Sulphates - mg/l
NH_4-N - Ammonia as Nitrogen - mg/l
NH_3-N - Nitrate as Nitrogen - mg/l - Chromotropic acid
K-N - Kjeldahl (Organic) Nitrogen - mg/l - not total Kjeldahl
Fe(T) - Total iron - mg/l
PO_4(T) - Total Phosphates - mg/l
PO_4(D) - Dissolved Phosphates - mg/l - nitric/perchloric acid digestion
Ca - Calcium - mg/l
Mg - Magnesium - mg/l
Na - Sodium - mg/l
K - Potassium - mg/l

Table 7. Classification, fertility, and productivity of Jackson County lakes according to size class.

Size Class (acres)	No.	Methyl Purple Alkalinity (ppm) Range	Methyl Purple Alkalinity (ppm) Mean	pH Range	pH Mean	Specific Conductance (mmhos at 77°F) Range	Specific Conductance (mmhos at 77°F) Mean	Hardness Classification Range	Hardness Classification Mean	Productivity Classification Range	Productivity Classification Mean	Fertility Classification Range	Fertility Classification Mean
Less than 5	44	3-56	9.9	5.3-8.2	7.0	11-171	42	V.S.-M.H.	V.S.	L.-M.H.	L.	Inf.-M.F.	Inf.
5 to 10	25	2-34	6.9	4.2-8.2	6.3	11-112	29	V.S.-S.	V.S.	L.-L.M.	L.	Inf.-F.F.	Inf.
10 to 20	31	3-40	8.8	5.5-9.2	7.0	14-210	40	V.S.-S.	V.S.	L.-L.M.	L.	Inf.-F.F.	Inf.
20 to 50	29	3-24	6.7	5.0-8.3	6.7	19-80	31	V.S.	V.S.	L.	L.	Inf.	Inf.
50 to 100	4	4-33	12.5	6.9-8.4	7.8	22-86	41	V.S.	V.S.	L.	L.	Inf.	Inf.
100 to 200	6	5-30	10.2	5.4-7.8	6.9	20-83	34	V.S.	V.S.	L.	L.	Inf.	Inf.
200 to 500	1		5		6.4		20		V.S.		L.		Inf.
Averages			8.5		6.8		37		V.S.		L.		Inf.

Note: Hardness Classification - V.S. = very soft, S. = soft, M.H. = medium hard, H. = hard

Productivity Classification - L. = low, L.M. = low to medium, M.H. = medium to high, H. = high

Fertility Classification - Inf. = infertile, F.F. = fairly fertile, M.F. = moderately fertile, V.F. = very fertile

See fertility classification in Appendix III.

Table 8. Classification, fertility, and productivity of Jackson County streams according to size classes.

Av. Width (feet)	No.	Methyl Purple Alkalinity (ppm) Range	Mean	pH Range	Mean	Specific Conductance (mmhos at 77°F) Range	Mean	Hardness Classification Range	Mean	Productivity Classification Range	Mean	Fertility Classification Range	Mean
Less than 10	177	2-218	31.7	4.9-8.6	7.2	18-510	108.7	V.S.-H	S.	L.-H.	L.M.	Inf.-V.F.	F.F.
10 to 20	17	4-191	30.2	6.8-8.0	7.4	28-464	101.2	V.S.-H	S.	L.-H.	L.M.	Inf.-V.F.	F.F.
20 to 40	8	4-57	20.0	7.2-7.8	7.5	27-178	77.4	V.S.-M.H.	V.S.	L.-M.H.	L.	Inf.-M.F.	Inf.
40 and wider	2	11-37	24.0	7.5-7.6	7.55	45-110	77.5	V.S.-S.	S.	L.-L.M.	L.M.	Inf.-F.F.	F.F.
Averages			31.1		7.3		106.5		S.		L.M.		F.F.

Note: Hardness Classification - V.S. = very soft, S. = soft, M.H. = medium hard, H. = hard

Productivity Classification - L. = low, L.M. = low to medium, M.H. = medium to high, H. = high

Fertility Classification - Inf. = infertile, F.F. = fairly fertile, M.F. = moderately fertile, V.F. = very fertile

See fertility classification in Appendix III.

Table 9. Water color of Jackson County lakes and streams by size classes.

Water	No.	Clear	Light Brown	Medium Brown	Dark Brown	Turbid
Lakes (size class - acres)						
Less than 5	44	10	28	6		
5 to 10	25	2	19	4		
10 to 20	31	3	19	7	2	
20 to 50	29	3	15	11		
50 to 100	4	1	2	1		
100 to 200	6		5	1		
200 to 500	1			1		
Totals	140	19	88	31	2	
Streams (size class - av. width in feet)						
Less than 10	177	99	36	27	13	2
10 to 20	17	7	4	6		
20 to 40	8	3	3	2		
40 and wider	2		1	1		
Totals	204	109	44	36	13	2

the least of these is the Black River. This stream should probably be ranked among the better smallmouth bass waters of the state. It also attracts anglers in search of walleye, muskellunge, northern pike, and catfish. The east fork of the Black River has fish species common to the parent stream. Northern pike are found in many of the streams, at least seasonally.

Warm water lakes in the county are primarily managed for northern pike, largemouth bass, bluegill, and crappie. Bullhead are found in nearly all lakes. Many of the lakes are subject to periodic, if not annual winterkill conditions and the permanent fish populations consist of the more resistant bullhead, forage species, or both. Table 4 shows the depth classes of Jackson County lakes.

Commercial fishing is limited to the taking and selling of bait minnows by licensed minnow dealers. Eastern Jackson County flowages, tributaries to the east fork of the Black River, and Lake 5.14 (T21N-R4W) are presently the main sources of minnows.

During 1966, there were 1,903 resident and 653 nonresident fishing licenses sold in Jackson County. In addition, 1,640 voluntary sportsman licenses were sold.

Aquatic Game Resource

Based on the total of important inland acreages for wetlands and waters within the state (a total of 1,127,246 acres), Jackson County has 0.6 percent of the inland habitat of importance to ducks and coot (Jahn and Hunt, 1964). Using 1952-54 data, there were 1.7 acres of wetlands that were classed as most important duck and coot breeding habitat for each square mile of land area. Breeding species most commonly found in Jackson County include mallard, wood duck, blue-winged teal, black duck, hooded merganser, and coot. A less frequent or rare breeder is pintail.

Areas and water of importance to waterfowl and other aquatic game are the Black River State Forest, Central Wisconsin Conservation Area (also in Juneau, Monroe and Wood Counties), and the Black River.

The impounded water areas within the Black River State Forest and of that portion of the Central Wisconsin Conservation Area lying within Jackson County are managed primarily for waterfowl. Water levels can be fluctuated at many of the waters and winterkill conditions are prevalent. Muskrat, mink, beaver, and otter are present. Except for a very limited number of impoundments, fish species are generally limited to bullhead and forage species with northern pike present in some of the streams and ditches.

According to 1957 data, 358 migratory waterfowl hunting stamps were sold in Jackson County which ranked it among the lower 13 percent and among all the counties of the state.

Muskrat, mink, and raccoon are the furbearers appearing most frequently in the annual harvest with beaver, otter, fox, and weasel following in that order.

General trapping activities have remained quite steady; however, there appears to be increased activity in beaver trapping, mainly younger part-time, nonprofessional trappers.

During the past five years, mink and muskrat pelt prices have dropped in price, otter pelt prices have remained steady, and beaver pelts have brought slightly higher prices. Raccoon and fox pelts have enjoyed the greatest price increases.

Farm Ponds and Private Fish Hatcheries

Information from the Soil Conservation Service office at Black River Falls and observations made during the 1967 survey indicate there are approximately 65 farm ponds that have been constructed, excluding those licensed as private fish hatcheries. They range from about 0.03 to 9.0 acres in size and have a total area of approximately 47.77 acres. Their depths range from 4 to 8 feet. These shallow depths indicate that most of the ponds, unless springs are present, probably suffer from winterkill conditions and are not ideally suited to fish. Some ponds were constructed for fish, wildlife, or stock watering, but often these uses were not the primary reasons for their construction. About one-half the farm ponds were primarily constructed to retard flood waters and for grade stabilization.

As of December 31, 1967, there were 18 private fish hatchery licenses in the county and their surface water area totaled about 91.85 acres. The locations of the private hatcheries are shown in Figure 6.

Boating

According to the Conservation Department records of December 31, 1965, there were 550 boats registered in Jackson County. This total included 510 outboard motors, 1 inboard motor, 3 sail, and 36 outboard fleet registrations. Since registrations do not include manually propelled boats, this number is a minimal figure. Of the eight lakes in the county that exceed 100 acres in size, Potters Flowage and the impoundment at Black River Falls receive the greatest boat traffic. Actually, Arbutus Lake, located in Clark and Jackson Counties and discussed in the Clark County Surface Water Resources report, no doubt receives more boat traffic from boats registered in Jackson County than do any other lakes located entirely within the county.

Light boat traffic is possible on the larger streams in the county, but portaging over shallow areas may be necessary during low water periods. Float trips are made on the Black River between Black River Falls and Melrose or North Bend, or even as far downstream as Onalaska Lake in La Crosse County, and from various launch areas below the Arbutus Lake dam downstream to Black River Falls. The stream is listed as a canoe trail in state publications. The Black River and the east fork of the Black River are highly scenic.

Swimming

Public bathing facilities are available at Arbutus Lake. Most of the lakes in the county with suitable swimming depths have varying amounts of

sand shoal areas. The sand bars along the Black River provide popular swimming sites; however, due to its shifting sand bottom and current, swimming in the Black River has proven costly to the unwary. The Bradfield YMCA camp on Halls Creek provides a water recreation area by impounding the water each summer and draining it in the early fall.

Aesthetics

As referred to in this report, aesthetics is the appreciation of the beauties of nature. This appreciation may lie in the howl of a coyote, mating calls of birds and mammals, whistling wings, rustling leaves, freshened air, bubbling water, in the peace and tranquility felt when viewing a landscape, even in watching a heron devour a watersnake, or in many other ways too numerous to mention.

Throughout the state are several scientific areas which are tracts of land or water in their native state set aside and permanently protected or managed for the purpose of preservation of native plant and animal communities or of rare or valuable individual members of such communities or archaeological sites. Such a site, known as the "Castle Mound Pine Forest" covers 20 acres and is located near Black River Falls. There is a healthy young stand of white pine with some red pine and jack pine. There is also a nature trail and an observation lookout at the top of the forested butte.

The rugged hills of western Jackson County offer the beauties of the coulee country, especially when viewed in the fall. Within the Black River State Forest and elsewhere in the eastern half of the county, wildlife of all kinds may be observed including deer, raccoon, mink, otter, beaver, muskrat, fox, ruffed grouse, waterfowl, sandhill crane, and an occasional bald eage, coyote, and sharptail grouse. A boat trip on the Black River offers varying scenery and thrills.

AVAILABILITY OF THE WATER RESOURCES

Area and Population

Jackson County covers an area of 1,001 square miles and it represents approximately 1.8 percent of the total area of the state. With the exception of Black River Falls, which had 3,195 inhabitants in 1960, the county has a rural population. The county census figure of 15,151 represents approximately 0.4 percent of the state's population. There are 15.2 people per square mile as compared to the state average of 72.2. While the 1960 census indicated an increase of 15.1 percent for the state between 1950 and 1960, the Jackson County population declined 5.7 percent (Fuguitt, 1961). It has been estimated that the county population declined to 14,740 between April 1, 1960 and July 1, 1963--a decline of 2.7 percent (Brenneke and Marshall, 1963). The county has experienced industrial growth in recent years and has a potential labor source for additional plants. Agricultural employment has dropped off and is a principal cause of emigration from the county. More than one-half of the land area is in forest.

Public Access and Use

Lakes were classified by degree of access during the 1967 investigations. Information obtained appears in Figure 7, a public access map of Jackson County. Data concerning access on lakes and streams according to size classes are provided in Tables 2 and 3.

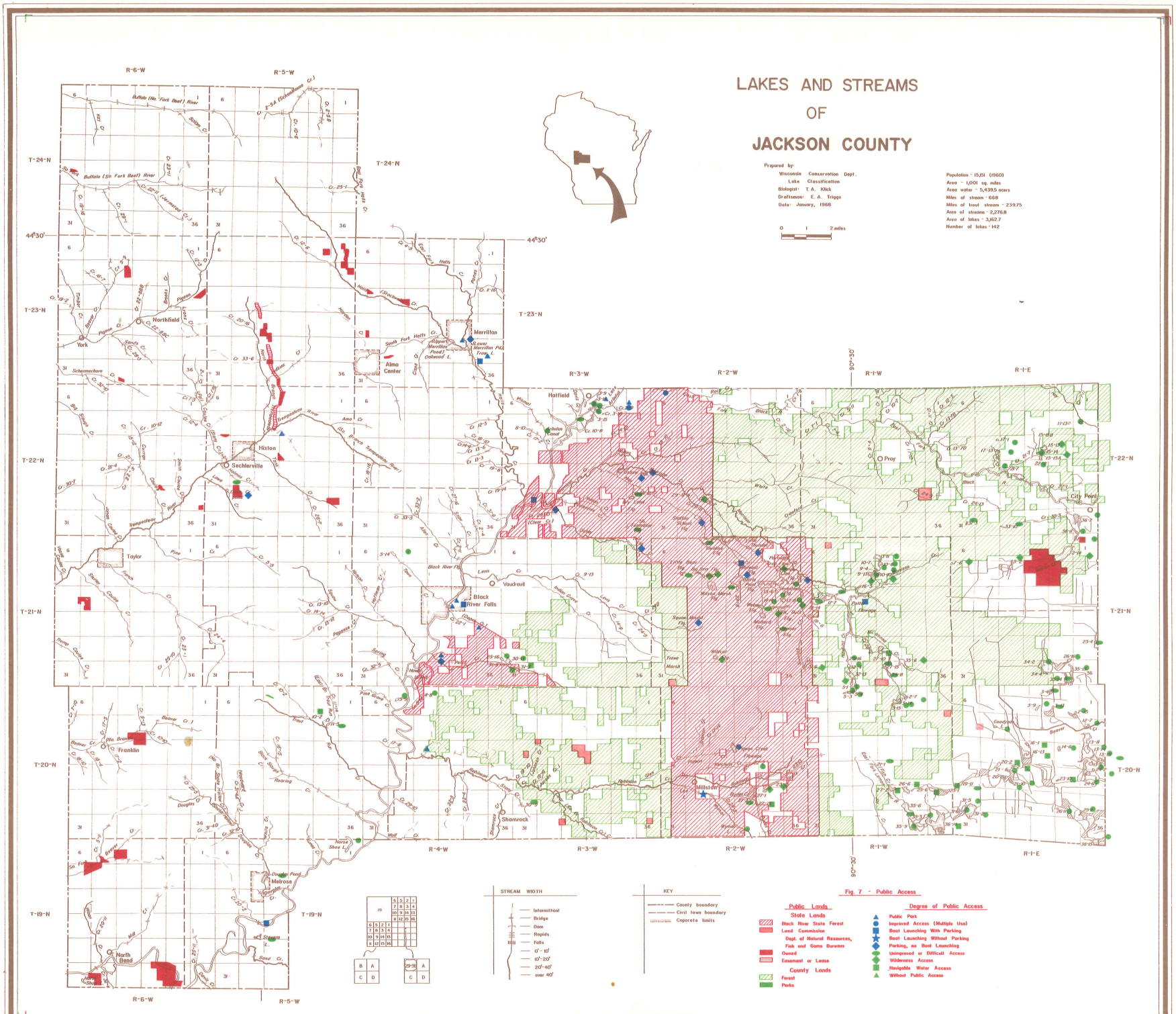
Of the 142 lakes investigated, 62 had no public access; however, 28 are less than five acres in size and one is located on state-owned land but is included in a closed area not open to public trespass. There were 20 lakes having wilderness access, 30 with unimproved or difficult access (includes those with road rights-of-way, but no parking), 38 with navigable water access, 10 that had parking but no boat launching, 1 with boat launching but no parking, 4 had boat launching with parking, and 1 having a multiple-use access.

There are 343 miles of public frontage along streams and 59 miles around lakes (Tables 2 and 3).

Listed below are public use areas within the county as obtained from Wisconsin Department of Natural Resources data and personnel.

Federal (leased to state - C.W.C.A.) - 1,060 acres

State
- Land Commission - 720 acres
- Black River State Forest - 63,242 acres as of 10-20-67
- Wisconsin Conservation Division (wildlife and other)
  - Owned - 2,943.74 acres
  - Leased and easement - 118.56 acres


LAKES AND STREAMS
OF
JACKSON COUNTY
Prepared by:
Wisconsin Conservation Dept.
Lake Classification
Biologist: T. A. Klick
Draftsman: E. A. Triggs
Date: January, 1968
0 1 2 miles
Population - 15,151 (1960)
Area - 1,001 sq. miles
Area water - 5,439.5 acres
Miles of stream - 668
Miles of trout stream - 239.75
Area of streams - 2,276.8
Area of lakes - 3,162.7
Number of lakes - 142
R-6-W
R-5-W
R-4-W
R-3-W
R-2-W
R-1-W
R-1-E
T-24-N
T-23-N
T-22-N
T-21-N
T-20-N
T-19-N
44°30'
90°30'
Northfield
York
Merrillan
Almo Center
Hixton
Sechlerville
Taylor
Hatfield
Pray
City Point
Black River Falls
Vaudreuil
Millston
Franklin
Shamrock
Melrose
North Bend
STREAM WIDTH
Intermittent
Bridge
Dam
Rapids
Falls
0' - 10'
10'-20'
20'-40'
over 40'
KEY
County boundary
Civil town boundary
Corporate limits
Fig. 7 - Public Access
Public Lands
State Lands
Black River State Forest
Land Commission
Dept. of Natural Resources, Fish and Game Bureaus
Owned
Easement or Lease
County Lands
Forest
Parks
Degree of Public Access
Public Park
Improved Access (Multiple Use)
Boat Launching With Parking
Boat Launching Without Parking
Parking, no Boat Launching
Unimproved or Difficult Access
Wilderness Access
Navigable Water Access
Without Public Access

County
- County Forest - 105,615.15 acres as of 6-30-67
- Parks
  - Arbutus Lake - 308 acres
  - Gullickson's Glen - 4.2 acres
  - River's Bend - 5 acres

Municipal
- Alma Center - 2 acres
- Black River Falls (3 parks) - 35 acres
- Hixton - 26 acres
- Merrillan (2 parks) - 25 acres

The 308 acres included in the Arbutus Lake Park have been leased to the county by Northern States Power Company. Of the 285 acres located on the east side of the lake, about 30 have been developed for camping, picnicking, and a boat launching site. The remaining acres on the west side of the lake have been developed for camping and picnicking.

Private Development

There are 143 dwellings on the 142 lakes included in this report. In addition, there are two boat liveries, one resort, two motels, one private campground, and one trailer court. All of the development is concentrated on 21 waters. Probable reasons for the lack of development are that many lakes are located on public lands while others are small, shallow, or both, and lack recreation potential.

Most development on streams is concentrated on the Black River, Robinson Creek, and its tributary, Clear Creek.

SURFACE WATER PROBLEMS

Resource Based Problems

Like most of the counties in the west central part of the state, Jackson County has relatively few natural lakes. Artificial impoundments, created for various purposes dominate the lake resource.

Except for a relatively few streams in the west and southwest portion of the county, the waters (lakes and streams) are soft and infertile. The principal bottom type materials (sand and detritus) are usually unproductive. Water supply volumes are relatively unstable with too much sometimes and not enough other times. Due to the sandy nature of the soil, many lakes, flowages, and streams directly reflect the condition of the groundwater table. The majority of the flowages are shallow and subject to winterkill conditions.

Because the waters are low in basic fertility they produce relatively low fish crops. Sand and detritus bottom types combined with the low fertility results in low food production. Unstable water volumes supplying flowages aggravate winterkill problems. Winterkill limits the number of flowages suitable for game fish and intensive management is needed to keep a good population balance.

Another problem is the gradual filling of lakes and flowages. The natural aging process is one cause and is especially noticeable in small lakes where undecomposed aquatic vegetation and other detritus build up on the bottom and where the encroaching shoreline reduces the surface water area and depth. These lakes become smaller each year and will eventually become devoid of open water. Sand, silt, detritus and similar materials carried by streams are dropped as the current is slowed when streams enter flowages. This results in a build up of bottom materials, especially near the upper end of flowages thus causing a decline in depths.

Fishery Problems

Due to the winterkill problem, game fish can not survive even moderate winters in some lakes. An overabundance of panfish, especially bullhead, is common in several flowages.

Use Conflicts

Recreational demands are not intensive upon lakes and streams at this time.

At times, there have been conflicts between power companies who have dams on the Black River and anglers and boaters. There are times when the water flow through the dams hampers boating and angling efforts.

Pollution

Possible pollution sources are listed in Table 10. Equipment failures and overloading of sewage treatment facilities often cause pollution. The overloading may be caused by excessive rainfall or by abnormally large amounts of industrial wastes. In some instances, present treatment facilities are no longer adequate, resulting in the discharge of inadequately treated sewage. Pollution has continuous surveillance by Department of Natural Resources personnel who continually check water quality at stream sites where pollution is suspected and seek correction.

Public Access

More access is needed along some of the larger warm water streams while along others development of present sites will be needed as use of the waters increases. There have been varying amounts of public access acquired along some of the trout streams, but some of the better waters have little or none. With the exception of the flowages used in cranberry culture, there is generally adequate access to most impoundments to meet present use pressure; however, these will no doubt be inadequate to meet future needs.

Table 10. Jackson County pollution sources.*

Source	Treatment	Stream	Remarks
	Black River Basin		
Alma Center, Village of	Trickling Filter	Halls Creek, So.Fk. Black River	No Chlorination
Black River Falls, City of	Primary		"
Melrose Coop. Creamery	Swamp	Douglas Creek	Overflow to Stream
Melrose, Village of	Trickling Filter	Douglas Creek	No Chlorination, Winter Problems
Merrillan, Village of	Primary	Halls Creek	Combined sewers
Thomas Bros. Dairy, Inc.	Septic Tank and Soil Absorption	Spring Creek	Overflow to Stream
	Chippewa River Basin		
South Side Cheese Factory	Seepage Facilities	Corn Creek	Intermittent pollution
	Trempealeau River Basin		
South Alma Cheese Factory, Inc.	Settling Basin	Trempealeau River	Ridge and furrow treatment planned for 1968
Taylor Coop. Creamery	Septic Tank and Marsh	Trempealeau River	
Taylor, Village of	Primary Plant	Trempealeau River	No Chlorination
York Coop. Creamery	Ridge and Furrow	Timber Creek	

*Sources of information were personal communication with Mr. J. R. McKersie and Mr. Charles Kozel of the Division of Resource Development, Wis. Dept. of Natural Resources.

THE FUTURE

Lacking natural lakes Jackson County is dependent upon several trout streams, warm water rivers and streams, and impoundments for its aquatic recreational opportunities. Any further increase in recreational waters will be dependent upon construction of impoundments. One such site being contemplated at the present time is on Levis Creek.

The popularity of water-oriented activities will probably continue to increase. Wildlife and cranberry impoundments make up much of the water acreage in the county and the concept of multiple-use of these areas should be retained. Since speed boating and water-skiing activities are limited for the most part to portions of the flowage at Black River Falls and to Arbutus Lake (Clark and Jackson Counties) future flowage development should give consideration to these activities. A need for additional swimming facilities is also foreseen.

Soft, infertile waters of the flowages together with unstable water supplies and periodic winterkill conditions call for intensive management through the use of various management tools in order to meet the needs of the angling public.

ACKNOWLEDGEMENTS

Grateful appreciation is extended to Raymond Chap and Laurel Brandt who assisted in the field investigations and to other personnel of the Department of Natural Resources and other agencies who assisted and contributed to this inventory.

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APPENDIX I – Physical and Chemical Data of Jackson County Lakes and Impoundments

Named Waters	LOCATION T-N	R-E,W	SEC.	DRAINAGE SYSTEM	SURFACE ACRES	MAX. KNOWN DEPTH (FEET)	SURFACE ACRES UNDER 3 FEET (PERCENT)	SURFACE ACRES OVER 20 FEET (PERCENT)	LENGTH (MILES)	WIDTH (MILES)	SHORELINE (MILES)	SHORELINE DEV. FACTOR	METHYL PURPLE ALKALINITY (PPM)	pH	SPECIFIC CONDUCTANCE (mmhos-77°F)	WATER COLOR	DATE OF SAMPLING
Battle Point Flowage	21	2W	10	Creek 29-8	26.8	7.0	50	0	0.25	0.20	1.3	1.79	5	6.5	22	Med. Brn.	8-24-67
Black Duck Flowage	21	2W	13	Morrison Cr. via ditches	16.9	7.5	50	0	0.45	0.05	2.3	4.00	6	6.6	20	Lt. Brn.	9-14-67
Black River Flowage	21	4W	15	Black River	111.0	35.0	5	10	1.0	0.06	6.4	4.38	30	7.2	83	Lt. Brn.	9-28-67
Douglas Pond	19	5W	9	Douglas Creek	16.3	7.0	20	0	0.35	0.10	0.9	1.65	40	7.6	210	Clear	10-12-67
Dry Land Flowage	22	3W	25	Creek 24-12	4.1	5.0	95	0	0.13	0.05	0.9	3.31	8	6.7	19	Lt. Brn.	8-9-67
Funmaker Flowage	22	3W	36	Drained	8.5	3.0	98	0	0.2	0.2	0.7	1.72	6	7.0	24	Lt. Brn.	8-4-67
Goodyear	20	1E	8	Beaver Cr. via ditches	5.5	0.5	100	0	0.15	0.08	0.5	1.52	2	4.2	11	Lt. Brn.	9-16-67
Horseshoe	19	5W	1	Landlocked	29.3	3.5	85	0	0.45	0.09	1.8	2.38	19	7.6	80	Med. Brn.	10-17-67
Lee	20	2W	29	Wyman Creek	34.4	14.0	20	0	0.56	0.11	1.9	2.34	8	7.4	42	Lt. Brn.	10-26-67
Little Bear Flowage	21	2W	8	Dickey Creek	11.2	5.0	85	0	0.21	0.14	0.8	1.72	9	7.6	27	Med. Brn.	8-3-67
Little Thunder Flowage	21	2W	3	Creek 29-2	11.3	3.0	95	0	0.23	0.08	0.5	1.15	10	7.8	57	Drk. Brn.	8-3-67
Mallard Flowage	21	2W	23	Morrison Cr. via flowages & ditches	27.4	4.5	60	0	0.35	0.25	1.1	1.50	5	6.7	32	Med. Brn.	9-12-67
Oakwood Lake (Upper Merrillan Pond)	23	4W	27	Halls Creek	13.6	14.0	5	0	0.16	0.06	1.2	2.34	23	7.6	84	Clear	9-19-67
Partridge Crop Flowage	21	2W	12	Morrison Cr. via ditches	16.5	3.5	97	0	0.24	0.11	1.7	2.99	9	7.1	30	Med. Brn.	11-15-67
Pigeon Creek Flowage	20	2W	16	Pigeon Creek	33.5	9.0	40	0	0.42	0.21	1.2	1.60	5	7.8	26	Med. Brn.	10-6-67
Potter Flowage	21	1W	17	Morrison Creek	202.8	25.0	30	5	1.3	0.4	14.9	7.46	5	6.4	20	Med. Brn.	8-31-67
Range Line Flowage	21	2W	12	Townline Creek	10.0	7.0	75	0	0.24	0.09	0.7	1.58	6	7.8	31	Lt. Brn.	9-13-67
Seventeen Flowage	21	2W	11	Morrison Cr. via ditches	177.7	4.0	95	0	1.08	0.36	9.3	4.98	6	7.4	28	Lt. Brn.	9-13-67
Squaw Mound Flowage	21	2W	20	Levis Creek	13.9	6.5	65	0	0.35	0.09	1.0	1.90	5	7.5	26	Med. Brn.	8-4-67
Staffon School Flowage	22	2W	32	Hay Creek	7.0	1.2	100	0	0.2	0.2	1.3	3.50	5	6.6	35	Lt. Brn.	8-23-67
Stevens (Stebbins, Stebbs, Miller)	19	5W	20	Drained	11.6	6.0	60	0	0.25	0.18	1.0	2.10	24	8.0	95	Clear	10-11-67
Tanner Flowage	21	2W	24	Morrison Cr. via flowages & ditches	16.3	6.5	70	0	0.24	0.19	1.0	1.70	5	6.0	24	Med.Brn.	9-13-67
Teal Flowage	21	3W	1	Dickey Creek	11.2	10.0	30	0	0.35	0.05	1.3	2.77	10	8.4	37	Lt. Brn.	9-6-67
Townline Flowage	21	2W	4	Creeks 29-2 & 29-8	142.5	6.5	90	0	0.56	0.13	7.1	4.19	7	7.5	25	Med. Brn.	8-2-67
Trow Lake (Lower Merrillan Pond)	23	4W	26	Halls Creek	37.1	9.0	25	0	0.4	0.16	2.3	2.63	24	8.3	78	Clear	9-19-67
Weber Flowage	21	2W	14	Morrison Cr. via ditches	18.8	3.5	97	0	0.3	0.16	0.8	1.32	10	7.2	71	Lt. Brn.	11-15-67
Whitetail Flowage	21	2W	10	Creek 29-8	93.5	8.0	25	0	0.71	0.23	2.3	1.70	4	7.4	22	Lt. Brn.	9-15-67
Wildcat Flowage	21	2W	28	Landlocked	14.1	3.0	90	0	0.2	0.18	0.6	1.22	3	6.7	36	Lt. Brn.	9-7-67
Wilson Marsh Flowage	21	2W	9	Dickey Creek	24.3	8.5	70	0	0.3	0.25	1.9	2.76	5	6.6	23	Med. Brn.	8-24-67
Wyman	20	2W	34	Wyman Creek	6.4	8.0	15	0	0.23	0.06	0.7	1.82	17	7.3	49	Clear	10-6-67
Unnamed Waters																	
Adams Tn.																	
Lake 5-14	21	4W	5	Town Creek	3.0	16.0	20	0	0.14	0.05	0.6	2.46	17	7.4	72	Clear	9-29-67
Lake 3-9	22	3W	3	Landlocked	4.4	12.0	40	0	0.25	0.03	0.6	1.87	8	7.9	68	Clear	9-1-67
Lake 3-14	22	3W	3	Landlocked	0.4	5.0	15	0	0.05	0.02	0.1	1.16	13	7.3	85	Lt. Brn.	9-15-67
Lake 3-15	22	3W	3	Landlocked	1.0	9.5	35	0	0.07	0.03	0.2	1.31	30	7.7	94	Clear	8-30-67
Lake 8-10	22	3W	8	Creek 17-2	3.1	9.0	25	0	0.12	0.07	0.4	1.71	10	7.6	31	Lt. Brn.	9-27-67
Lake 10-6 (Arbutus Canal)	22	3W	10	Black River	79.0	19.0	10	0	0.75	0.14	8.8	7.07	33	8.4	86	Lt. Brn.	8-2-67

APPENDIX I – Physical and Chemical Data of Jackson County Lakes and Impoundments (Continued)

Unnamed Waters	LOCATION T-N	R-E,W	SEC.	DRAINAGE SYSTEM	SURFACE ACRES	MAX. KNOWN DEPTH (FEET)	SURFACE ACRES UNDER 3 FEET (PERCENT)	SURFACE ACRES OVER 20 FEET (PERCENT)	LENGTH (MILES)	WIDTH (MILES)	SHORELINE (MILES)	SHORE-DEV. FACTOR	METHYL PURPLE ALKALINITY (PPM)	PH	SPECIFIC CONDUCTANCE (mmhos-77° F)	WATER COLOR	DATE OF SAMPLING
Bear Bluff Tn.																	
Lake 2-15	20	1E	2	Beaver Cr. via ditch	7.6	5.0	30	0	0.30	0.25	1.8	4.53	5	5.2	17	Lt. Brn.	8-23-67
Lake 3-4	20	1E	3	Beaver Cr. via ditch	8.5	5.5	40	0	0.28	0.17	1.7	4.17	4	5.0	30	Lt. Brn.	8-23-67
Lake 3-9	20	1E	3	Beaver Cr. via ditch	2.3	5.5	80	0	0.14	0.06	0.7	3.05	5	5.3	31	Lt. Brn.	8-23-67
Lake 3-13	20	1E	3	Beaver Cr. via ditch	21.6	6.0	80	0	0.38	0.15	1.9	2.88	4	5.2	29	Lt. Brn.	8-23-67
Lake 12-7	20	1E	12	Beaver Creek	8.7	4.5	80	0	0.18	0.08	0.9	2.21	4	5.7	32	Lt. Brn.	8-24-67
Lake 13-8	20	1E	13	Beaver Cr. via ditch	109.5	4.0	80	0	0.52	0.35	5.0	3.43	5	5.4	24	Lt. Brn.	8-25-67
Lake 13-9	20	1E	13	Beaver Cr. via ditch	11.7	5.5	60	0	0.20	0.15	0.8	1.69	13	9.2	34	Lt. Brn.	8-24-67
Lake 13-13	20	1E	13	Beaver Cr. via ditch	25.1	7.0	50	0	0.31	0.21	0.8	1.15	6	6.6	31	Lt. Brn.	8-24-67
Lake 13-14	20	1E	13	Beaver Cr. via ditch	35.9	7.0	30	0	0.44	0.26	1.2	1.44	7	7.0	24	Lt. Brn.	8-25-67
Lake 14-6	20	1E	14	Landlocked	12.2	2.0	100	0	0.23	0.13	0.6	1.31	3	5.5	36	Med. Brn.	8-28-67
Lake 16-1	20	1E	16	Beaver Cr. via ditch	8.6	4.0	90	0	0.31	0.08	1.3	3.24	3	5.0	27	Lt. Brn.	9-8-67
Lake 16-13	20	1E	16	Beaver Cr. via ditch	21.1	6.0	80	0	0.37	0.24	2.8	4.34	3	5.0	26	Med. Brn.	8-9-67
Lake 19-11	20	1E	19	Beaver Cr. via ditch	11.8	4.0	10	0	0.23	0.13	1.7	3.54	3	6.8	24	Drk. Brn.	9-30-67
Lake 20-2	20	1E	20	Beaver Cr. via ditch	5.1	4.5	90	0	0.15	0.08	0.4	1.26	2	4.4	32	Lt. Brn.	9-30-67
Lake 20-13	20	1E	20	Beaver Cr. via ditch	14.1	4.0	20	0	0.27	0.11	0.8	3.39	6	6.0	31	Lt. Brn.	9-16-67
Lake 21-2	20	1E	21	Beaver Cr. via ditch	2.8	5.5	60	0	0.11	0.08	0.5	2.10	3	5.5	21	Med. Brn.	9-8-67
Lake 21-6	20	1E	21	Beaver Cr. via ditch	4.6	3.0	95	0	0.11	0.05	0.4	1.17	6	6.0	47	Lt. Brn.	9-30-67
Lake 21-10	20	1E	21	Beaver Cr. via ditch	6.1	5.5	70	0	0.10	0.09	0.4	1.28	5	5.4	17	Lt. Brn.	9-16-67
Lake 23-10	20	1E	23	Beaver Cr. via ditch	0.5	6.5	80	0	0.05	0.02	0.2	2.02	3	6.2	22	Lt. Brn.	9-17-67
Lake 24-2	20	1E	24	Beaver Cr. via ditch	6.6	9.0	70	0	0.16	0.12	0.6	1.68	12	7.4	38	Lt. Brn.	8-29-67
Lake 24-6	20	1E	24	Beaver Cr. via ditch	5.7	4.5	80	0	0.27	0.08	1.1	3.29	9	6.6	30	Lt. Brn.	8-27-67
Lake 25-11	20	1E	25	Beaver Cr. via ditches	0.5	3.5	90	0	0.08	0.03	0.3	2.93	12	6.5	46	Lt. Brn.	9-7-67
Lake 26-11	20	1E	26	Beaver Cr. via ditch	0.7	5.0	80	0	0.05	0.02	0.1	1.19	8	6.5	32	Lt. Brn.	9-7-67
Lake 31-2	20	1E	31	E. Fk. Lemonweir R. via ditch	181.9	5.0	-	0	0.59	0.37	2.5	1.31	5	5.9	20	Lt. Brn.	9-30-67
Lake 31-5	20	1E	31	E. Fk. Lemonweir R. via ditch	110.0	-	-	-	0.53	0.29	1.7	1.13	-	-	-	-	9-30-67
Lake 31-6	20	1E	31	E. Fk. Lemonweir R. via ditch	92.9	-	-	-	0.50	0.21	1.8	1.30	-	-	-	-	9-30-67
Lake 36-15	20	1E	36	Beaver Cr. via flowages & ditches	1.4	1.5	100	0	0.07	0.05	0.2	1.39	20	7.2	60	Lt. Brn.	9-5-67
Lake 25-4	21	1E	25	Beaver Cr. via ditch	42.3	6.5	80	0	0.33	0.13	4.1	4.49	7	6.6	33	Med. Brn.	8-8-67
Lake 26-16	21	1E	26	Beaver Cr. via ditch	0.2	3.5	90	0	0.04	0.01	0.2	2.77	7	6.2	33	Med. Brn.	8-9-67
Lake 34-2	21	1E	34	Beaver Cr. via ditch	22.5	7.0	75	0	0.31	0.09	3.2	4.83	8	6.2	26	Med. Brn.	8-9-67
Lake 34-4	21	1E	34	Beaver Cr. via ditch	0.3	6.0	90	0	0.08	0.01	0.2	1.95	6	6.2	25	Med. Brn.	8-9-67
Lake 35-13	21	1E	35	Beaver Cr. via ditch	30.1	5.5	70	0	0.40	0.17	1.8	2.34	5	5.6	26	Lt. Brn.	8-22-67
Lake 35-14	21	1E	35	Beaver Cr. via ditch	27.3	4.0	75	0	0.52	0.46	2.5	3.43	5	5.9	31	Lt. Brn.	8-22-67
Brockway Tn.																	
Lake 30-11	21	3W	30	Perry Cr. via ditch	22.0	5.0	75	0	0.33	0.24	1.5	2.28	5	7.1	38	Lt. Brn.	10-4-67
Lake 31-3	21	3W	31	Perry Creek	24.9	7.0	45	0	0.50	0.14	1.5	2.12	7	7.3	42	Clear	10-4-67
Lake 31-6	21	3W	31	Perry Creek	12.5	7.0	75	0	0.36	0.08	1.0	2.02	7	7.0	40	Lt. Brn.	10-4-67
Lake 25-16	21	4W	25	Perry Cr. via ditch	0.5	3.0	97	0	0.05	0.03	0.2	1.61	6	6.8	45	Lt. Brn.	10-4-67

APPENDIX I – Physical and Chemical Data of Jackson County Lakes and Impoundments (Continued)

Unnamed Waters	LOCATION T-N	R-E,W	SEC.	DRAINAGE SYSTEM	SURFACE ACRES	MAX. KNOWN DEPTH (FEET)	SURFACE ACRES UNDER 3 FEET (PERCENT)	SURFACE ACRES OVER 20 FEET (PERCENT)	LENGTH (MILES)	WIDTH (MILES)	SHORELINE (MILES)	SHORELINE DEV. FACTOR	METHYL PURPLE ALKALINITY (PPM)	pH	SPECIFIC CONDUCTANCE (mmhos-77°F)	WATER COLOR	DATE OF SAMPLING
City Point Tn.																	
Lake 1-6	21	1E	1	Indian Creek	3.5	6.5	30	0	0.13	0.08	0.3	1.25	10	7.5	42	Med. Brn.	7-11-67
Lake 2-14	21	1E	2	Indian Creek	4&2	12.0	5	0	0.60	0.18	2.0	2.06	4	6.4	26	Med. Brn.	7-10-67
Lake 7-6	21	1E	7	Drained	5.0	4.0	85	0	0.15	0.08	0.4	1.34	5	6.2	22	Lt. Brn.	8-14-67
Lake 9-2	21	1E	9	Indian Cr. via ditch	&5	6.0	60	0	0.25	0.08	1.1	2.57	5	6.2	34	Med. Brn.	7-12-67
Lake 11-13	22	1E	11	Drained	1.3	1.5	100	0	0.08	0.04	0.2	1.19	4	6.8	39	Lt. Brn.	6-27-67
Lake 15-13	22	1E	15	Cr. 21-7 via ditch & L. 15-14	19.0	12.0	30	0	0.27	0.18	1.5	2.53	7	7.6	37	Lt. Brn.	6-28-67
Lake 15-14	22	1E	15	Cr. 21-7 via ditch	1.3	7.0	90	0	0.06	0.02	0.4	2.75	7	7.2	32	Lt. Brn.	6-28-67
Lake 15-15a	22	1E	15	Cr. 21-7 via ditch	2.1	7.0	30	0	0.09	0.08	0.3	1.37	7	7.8	27	Lt. Brn.	6-29-67
Lake 15-15b	22	1E	15	Cr. 21-7 via ditch	5.6	12.5	25	0	0.16	0.06	0.4	1.32	8	8.2	26	Lt. Brn.	6-29-67
Lake 17-1	22	1E	17	Landlocked	0.5	1.0	100	0	0.06	0.01	0.1	1.31	5	5.8	27	Lt. Brn.	6-30-67
Lake 17-13	22	1E	17	Creek 20-3	0.4	2.5	100	0	0.04	0.02	0.1	1.45	5	5.8	29	Lt. Brn.	6-30-67
Lake 21-7	22	1E	21	Creek 21-7	17.4	9.0	85	0	0.62	0.08	1.7	2.89	12	7.1	29	Lt. Brn.	8-9-67
Lake 22-2	22	1E	22	Landlocked	5.4	6.0	80	0	0.15	0.08	0.4	1.17	4	6.8	20	Lt. Brn.	8-9-67
Lake 31-3	22	1E	31	Landlocked	3.3	5.5	15	0	0.16	0.05	0.4	1.72	3	7.8	26	Clear	7-13-67
Lake 33-10	22	1E	33	Landlocked	0.8	5.0	20	0	0.08	0.02	0.2	1.40	4	7.6	28	Clear	7-13-67
Lake 36-7	22	2E	36	Indian Cr. via ditch	28.4	3.0	85	0	0.50	0.10	1.5	2.01	5	6.8	28	Med. Brn.	7-11-67
Lake 36-11	22	1E	36	Indian Creek	17.3	&0	20	0	0.34	0.10	1.2	2.04	5	6.8	25	Med. Brn.	7-11-67
Hixton Tn.																	
Lake 30-1	22	5W	30	Lowe Cr. via ditch	1.1	7.0	25	0	0.06	0.04	0.2	1.09	7	&1	31	Clear	9-21-67
Lake 30-4 (Lowe Creek Pond)	22	5W	30	Lowe Creek	4.9	6.0	35	0	0.15	0.09	0.5	1.61	7	7.8	35	Clear	9-21-67
Irving Tn.																	
Lake 5-9	20	4W	5	Landlocked	0.2	2.5	100	0	0.03	0.02	0.1	1.64	10	7.2	36	Lt. Brn.	10-10-67
Lake 10-2	20	5W	10	Trout Run Creek	1.8	12.0	30	0	0.13	0.05	0.5	2.43	33	7.6	105	Clear	10-17-67
Lake 11-3	20	5W	11	Creek 11-14	0.3	2.5	100	0	0.03	0.02	0.1	1.49	56	8.2	171	Clear	10-10-67
Knapp Tn.																	
Lake 2-7	20	1W	2	Drained	4.8	8.5	50	0	0.15	0.07	0.4	1.29	4	5.4	20	Lt. Brn.	8-18-67
Lake 3-14	20	1W	3	Cr. 28-2 via ditch	28.6	11.0	40	0	0.40	0.20	1.6	2.08	4	5.6	19	Lt. Brn.	8-21-67
Lake 3-15	20	1W	3	Creek 28-2	3.1	12.0	30	0	0.11	0.06	0.3	1.22	3	5.8	17	Lt. Brn.	8-21-67
Lake 5-1	20	1W	5	Hawkins Cr. via ditch	0.4	6.0	75	0	0.04	0.03	0.2	1.81	13	6.2	31	Lt. Brn.	8-16-67
Lake 5-3	20	1W	5	Hawkins Creek	11.8	7.0	20	0	0.25	0.10	0.8	1.66	4	5.6	16	Lt. Brn.	8-16-67
Lake 5-4	20	1W	5	Hawkins Cr. via ditch	19.1	11.0	25	0	0.34	0.10	1.0	1.63	6	5.6	24	Lt. Brn.	8-16-67
Lake 21-1	20	1W	21	E. Fk. Lemonweir R.	2.1	&0	5	0	0.12	0.03	0.4	1.86	10	6.5	43	Lt. Brn.	9-30-67
Lake 25-1	20	1W	25	E. Fk. Lemonweir R. via ditch	2.6	5.0	85	0	0.11	0.08	0.5	2.04	4	7.2	43	Med. Brn.	10-24-67
Lake 25-6	20	1W	25	E. Fk. Lemonweir R. via ditch	39.8	12.5	20	0	0.44	0.20	1.0	1.14	6	7.7	31	Lt. Brn.	10-24-67
Lake 26-6	20	1W	26	E. Fk. Lemonweir R. via ditch	33.3	5.0	20	0	0.38	0.20	1.2	1.48	6	7.5	26	Lt. Brn.	10-24-67

APPENDIX I – Physical and Chemical Data of Jackson County Lakes and Impoundments (Continued)

Unnamed Waters	T-N	LOCATION R-E,W	SEC.	DRAINAGE SYSTEM	SURFACE ACRES	MAX. KNOWN DEPTH (FEET)	SURFACE ACRES UNDER 3 FEET (PERCENT)	SURFACE ACRES OVER 20 FEET (PERCENT)	LENGTH (MILES)	WIDTH (MILES)	SHORELINE (MILES)	SHORELINE DEV. FACTOR	METHYL PURPLE ALKALINITY (PPM)	pH	SPECIFIC CONDUCTANCE (mmhos-77°F)	WATER COLOR	DATE OF SAMPLING
Knapp Tn. (Continued)																	
Lake 27-2	20	1W	27	E. Fk. Lemonweir R.	13.4	9.5	65	0	0.28	0.06	1.0	1.82	6	8.0	31	Med. Brn.	10-24-67
Lake 35-3	20	1W	35	E. Fk. Lemonweir R. via ditch	30.6	11.5	35	0	0.36	0.16	1.4	1.76	5	8.0	19	Clear	10-19-67
Lake 35-6	20	1W	35	E. Fk. Lemonweir R.	34.8	4.5	75	0	0.35	0.23	1.0	1.25	5	7.6	28	Lt. Brn.	10-19-67
Lake 35-9	20	1W	35	E. Fk. Lemonweir R. via ditch	61.6	10.0	35	0	0.58	0.25	1.7	1.51	7	8.4	24	Clear	10-19-67
Lake 36-14	20	1W	36	E. Fk. Lemonweir R.	170.0	6.5	88	0	0.80	0.56	5.0	2.76	8	7.8	24	Lt. Brn.	10-19-67
Lake 3-11	21	1W	3	Morrison Cr. via ditches & flowages	23.1	16.0	25	0	0.25	0.18	0.9	1.41	3	6.0	20	Lt. Brn.	8-11-67
Lake 9-4	21	1W	9	Morrison Cr. via ditch and Potter Flowage	8.1	10.0	75	0	0.21	0.11	0.7	1.63	4	6.1	15	Lt. Brn.	8-10-67
Lake 9-13	21	1W	9	Morrison Cr. via ditch and Potter Flowage	13.6	7.0	85	0	0.25	0.15	0.8	1.54	4	6.0	14	Lt. Brn.	8-10-67
Lake 10-6	21	1W	10	Morrison Cr. via ditch and Potter Flowage	4.9	10.0	50	0	0.59	0.19	1.3	4.20	4	6.0	11	Lt. Brn.	8-11-67
Lake 10-7	21	1W	10	Morrison Cr. via ditch and Potter Flowage	9.3	6.5	75	0	0.26	0.08	0.6	1.47	4	5.9	20	Lt. Brn.	8-10-67
Lake 10-10	21	1W	10	Morrison Cr. via ditch and Potter Flowage	5.2	8.0	80	0	0.18	0.06	0.4	1.36	3	5.6	21	Lt. Brn.	8-10-67
Lake 16-5	21	1W	16	Landlocked	5.4	4.5	90	0	0.19	0.10	0.7	2.16	5	6.8	20	Med. Brn.	8-31-67
Lake 17-7	21	1W	17	Morrison Cr. via flowage & ditch	8.9	5.0	90	0	0.15	0.14	0.7	1.68	5	7.4	24	Lt. Brn.	9-1-67
Lake 18-14	21	1W	18	Morrison Cr. via ditch	17.3	7.0	65	0	0.27	0.14	0.9	1.45	5	7.4	26	Lt. Brn.	9-1-67
Lake 27-10	21	1W	27	McKenna Cr. via ditch	18.3	6.0	70	0	0.36	0.14	1.1	1.79	4	6.2	23	Lt. Brn.	8-15-67
Lake 27-15	21	1W	27	Creek 28-2	11.5	8.0	10	0	0.45	0.06	1.1	2.31	4	6.1	24	Lt. Brn.	8-15-67
Lake 29-16	21	1W	29	Hawkins Creek	11.5	6.0	80	0	0.40	0.06	1.0	2.10	10	7.3	29	Lt. Brn.	11-7-67
Lake 31-6	21	1W	31	Townline Creek	30.3	6.0	70	0	0.44	0.15	1.6	2.02	6	8.0	24	Med. Brn.	9-15-67
Lake 32-4	21	1W	32	Hawkins Creek	1.6	12.0	20	0	0.09	0.04	0.3	1.93	11	7.6	28	Lt. Brn.	8-17-67
Lake 32-13	21	1W	32	Hawkins Cr. via ditch	14.2	12.0	5	0	0.39	0.15	1.2	2.27	8	6.8	23	Lt. Brn.	8-18-67
Lake 34-8	21	1W	34	Creek 28-2	25.5	12.5	20	0	0.56	0.22	1.6	2.28	8	5.4	20	Lt. Brn.	8-16-67
Lake 35-6	21	1W	35	McKenna Cr. via ditch	21.5	7.5	40	0	0.30	0.10	1.3	1.93	7	5.7	27	Lt. Brn.	8-15-67
Komensky Tn.																	
Lake 29-8	22	2W	29	Creek 29-8	2.6	6.5	45	0	0.10	0.07	0.5	1.99	7	8.2	27	Lt. Brn.	8-29-67
Lake 23-3 (Morrison Cr. Oxbow Trout Pond)	22	3W	23	Morrison Creek	5.5	5.0	35	0	0.09	0.01	1.8	5.59	8	7.2	22	Clear	8-10-67
Manchester Tn.																	
Lake 30-9	20	3W	30	Stony Creek	0.6	2.5	100	0	0.06	0.02	0.2	1.75	17	7.6	59	Lt. Brn.	10-18-67
Lake 4-8	20	4W	4	Creek 5-14	2.7	7.0	25	0	0.16	0.04	0.4	1.52	12	7.5	37	Clear	10-18-67

APPENDIX I – Physical and Chemical Data of Jackson County Lakes and Impoundments (Continued)

Unnamed Waters	LOCATION T-N. R-E. W SEC.			DRAINAGE SYSTEM	SURFACE ACRES	MAX. KNOWN DEPTH (FEET)	SURFACE ACRES UNDER 3 FEET (PERCENT)	SURFACE ACRES OVER 20 FEET (PERCENT)	LENGTH (MILES)	WIDTH (MILES)	SHORELINE MILES)	SHORELINE DEV. FACTOR	METHYL PURPLE ALKALINITY (PPM)	pH	SPECIFIC CONDUCTANCE (mmhos-77°F)	WATER COLOR	DATE OF SAMPLING
Millston Tn.																	
Lake 22-2	20	2W	22	Ketchum Creek	8.6	5.5	60	0	0.28	0.08	0.7	1.76	6	7.0	22	Med. Brn.	10-5-67
Lake 23-15	20	2W	23	Beltz Cr. via ditch	65.0	13.0	35	0	0.83	0.20	2.0	1.78	6	6.9	31	Med. Brn.	10-25-67
Lake 27-1	20	2W	27	Beltz Cr.	37.6	5.0	70	0	0.50	0.18	1.7	2.13	6	7.6	32	Lt. Brn.	10-25-67
Lake 27-3	20	2W	27	Rudes Creek	2.4	4.5	65	0	0.16	0.04	0.6	2.53	10	7.9	34	Med. Brn.	10-25-67
Lake 27-13	20	2W	27	Rudes Creek	10.5	4.5	92	0	0.33	0.06	0.9	2.05	6	7.2	31	Lt. Brn.	10-25-67
Lake 8-4 (Big Bear Flow.)	21	2W	8	Dickey Creek	6.9	6.0	97	0	0.15	0.10	0.5	1.24	11	6.9	30	Med. Brn.	9-14-67
Lake 9-10 (Lower Wilson Marsh Flow.)	21	2W	9	Dickey Creek	3.6	6.5	80	0	0.13	0.06	0.4	1.36	8	7.4	26	Lt. Brn.	9-14-67
Lake 13-6	21	2W	13	Morrison Cr. via ditches & flow.	1.1	1.5	100	0	0.07	0.02	0.2	1.50	6	7.6	38	Lt. Brn.	8-23-67
Lake 13-8	21	2W	13	Landlocked	1.0	2.0	100	0	0.12	0.06	0.4	2.88	5	8.0	25	Lt. Brn.	8-23-67
Lake 14-14	21	2W	14	Landlocked	0.1	1.5	100	0	0.01	0.01	0.0	1.75	10	7.3	43	Lt. Brn.	9-8-67
North Bend Tn.																	
Lake 31-14 (Horseshoe)	19	6W	31	Landlocked	7.5	3.5	90	0	0.23	0.06	1.7	4.42	34	7.1	112	Lt. Brn.	10-5-67
TOTALS AND AVERAGES	30 Named Lakes				1,153.5	7.8					69.4	2.53	10.7	7.2	46		
	112 Unnamed Lakes				2,009.2	6.5					118.4	2.12	8.0	6.7	34		
GRAND TOTALS AND AVERAGES	142 Lakes				3,162.7	6.9					187.8	2.21	8.5	6.8	36		

Appendix IA

Named Waters	Watershed Area (sq. miles)	Percent Muck Shore	Adjoining Wetlands 1/ Acres	Percent Woody	Percent Nonwoody	Public Frontage (miles)	No. of Dwellings
Battle Point Flowage	1.8	70	21.0		100	1.3	0
Black Duck Flowage	4.9	95	52.0	8	92	2.3	0
Black River Flowage	1,610.0	0	0.0			.01	41
Douglas Pond	21.0	70	5.0		100	.01	14
Dry Land Flowage	.41	20	52.0		100	.94	0
Funmaker Flowage	.41	80	9.6		100	.7	0
Goodyear	.46	100	294.4	35	65	0.0	0
Horse Shoe	.8	100	5.0	80	20	0.0	0
Lee	15.0	20	0.0			.22	4
Little Bear Flowage	3.4	50	28.0		100	.81	0
Little Thunder Flowage	.86	40	35.0	3	97	.54	0
Mallard Flowage	.74	75	85.0		100	1.1	0
Oakwood Lake (Upper Merrillan Pond)	45.0	70	0.0			.1	19
Partridge Crop Flowage	7.8	60	37.0		100	1.7	0
Pigeon Creek Flowage	2.8	90	28.0	100		1.3	0
Potter Flowage	58.0	60	4.8		100	12.7	0
Range Line Flowage	7.8	90	0.0			.7	0
Seventeen Flowage	7.21	70	364.0		100	0.0*	0
Squaw Mound Flowage	2.8	80	55.0	8	92	1.0	0
Staffon School Flowage	2.68	20	96.0		100	1.3	0
Stevens (Stebbins)	.25	50	0.0			.4	2
Tanner Flowage	4.89	70	180.0	2	98	.96	0
Teal Flowage	7.5	18	18.0		100	1.3	0
Townline Flowage	6.6	35	188.0	20	80	7.1	0
Trow Lake (Lower Merrillan Pond)	70.0	40	0.0			.6	18

Appendix IA (continued)

Named Waters	Watershed Area (sq. miles)	Percent Muck Shore	Adjoining Wetlands 1/ Acres	Percent Woody	Percent Nonwoody	Public Frontage (miles)	No. of Dwellings
Weber Flowage	.63	70	56.0		100	.8	0
Whitetail Flowage	2.8	65	165.0		100	2.3	0
Wildcat Flowage	2.56	60	300.0	1	99	.64	0
Wilson Marsh Flowage	1.24	80	158.0		100	1.9	0
Wyman	2.2	15	0			0.0	15
Unnamed Waters							
Adams Tn. (T21-22N, R3-4W)							
T21N-R4W							
Lake 5-14	0.64	10	0.0			0.0	0
T22N-R3W							
Lake 3-9	0.09	5	0.0			0.0	11
Lake 3-14	0.01	30	0.0			0.0	0
Lake 3-15	0.04	30	0.0			0.0	0
Lake 8-10	1.1	70	0.0			0.0	0
Lake 10-6 (Arbutus Canal)	1,294.97	40	0.0			.02	1

Appendix IA (continued)

Unnamed Waters	Watershed Area (sq. miles	Percent Muck Shore	Adjoining Wetlands 1/ Acres	Percent Woody	Percent Nonwoody	Public Frontage (miles)	No. of Dwellings
Bear Bluff Tn. (T20-21N,R1E)							
T20N-R1E							
Lake 2-15	0.4	80	92.0		100	0.0	0
Lake 3-4	1.64	40	819.0	50	50	.1	0
Lake 3-9	0.26	60	154.0	15	85	0.0	0
Lake 3-13	4.33	50	685.0		100	.29	0
Lake 12-7	0.9	50	40.0	8	92	0.0	0
Lake 13-8	4.8	50	204.0		100	0.0	0
Lake 13-9	0.1	90	38.4		100	0.0	3
Lake 13-13	0.25	50	15.0		100	.11	0
Lake 13-14	0.07	40	10.0	70	30	0.0	0
Lake 14-6	0.16	40	70.0		100	0.0	0
Lake 16-1	7.5	80	768.0	21	79	0.0	0
Lake 16-13	6.9	40	105.0		100	0.0	0
Lake 19-11	4.9	60	1,881.0	81	19	.01	0
Lake 20-2	0.8	80	476.0	55	45	0.0	0
Lake 20-13	0.6	50	319.0	10	90	0.0	0
Lake 21-2	7.3	50	130.0	50	50	0.0	0
Lake 21-6	0.4	60	45.0	100		0.0	1
Lake 21-10	0.05	50	10.0	100		0.0	0
Lake 23-10	0.03	40	19.0		100	0.0	0

Appendix 1A (continued)

Unnamed Waters	Watershed Area (sq. miles)	Percent Muck Shore	Adjoining Wetlands 1/ Acres	Percent Woody	Percent Nonwoody	Public Frontage (miles)	No. of Dwellings
City Point Tn. (T21-22N, R1E)							
T21N-R1E							
Lake 1-6	19.0	95	0.0			0.0	0
Lake 2-14	18.5	90	200.0	50	50	1.2	0
Lake 7-6	0.08	100	12.0	80	20	0.09	0
Lake 9-2	13.2	30	132.0	18	82	.75	0
T22N-R1E							
Lake 11-13	0.12	100	14.0		100	0.0	1
Lake 15-13	1.11	100	270.0	61	39	1.54	0
Lake 15-14	1.15	100	6.0		100	.44	0
Lake 15-15a	0.02	100	0.0			.28	0
Lake 15-15b	0.04	60	0.0			0.25	0
Lake 17-1	2.85	100	474.0	3	97	0.0	0
Lake 17-13	3.35	100	0.0			0.0	0
Lake 21-7	6.28	10	19.0	5	95	0.0	0
Lake 22-2	0.12	85	2.5	100		0.0	0
Lake 31-3	0.28	5	0.0			.44	0
Lake 33-10	0.06	25	0.0			.18	0
Lake 36-7	20.1	95	19.0		100	0.0	0
Lake 36-11	19.1	45	0.0			0.0	0

Appendix IA (continued)

Unnamed Waters	Watershed Area (sq. miles)	Percent Muck Shore	Adjoining Wetlands 1/ Acres	Percent Woody	Percent Nonwoody	Public Frontage (miles)	No. of Dwellings
Lake 24-2	0.2	60	3.6	60	40	0.0	0
Lake 24-6	1.0	30	40.0		100	0.0	0
Lake 25-11	1.6	60	32.0	50	50	0.0	0
Lake 26-11	10.8	10	0.0			0.0	2
Lake 31-2	5.0		100.0	15	85	0.0	0
Lake 31-5	0.2		10.0		100	0.0	0
Lake 31-6	0.32		60.0		100	0.0	0
Lake 36-15	11.9	100	85.0		100	0.0	0
T21N-R1E							
Lake 25-4	3.0	90	55.0	10	90	0.9	0
Lake 26-16	0.6	100	72.0	18	82	0.0	0
Lake 34-2	1.9	90	84.0		100	0.0	0
Lake 34-4	2.1	100	60.0	6	94	0.0	0
Lake 35-13	2.6	60	77.0		100	0.0	0
Lake 35-14	0.3	60	154.0		100	0.01	0
Brockway Tn. (T21N-R3-4W)							
T21N-R3W							
Lake 30-11	9.2	85	0.0			0.0	0
Lake 31-3	9.06	85	20.0		100	0.0	0
Lake 31-6	9.34	70	0.0			0.0	0
T21N-R4W							
Lake 25-16	9.38	80	0.0			0.0	1

Appendix IA (continued)

Unnamed Waters	Watershed Area (sq. miles)	Percent Muck Shore	Adjoining Wetlands 1/ Acres	Percent Woody	Percent Nonwoody	Public Frontage (miles)	No. of Dwellings
Hixton Tn. (T22N-R5W)							
Lake 30-1	1.90	2	0.0			.16	0
Lake 30-4 (Lowe Cr. Pond)	1.84	60	60.0	95	5	.5	0
Irving Tn. (T20N, R4-5W)							
Lake 5-9 (R4W)	0.13	100	62.0	90	10	0.0	0
Lake 10-2 (R5W)	4.4	40	0.0			0.0	0
Lake 11-3 (R5W)	3.2	10	0.0			0.015	0
Knapp Tn. (T20-21N-R1W)							
T20N-R1W							
Lake 2-7	0.7	65	130.0	7	93	0.0	0
Lake 3-14	1.3	55	241.0	93	7	0.0	2
Lake 3-15	1.1	70	241.0	93	7	0.0	0
Lake 5-1	0.06	90	3.2		100	0.0	0
Lake 5-3	1.6	80	123.0		100	0.0	0
Lake 5-4	2.2	40	128.0		100	0.0	0
Lake 21-1	0.44	20	0.0			.08	0
Lake 25-1	0.6	40	372.0	77	23	0.0	0
Lake 25-6	6.3	30	70.0	7	93	0.0	0
Lake 26-6	4.84	40	55.0	67	33	0.0	0
Lake 27-2	3.47	60	28.0	100		0.0	0
Lake 35-3	7.10	40	44.0	50	50	0.0	0

Appendix IA (continued)

Unnamed Waters	Watershed Area (sq. miles)	Percent Muck Shore	Adjoining Wetlands 1/ Acres	Percent Woody	Percent Nonwoody	Public Frontage (miles)	No. of Dwellings
Lake 35-6	7.13	50	25.0	85	15	0.17	0
Lake 35-9	7.85	50	128.0	15	85	0.0	1
Lake 36-14	6.06	30	70.0		100	0.0	0
T21N-R1W							
Lake 3-11	1.28	40	28.0	30	70	0.0	0
Lake 9-4	1.70	95	10.0		100	0.0	0
Lake 9-13	1.94	85	45.0	15	85	0.0	2
Lake 10-6	1.48	90	12.0	50	50	0.0	0
Lake 10-7	1.65	80	40.0		100	0.0	0
Lake 10-10	1.89	80	90.0		100	.44	0
Lake 16-5	0.31	60	35.0		100	.7	0
Lake 17-7	0.21	20	18.0		100	.18	0
Lake 18-14	0.54	20	80.0	45	55	.05	0
Lake 27-10	4.4	90	5.0	50	50	0.0	1
Lake 27-15	4.25	90	0.0			.3	0
Lake 29-16	2.2	20	0.0			0.0	0
Lake 31-6	2.34	60	0.0			0.38	0
Lake 32-4	2.1	80	0.0			0.0	0
Lake 32-13	2.0	30	0.0			0.28	0
Lake 34-8	3.95	65	572.0	23	77	.3	0
Lake 35-6	5.7	85	144.0	4	96	1.09	0

Appendix IA (continued)

Unnamed Waters	Watershed Area (sq. miles)	Percent Muck Shore	Adjoining Wetlands 1/ Acres	Percent Woody	Percent Nonwoody	Public Frontage (miles)	No. of Dwellings
Komensky Tn. (T22N-R2-3W)							
Lake 29-8 (R2W)	7.38	30	0.0			.45	0
Lake 23-3 (Morrison Cr. Oxbow Trout Pond)(R3W)	0.01	3	0.0			1.84	0
Manchester Tn. (T20N,R3-4W)							
Lake 30-9 (R3W)	3.2	100	0.0			.01	1
Lake 4-8 (R4W)	0.09	65	0.0			0.0	0
Millston Tn. (T20-21N, R2W)							
T20N, R2W							
Lake 22-2	0.24	40	145.0		100	0.0	0
Lake 23-15	4.8	60	268.0		100	0.38	0
Lake 27-1	9.1	80	64.0	50	50	0.08	0
Lake 27-3	3.98	40	0.0			0.0**	3
Lake 27-13	3.77	75	2.0		100	0.0	0
T21N-R2W							
Lake 8-4 (Big Bear Flowage)	1.96	100	4.0		100	.46	0
Lake 9-10 (Lower Wilson Marsh Flowage)	1.67	95	65.0		100	.36	0
Lake 13-6	0.05	80	10.0		100	0.0*	0

Appendix IA (continued)

Unnamed Waters	Watershed Area (sq. miles)	Percent Muck Shore	Adjoining Wetlands 1/ Acres	Percent Woody	Percent Nonwoody	Public Frontage (miles)	No. of Dwellings
Lake 13-8	0.17	80	76.0		100	0.0*	0
Lake 14-14	0.007	100	2.5		100	0.0*	0
North Bend Tn. (T19N-R6W)							
Lake 31-14 (Horse Shoe)	0.21	95	15.0		100	1.45	0
Totals and Averages							
Named Waters		61.2	2,236.8			42.73	113
Unnamed Waters		59.0	11,392.2			16.285	30
Grand Totals and Averages		59.4	13,629.0			59.015	143

1/ Includes only the wetlands surrounding lake or impoundment. Does not include wetlands along stream or ditch that flows into lake or impoundment.

* Seventeen Flowage and Lakes 13-6, 13-8 and 14-14 (T21N-R2W) surrounded by State closed area not open to public. Total of 9.96 miles state-owned frontage.

** Shown as none, but actually 20 feet of road right-of-way.

APPENDIX II – Physical and Chemical Data of Jackson County Streams

NAMED STREAMS	OUTLET LOCATION T-N R-E-W SEC.	WATERSHED	SURFACE ACRES	LENGTH (MILES)	AV. WIDTH (FEET)	FLOW* (C.F.S.)	APPROX. WATERSHED AREA WITHIN COUNTY (SQ. MI.)	GRAD. (FT./MI.)	MILES OF PUBLIC FRONTAGE	FISHERY (SEE CODE)	METHYL PURPLE ALKALINITY (ppm)	pH	SPECIFIC CONDUCTANCE (mmhos - 77° F)	WATER COLOR	DATE OF SAMPLING
Allen Creek	21 4W 2	Lake 15-13	2.6	3.3	6.5	3.18**	3.93	50.9	0.0	1	24	7.4	86	Clear	9-7-67
Amo Creek	22 5W 12	Tremp. R. (So. Br.)	1.1	2.0	4.5	0.33	2.38	33.3	0.0	9	15	7.0	98	Clear	6-8-67
Beaver Cr. (N. Br. Beaver Cr.)	20 6W 18	Black River	5.8	5.6	8.5	4.88**	19.80	30.4	1.2	1	52	7.6	174	Clear	9-19-67
Beaver Cr.	23 6W 29	Pigeon Cr.	3.3	4.5	6.0	4.07	6.84	26.7	0.6	9	44	7.9	151	Clear	6-6-67
Beaver Cr., So. Br.	19 6W 7	Beaver Cr.	1.9	3.9	4.0	1.63	11.97	38.7	4.0	9	104	7.6	278	Clear	9-21-67
Big Slough Cr.	22 6W 6	Pigeon Creek	1.1	2.5	3.5	2.16	4.48	31.6	0.0	9	29	7.6	174	Lt. Brn.	6-13-67
Black River	19 6W 31	Mississippi R.	1,371.5	51.2	221.0	290.00	622.80	–	19.1	2,3,4,5,6,7,8	37	7.6	110	Lt. Brn.	9-22-67
Black R., East Fork	22 2W 6	Arbutus Lake	143.6	23.7	50.0	7.07	93.52	–	17.5	2,3,4,5,6,8	11	7.5	45	Med. Brn.	7-13-67
Black Slough Cr.	20 5W 21	Roaring Cr.	0.5	1.6	2.5	0.27	2.67	33.3	0.0	9	43	7.2	122	Clear	9-29-67
Brooks Cr.	23 6W 14	Pigeon Cr.	1.4	2.0	4.0	0.79	2.38	22.2	0.0	9	28	7.6	108	Clear	6-2-67
Buffalo R. (N. Fk. Beef R.)	24 6W 6	Mississippi R.	6.3	8.6	6.0	11.03**	18.34	18.7	0.0	1	11	7.8	65	Clear	5-17-67
Buffalo R. (Beef R.) (So. Fk.)	24 6W 19	Buffalo R.	8.0	7.3	9.0	8.80**	29.26	16.0	0.8	1	10	7.6	47	Clear	5-19-67
Cisna Cr.	23 4W 22	Halls Cr., So. Fk.	1.0	2.7	5.0	1.52**	6.45	20.0	0.0	1	13	7.7	46	Lt. Brn.	5-25-67
Clear (So. Br. Robinson) Cr.	20 3W 29	Robinson Cr.	5.4	3.7	12.0	12.53**	3.36	13.3	1.6	1	9	7.3	54	Lt. Brn.	10-6-67
Crawford Cr.	22 2W 35	Morrison Cr.	1.5	3.1	4.0	0.81	8.55	–	4.6	9	6	6.8	31	Med. Brn.	7-19-67
Curran Coulee Cr.	22 6W 35	Trempealeau R.	2.7	4.5	5.5	4.42	10.65	21.0	0.5	9	46	7.6	154	Lt. Brn.	6-21-67
Davis Cr.	19 6W 36	Black R.	1.4	0.8	15.0	4.79	0.22	–	0.0	9	49	7.6	142	Clear	9-22-67
Davis Cr.	22 3W 3	Arbutus Canal	0.4	0.5	6.0	0.45	0.25	–	0.0	9	6	6.4	23	Med. Brn.	7-7-67
Dickey Cr.	22 3W 29	Morrison Cr.	10.6	7.6	11.5	4.59	12.14	–	12.8	9	5	7.0	28	Med. Brn.	7-6-67
Douglas (Shake Hollow) Cr.	19 5W 9	Black R.	14.9	8.2	15.0	4.88	21.11	22.8	0.0	1	84	7.4	233	Clear	7-30-67
Fall Coulee (Stony) Cr.	22 5W 18	Trempealeau R.	5.1	5.3	8.0	2.95**	11.07	35.5	0.2	1	30	7.4	113	Turbid	6-23-67
French Cr.	21 6W 5	Trempealeau R.	9.6	8.3	9.5	6.13**	26.67	11.4	0.0	1	35	7.6	101	Clear	8-22-67
Glen Cr.	20 3W 24	Robinson Cr.	3.4	3.5	8.0	5.24**	15.18	20.0	7.0	1	7	7.6	56	Drk. Brn.	10-10-67
Halls Cr.	22 3W 30	Black R.	56.5	22.1	30.8	268.31	74.36	11.3	8.6	1,4,6,8	15	7.7	65	Lt. Brn.	6-30-67
Halls Cr., E. Fk.	23 4W 26	Halls Cr.	24.0	9.0	22.0	7.44	15.23	14.5	3.8	8	11	7.8	53	Lt. Brn.	5-25-67
Halls Cr., So. Fk.	23 4W 22	Halls Cr.	8.5	7.7	9.5	4.32	19.74	17.0	0.0	9	32	7.7	85	Lt. Brn.	5-24-67
Hawkins Cr.	21 1W 29	Potter Flowage	2.7	2.8	8.0	0.49	3.85	–	0.6	8	9	6.8	35	Med. Brn.	9-14-67
Hay Cr.	22 1E 12	Black R., E. Fk.	5.5	3.5	13.0	33.77	5.28	–	3.0	8	6	7.0	40	Med. Brn.	7-13-67
Hay Cr.	22 3W 22	Morrison Cr.	6.6	6.0	9.0	5.92	7.40	–	11.5	9	5	7.0	30	Med. Brn.	7-11-67
Hoffman Cr.	21 4W 18	Kenyon Cr.	1.0	1.6	5.0	0.15	2.57	22.2	0.0	9	57	8.4	294	Clear	8-29-67
Holmes Cr.	22 5W 19	Trempealeau R.	0.8	1.8	3.5	1.26	2.79	20.0	0.0	9	20	7.4	81	Lt. Brn.	6-23-67
Indian Cr.	22 1E 26	Black R., E. Fk.	4.3	4.4	8.0	1.03	26.46	–	1.5	4,8	4	6.0	43	Med. Brn.	8-3-67
Indian (Valentine) Cr.	22 3W 28	Morrison Cr.	2.3	2.9	6.5	1.79**	3.58	–	4.2	1	6	7.1	33	Lt. Brn.	7-6-67

APPENDIX II – Physical and Chemical Data of Jackson County Streams (Continued)

NAMED STREAMS	OUTLET LOCATION T-N R-E-W SEC.	WATERSHED	SURFACE ACRES	LENGTH (MILES)	AV. WIDTH (FEET)	FLOW* (C.F.S.)	APPROX. WATERSHED AREA WITHIN COUNTY (SQ.MI.)	GRAD. (FT./MI.)	MILES OF PUBLIC FRONTAGE	FISHERY (SEE CODE)	METHYL PURPLE ALKALINITY (ppm)	pH	SPECIFIC CONDUCTANCE (mmhos - 77° F)	WATER COLOR	DATE OF SAMPLING
Indian Grave Cr.	21 3W 8	Levis Cr.	3.2	5.3	6.0	1.17	11.58	–	0.0	9	8	7.4	33	Lt. Brn.	9-12-67
Jay Cr.	20 1W 34	Lemonweir R., E. Fk.	3.2	3.8	7.0	2.70**	6.46	–	1.8	1	3	7.2	42	Lt. Brn.	10-13-67
Jonah Coulee Cr.	21 6W 4	Trempealeau R.	0.6	2.3	2.0	0.20	2.64	48.0	0.0	9	33	8.4	99	Clear	8-22-67
Judkins Cr.	23 5W 33	Tremp. R., N. Br.	1.4	3.4	3.5	1.55**	5.27	16.0	0.0	9	25	7.6	78	Clear	5-29-67
Kay Cr.	24 6W 5	Buffalo R.	0.5	2.0	2.0	0.57	1.13	61.5	0.0	9	8	7.9	31	Clear	5-17-67
Kenyon Cr.	21 4W 20	Squaw Cr.	2.9	3.0	8.0	6.52**	5.75	37.5	0.0	1	34	8.4	294	Clear	8-29-67
Ketchum Cr.	20 2W 20	Robinson Cr.	2.2	2.6	7.5	0.99	3.64	20.0	4.6	9	5	7.5	36	Med. Brn.	10-11-67
Kunes Cr.	19 5W 2	Black R.	0.7	1.5	4.0	0.14	1.86	60.0	0.0	9	104	7.6	276	Clear	9-26-67
Lemonweir R., E. Fk. (Fish Cr.)	20 1W 36	Lemonweir R.	1.4	2.2	5.0	0.33**	13.19	–	0.2	1	8	6.8	34	Med. Brn.	10-13-67
Levis Cr.	21 4W 11	Lake 15-13	26.7	11.6	19.0	10.04**	39.59	–	4.1	1	6	8.0	41	Med. Brn.	9-8-67
Lowe Cr.	22 6W 24	Trempealeau R.	1.6	2.7	5.0	1.48**	3.21	30.0	0.8	1	6	7.4	21	Clear	6-22-67
Lyons Cr.	23 6W 14	Pigeon Cr.	0.4	1.8	2.0	0.34	2.66	50.0	0.0	9	30	7.7	98	Lt. Brn.	6-2-67
McKenna Cr.	21 1W 28	Potter Flowage	2.9	3.0	8.0	0.33	15.04	–	3.0	8	5	6.3	31	Med. Brn.	9-14-67
Mill Cr.	19 6W 29	Black R.	1.6	3.7	3.5	1.05	7.87	31.1	0.0	9	179	7.5	405	Clear	9-26-67
Mollies Cr.	22 3W 22	Morrison Cr.	12.3	9.2	11.0	1.99	13.81	–	14.2	8	7	7.0	33	Med. Brn.	7-11-67
Morrison Cr.	22 3W 29	Black R.	94.7	21.7	36.0	23.00	131.02	–	37.9	2,3,4,6,8	4	7.5	27	Med. Brn.	7-12-67
Paines Cr.	23 4W 14	Halls Cr., E. Fk.	0.4	3.3	4.0	0.50	3.60	25.0	6.1	9	3	6.6	18	Med. Brn.	5-24-67
Papoose Cr.	21 4W 19	Squaw Cr.	1.2	1.6	6.0	0.87	2.88	32.0	0.0	9	40	7.6	125	Clear	8-29-67
Perry Cr.	21 4W 27	Black R.	12.1	7.7	13.0	2.12	23.37	25.5	3.7	1	8	7.8	37	Lt. Brn.	9-8-67
Pigeon Cr.	20 2W 17	Glen Cr.	1.4	4.7	2.5	0.50**	6.45	38.1	6.9	1	4	7.3	42	Med. Brn.	10-10-67
Pigeon Cr.	23 6W 30	Trempealeau R.	12.1	9.1	11.0	13.26**	44.42	15.4	0.5	1	24	7.8	87	Lt. Brn.	6-6-67
Pine Cr.	22 6W 34	Trempealeau R.	5.3	5.5	8.0	6.98**	11.30	20.0	0.0	1	11	7.6	54	Clear	6-22-67
Pine Grove Cr.	20 4W 5	Black R.	1.1	2.2	4.0	0.71	1.89	53.0	0.0	9	152	7.8	449	Clear	10-3-67
Roaring Cr.	20 5W 36	Black R.	5.1	4.7	9.0	2.08	9.45	23.0	0.0	9	85	7.5	317	Clear	10-3-67
Robinson Cr.	20 4W 17	Black R.	86.5	21.0	34.0	48.75**	80.77	9.0	16.0	1,4,8	11	7.3	62	Lt. Brn.	10-4-67
Rock Cr.	22 2W 4	Black R., E. Fk.	4.0	1.3	25.5	4.60	0.89	–	0.8	9	9	7.2	38	Med. Brn.	7-12-67
Rudes Cr.	20 2W 29	Wyman Cr.	3.5	3.6	8.0	5.04	2.25	13.3	5.7	8	5	7.6	41	Med. Brn.	10-12-67
Sand Cr.	19 5W 29	Black R.	7.9	2.6	25.0	14.94**	1.68	20.0	0.0	1	27	7.5	89	Clear	9-28-67
Sands Cr.	23 6W 28	Pigeon Cr.	1.1	2.5	3.5	0.68	2.55	30.0	0.0	9	32	7.7	100	Lt. Brn.	6-2-67
Schermerhorn Cr.	23 6W 31	Pigeon Cr.	2.2	4.0	4.5	2.21	5.68	25.0	0.6	9	44	7.8	151	Lt. Brn.	6-13-67
Shamrock Cr.	20 4W 25	Stony Cr.	2.8	2.2	10.5	2.10**	2.36	20.0	0.0	1	45	7.2	187	Clear	10-5-67
Skutley Coulee Cr.	21 6W 7	Trempealeau R.	2.2	4.5	4.0	0.59**	7.21	21.3	0.0	1	44	8.6	180	Clear	8-22-67

APPENDIX II – Physical and Chemical Data of Jackson County Streams (Continued)

NAMED STREAMS	OUTLET LOCATION T-N R-E-W SEC.	WATERSHED	SURFACE ACRES	LENGTH (MILES)	AV. WIDTH (FEET)	FLOW* (C.F.S.)	APPROX. WATERSHED AREA WITHIN COUNTY (SQ.MI.)	GRAD. (FT./MI.)	MILES OF FISHERY PUBLIC FRONTAGE	(SEE CODE)	METHYL PURPLE ALKALINITY (ppm)	pH	SPECIFIC CONDUCTANCE (mmhos - 77° F)	WATER COLOR	DATE OF SAMPLING
Snow Cr.	21 4W 2	Lake 15-13	1.5	2.8	4.5	1.04**	3.98	50.0	0.0	1	7	7.4	66	Clear	9-7-67
Solam Cr.	24 6W 11	Buffalo R.	0.1	0.7	1.5	0.41**	1.96	26.7	0.0	1	7	7.4	65	Clear	5-17-67
Spring Cr.	21 4W 33	Black R.	1.5	2.5	5.0	0.83	2.98	83.3	0.0	9	125	7.6	291	Clear	8-31-67
Squaw Cr.	21 4W 33	Black R.	14.2	7.1	16.5	12.51**	20.76	24.0	0.0	1	32	7.4	110	Clear	9-1-67
Stanton Cr.	20 2W 17	Glen Cr.	0.4	0.6	5.0	0.90	2.34	40.0	1.2	9	5	7.6	39	Lt. Brn.	10-10-67
Stony Cr.	20 4W 24	Robinson Cr.	2.4	2.5	8.0	3.06**	5.49	34.3	1.0	1	30	7.5	125	Clear	10-5-67
Tank Cr.	22 5W 17	Trempealeau R.	6.4	5.0	10.5	5.54**	13.24	18.2	1.1	1	10	7.6	68	Clear	6-28-67
Timber Cr.	23 6W 30	Pigeon Cr.	1.7	3.5	4.0	2.16	3.16	38.9	0.0	9	51	7.6	155	Clear	6-6-67
Town Cr.	21 4W 15	Black R.	2.9	3.0	8.0	2.50	5.91	56.0	0.1	9	35	7.7	118	Clear	9-1-67
Townline Cr.	21 2W 12	Morrison Cr.	2.7	4.1	5.5	0.66	10.41	–	3.0	9	4	7.3	30	Med. Brn.	9-13-67
Trempealeau R.	21 6W 7	Mississippi R.	50.5	17.9	20.0	42.85	150.22	9.7	0.0	1,4,8	26	7.6	107	Clear	8-23-67
Trempealeau R., N. Br.	22 5W 9	Trempealeau R.	9.2	7.2	10.5	9.16**	20.72	28.5	11.2	1	22	8.0	86	Clear	6-27-67
Trout Run Cr.	20 4W 19	Black R.	28.0	7.0	33.0	11.09	17.61	25.0	0.2	1	57	7.6	178	Clear	10-3-67
Trump Coulee Cr.	21 6W 30	Trempealeau R.	2.2	3.0	6.0	1.62**	7.09	25.0	0.0	1	48	7.5	137	Clear	8-23-67
Vismal Cr.	22 3W 17	Black R.	2.6	3.0	7.0	1.10**	3.06	40.0	0.0	1	7	7.3	33	Lt. Brn.	7-5-67
Vosse Coulee Cr.	21 6W 7	Trempealeau R.	1.0	1.0	7.5	1.84	5.34	13.4	0.0	9	47	7.8	143	Clear	8-22-67
White Cr.	19 5W 5	Douglas Cr.	1.9	2.2	7.0	0.58	2.67	40.0	0.0	9	90	7.3	289	Clear	9-27-67
White Cr.	22 2W 20	Morrison Cr.	5.2	7.1	6.0	0.30	9.96	–	14.2	9	4	5.8	32	Drk. Brn.	7-14-67
Wilson Cr.	19 6W 32	Black R.	4.4	3.6	10.0	2.07	6.23	46.7	0.0	9	191	8.0	464	Clear	9-22-67
Wolf Cr.	20 4W 31	Black R.	2.4	2.2	9.0	2.33	2.10	50.0	0.0	9	39	7.4	139	Clear	10-5-67
Wyman Cr.	20 2W 19	Robinson Cr.	4.2	3.5	10.0	4.41**	7.42	20.0	5.0	1	6	7.8	41	Lt. Brn.	10-11-67
UNNAMED STREAMS															
Adams Tn.															
Creek 2-4	21 4W 2	Snow Cr.	0.5	2.0	2.0	0.06	1.80	40.0	0.0	9	8	8.0	67	Clear	9-7-67
Creek 2-11	21 4W 2	Allen Cr.	0.3	1.0	2.5	0.17	0.82	53.3	0.0	9	50	8.0	151	Clear	9-7-67
Creek 10-8	22 3W 10	Black R.	0.6	0.8	6.0	3.84	0.19	–	0.0	9	26	7.1	86	Lt. Brn.	7-7-67
Creek 17-2	22 3W 17	Vismal Cr.	0.4	1.0	3.0	0.24	1.18	50.0	0.0	9	13	6.8	60	Lt. Brn.	7-5-67
Creek 18-10	22 3W 18	Halls Cr.	1.0	2.0	4.0	3.78	2.54	62.5	0.0	1	13	7.2	79	Clear	6-29-67
Creek 19-6	22 3W 19	Halls Cr.	0.3	1.2	2.0	0.17	0.85	100.0	0.0	9	4	5.6	41	Med. Brn.	6-30-67

APPENDIX II – Physical and Chemical Data of Jackson County Streams (Continued)

UNNAMED STREAMS	OUTLET LOCATION T-N R-E-W SEC.	WATERSHED	SURFACE ACRES	LENGTH (MILES)	AV. WIDTH (FEET)	FLOW* (C.F.S.)	APPROX. WATERSHED AREA WITHIN COUNTY (SQ.MI.)	GRAD. (FT./MI.)	MILES OF FISHERY FRONTAGE	PUBLIC ACCESS (SEE CODE)	METHYL PURPLE ALKALINITY (ppm)	pH	SPECIFIC CONDUCTANCE (mmhos - 77° F	WATER COLOR	DATE OF SAMPLING
Adams Tn. (Continued)															
Creek 19-14	22 3W 19	Halls Cr.	0.5	1.3	3.0	0.20	0.94	114.3	0.0	9	12	7.1	52	Med. Brn.	6-30-67
Creek 31-6	22 3W 31	Black R.	0.7	2.0	3.0	0.37	2.06	71.4	0.4	9	6	8.4	72	Clear	7-5-67
Creek 27-16	22 4W 27	Snow Cr.	0.2	0.6	2.0	0.15	0.40	133.3	0.0	9	18	7.0	51	Clear	6-29-67
Creek 33-2	22 4W 33	Allen Cr.	0.4	1.1	3.0	0.72	0.29	10.0	0.0	1	7	6.9	44	Clear	9-7-67
Creek 33-5	22 4W 33	Allen Cr.	0.3	0.7	3.5	1.00	0.50	10.0	0.0	1	15	7.6	75	Clear	9-7-67
Albion Tn.															
Creek 32-5	21 4W 32	Spring Cr.	0.4	1.1	3.0	0.25	1.23	67.7	0.0	9	127	7.6	280	Clear	8-31-67
Creek 5-3	21 5W 5	Pine Cr.	0.4	1.8	2.0	0.16	1.85	57.1	0.0	9	9	7.4	48	Clear	8-24-67
Creek 13-10	21 5W 13	Squaw Cr.	0.2	1.3	5.5	1.49	1.43	40.0	0.0	1	28	7.3	103	Clear	8-24-67
Creek 13-12	21 5W 13	Squaw Cr.	2.0	2.3	7.0	4.01	3.62	30.0	0.0	1	18	7.4	84	Clear	8-29-67
Creek 14-14	21 5W 14	Cr. 13-10	0.5	1.1	4.0	0.54	0.72	80.0	0.0	1	18	7.3	80	Clear	8-24-67
Alma Tn.															
Creek 12-3	22 4W 12	Halls Cr.	1.1	1.8	5.0	0.78	1.18	83.3	0.0	9	6	7.6	46	Clear	6-30-67
Creek 13-3	22 4W 13	Cr. 18-10	0.6	2.1	2.5	0.23	0.63	62.6	0.0	9	8	7.0	105	Clear	6-29-67
Creek 13-6	22 4W 13	Cr. 18-10	0.6	1.0	5.0	1.07	0.82	100.0	0.0	9	21	7.0	82	Clear	6-29-67
Creek 14-4	22 4W 14	Cr. 13-6	0.1	0.9	2.5	0.20	0.36	80.0	0.0	9	26	7.4	106	Clear	6-29-67
Creek 18-16	22 4W 18	Trempealeau R.	0.2	1.2	1.0	0.05	0.90	50.0	0.0	9	21	7.1	108	Med. Brn.	6-28-67
Creek 4-5	23 4W 4	Halls Cr., E. Fk.	0.2	0.5	3.0	0.31	0.12	26.7	0.0	9	16	7.8	81	Clear	5-23-67
Creek 11-16	23 4W 11	Paines Cr.	0.7	1.5	4.0	0.79	1.66	16.7	3.0	9	2	6.6	19	Med. Brn.	5-23-67
Brockway Tn.															
Creek 9-13	21 3W 9	Levis Cr.	0.1	0.5	1.5	–	1.51	–	0.0	9	4	6.0	28	Med. Brn.	9-12-67
Creek 14-9	21 3W 14	Levis Cr.	2.7	3.2	7.0	0.58	1.70	–	0.0	9	10	7.5	36	Lt. Brn.	9-12-67
Creek 24-2	21 3W 24	Levis Cr.	0.3	0.8	3.5	0.01	1.12	–	0.8	9	19	6.7	57	Lt. Brn.	9-12-67
Creek 24-5	21 3W 24	Levis Cr.	1.4	2.3	5.0	0.43	5.24	–	2.6	9	12	6.3	43	Lt. Brn.	9-12-67
Creek 22-1 (Depot Cr.)	21 4W 22	Black R.	0.6	1.7	3.0	0.51	2.98	60.0	0.0	9	12	7.5	99	Lt. Brn.	9-8-67
City Point Tn.															
Creek 1-11	22 1E 1	Hay Cr.	0.9	1.1	7.0	1.30	0.76	–	2.2	9	9	6.9	52	Med. Brn.	6-14-67
Creek 20-3	22 1E 20	Black R., E. Fk.	0.3	1.5	1.5	0.07	3.79	–	0.0	9	17	6.7	55	Med. Brn.	8-3-67
Creek 21-7	22 1E 21	Black R., E. Fk.	2.3	2.7	7.0	1.60	5.67	–	2.8	9	5	6.2	33	Drk. Brn.	8-3-67
Creek 27-1	22 1E 27	Black R., E. Fk.	1.7	2.3	6.0	–	2.51	–	2.0	9	5	5.2	32	Drk. Brn.	8-3-67
Creek 35-3	22 1E 35	Indian Cr.	1.5	2.0	6.0	0.18	3.24	–	1.0	9	12	6.7	57	Med. Brn.	8-3-67

APPENDIX II – Physical and Chemical Data of Jackson County Streams (Continued)

UNNAMED STREAMS	OUTLET LOCATION T-N R-E-W SEC.	WATERSHED	SURFACE ACRES	LENGTH (MILES)	AV. WIDTH (FEET)	FLOW* (C.F.S.)	APPROX. WATERSHED AREA WITHIN COUNTY (SQ.MI.)	GRAD. (FT./MI.)	MILES OF PUBLIC FRONTAGE	FISHERY (SEE CODE)	METHYL PURPLE ALKALINITY (ppm)	pH	SPECIFIC CONDUCTANCE (mmhos - 77° F)	WATER COLOR	DATE OF SAMPLING
City Point Tn. (Continued)															
Creek 3-12	22 1W 3	Cr. 10-7	0.4	1.2	3.0	0.10	0.38	–	1.0	9	11	7.0	41	Lt. Brn.	7-19-67
Creek 5-11	22 1W 5	Black R., E. Fk.	0.4	1.5	2.0	0.01	1.31	–	0.4	9	12	6.1	37	Lt. Brn.	7-20-67
Creek 7-1	22 1W 7	Black R., E. Fk.	0.5	1.4	3.0	0.03	1.91	–	2.0	9	15	6.4	55	Lt. Brn.	7-20-67
Creek 7-4	22 1W 7	Cr. 7-1	0.3	1.0	2.5	0.01	1.11	–	2.0	9	5	5.5	30	Drk. Brn.	7-20-67
Creek 9-4	22 1W 9	Black R., E. Fk.	1.5	3.1	4.0	0.13	3.24	–	1.0	9	6	5.9	36	Drk. Brn.	7-20-67
Creek 10-7	22 1W 10	Black R., E. Fk.	2.6	3.3	6.5	0.26	1.87	–	4.6	9	9	6.8	33	Med. Brn.	7-21-67
Creek 11-10	22 1W 11	Black R., E. Fk.	1.7	2.3	6.0	–	1.90	–	3.6	9	5	4.9	41	Drk. Brn.	7-21-67
Creek 11-15	22 1W 11	Black R., E. Fk.	3.4	3.5	8.0	0.27	1.91	–	6.0	9	7	6.3	36	Med. Brn.	7-21-67
Creek 12-5	22 1W 12	Cr. 11-15	0.3	1.2	2.0	–	0.83	–	2.3	9	8	5.9	29	Med. Brn.	7-21-67
Creek 13-7b	22 1W 13	Black R., E. Fk.	5.2	3.6	12.0	0.06	2.33	–	6.2	9	4	6.8	30	Med. Brn.	8-2-67
Creek 24-3b	22 1W 24	Black R., E. Fk.	1.7	2.8	5.0	0.86	3.81	–	3.9	9	5	4.9	27	Drk. Brn.	8-2-67
Creek 24-13	22 1W 24	Black R., E. Fk.	2.8	3.1	7.5	0.86	3.85	–	1.0	9	6	6.5	36	Lt. Brn.	8-2-67
Cleveland Tn.															
Creek 2-5a (Schoolhouse Cr.)	24 5W 2	Black Cr.	1.5	2.8	4.5	4.69**	10.85	16.0	0.0	1	14	8.2	91	Clear	5-16-67
Creek 2-5b	24 5W 2	Creek 2-5a	0.8	2.3	3.0	1.43**	3.67	18.0	0.0	1	13	7.9	55	Clear	5-16-67
Creek 10-6	24 5W 10	Cr. 2-5a	0.2	0.6	3.0	1.23	1.89	–	0.0	1	11	7.9	47	Clear	5-16-67
Creek 25-1	24 5W 25	Halls Cr., E. Fk.	0.2	0.8	2.5	0.32	2.33	36.0	0.0	9	17	7.8	39	Clear	5-16-67
Curran Tn.															
Creek 1-2	22 6W 1	Fall Coulee Cr.	0.2	1.5	1.0	0.14	1.03	53.3	0.0	9	48	6.9	126	Lt. Brn.	6-13-67
Creek 1-3	22 6W 1	Fall Coulee Cr.	0.1	1.0	1.0	0.14	0.84	26.7	0.0	9	34	7.0	124	Clear	6-22-67
Creek 1-16	22 6W 1	Fall Coulee Cr.	0.2	1.0	1.5	0.02	1.83	40.0	0.0	9	53	7.3	151	Lt. Brn.	6-22-67
Creek 10-12	22 6W 10	Curran Coulee Cr.	0.2	0.9	2.0	1.62	1.44	50.0	0.0	9	30	7.1	109	Lt. Brn.	6-13-67
Creek 12-4	22 6W 12	Fall Coulee Cr.	0.7	1.5	4.0	0.06	1.44	40.0	0.0	9	52	7.0	218	Lt. Brn.	6-13-67
Creek 15-12	22 6W 15	Curran Coulee Cr.	0.2	0.5	2.5	0.16	0.79	–	0.0	9	20	7.4	151	Clear	6-21-67
Creek 21-1	22 6W 21	Cr. 22-5	0.1	1.0	1.0	0.54	1.54	40.0	0.0	9	29	7.6	97	Turbid	6-21-67
Creek 21-4	22 6W 21	Cr. 22-5	0.2	1.0	1.5	0.12	0.68	50.0	0.0	9	30	7.6	97	Clear	6-21-67
Creek 22-5	22 6W 22	Curran Coulee Cr.	4.6	1.5	2.5	0.30	3.48	44.4	0.0	9	33	7.3	110	Clear	6-21-67
Creek 30-7	22 6W 30	Vosse Coulee Cr.	0.4	1.0	3.0	0.72	1.89	50.0	0.0	1	26	8.1	113	Clear	6-21-67
Franklin Tn.															
Creek 7-10	20 6W 7	Beaver Cr.	0.2	0.8	2.5	0.39	0.93	100.0	0.0	1	48	7.8	142	Clear	9-19-67
Creek 9-13	20 6W 9	Beaver Cr.	0.3	1.4	1.5	0.41**	1.38	80.0	0.0	9	43	7.6	139	Clear	9-20-67
Creek 10-10	20 6W 10	Beaver Cr.	0.2	1.0	2.0	0.19	1.43	30.0	0.0	9	27	7.6	128	Clear	9-21-67

APPENDIX II – Physical and Chemical Data of Jackson County Streams (Continued)

UNNAMED STREAMS	OUTLET LOCATION T-N R-E-W SEC.	WATERSHED	SURFACE ACRES	LENGTH (MILES)	AV. WIDTH (FEET)	FLOW* (C.F.S.)	APPROX. WATERSHED AREA WITHIN COUNTY (SQ.MI.)	GRAD. (FT./MI.)	MILES OF PUBLIC FRONTAGE	FISHERY (SEE CODE)	METHYL PURPLE ALKALINITY (ppm)	pH	SPECIFIC CONDUCTANCE (mmhos - 77° F)	WATER COLOR	DATE OF SAMPLING
Franklin Tn. (Continued)															
Creek 17-2	20 6W 17	Beaver Cr.	0.7	1.6	3.5	0.40**	1.40	50.0	0.0	9	62	7.6	174	Clear	9-20-67
Creek 17-5	20 6W 17	Beaver Cr.	0.6	1.5	3.5	0.54**	1.71	40.0	0.0	9	51	7.7	168	Clear	9-20-67
Creek 18-4	20 6W 18	Beaver Cr.	0.7	1.5	4.0	0.78**	0.92	50.0	0.0	9	59	7.8	209	Clear	9-20-67
Creek 18-10	20 6W 18	Beaver Cr.	0.2	0.8	1.5	0.47	0.60	40.0	0.0	9	41	7.3	145	Clear	9-19-67
Creek 25-5	20 6W 25	Douglas Cr.	0.3	1.2	2.0	0.45**	1.31	33.3	0.0	1	47	7.6	139	Clear	9-21-67
Garden Valley Tn.															
Creek 12-6	23 5W 12	Halls Cr.	3.2	3.3	8.0	2.54**	5.03	20.0	0.6	1	11	7.6	51	Clear	5-26-67
Creek 20-16	23 5W 20	Tremp. R., N. Fk.	0.3	1.6	1.5	0.01	0.86	60.0	0.1	9	32	7.5	76	Clear	5-26-67
Creek 33-6	23 5W 33	Tremp. R., N. Fk.	0.1	0.5	2.0	0.13	1.44	42.0	0.4	9	25	7.4	105	Clear	5-26-67
Garfield Tn.															
Creek 19-16	24 6W 19	Buffalo R., S. Fk.	1.0	3.0	2.5	0.32**	2.45	36.4	0.0	1	10	7.3	67	Clear	5-19-67
Creek 22-11 (Jernstad Cr.)	24 6W 22	Buffalo R., S. Fk.	0.7	2.8	2.0	0.99**	3.15	27.3	0.0	1	7	7.8	38	Clear	5-17-67
Creek 23-11	24 6W 23	Buffalo R., S. Fk.	0.2	1.0	2.0	0.47	1.03	33.0	0.0	9	4	7.7	26	Lt. Brn.	5-19-67
Creek 29-1	24 6W 29	Buffalo R., S. Fk.	1.2	2.8	3.5	1.50**	3.60	25.0	0.0	1	8	7.8	46	Clear	5-23-67
Hixton Tn.															
Creek 26-7	22 5W 26	Tank Cr.	0.7	1.8	3.0	1.21	3.31	23.5	0.0	9	13	7.2	72	Clear	6-28-67
Irving Tn.															
Creek 17-8	20 4W 17	Black R.	0.5	1.3	3.0	0.13	0.65	87.5	0.0	9	180	7.6	502	Clear	10-3-67
Creek 29-10	20 4W 29	Black R.	1.0	1.4	6.0	0.25	0.61	45.4	0.0	9	63	7.5	198	Clear	10-5-67
Creek 10-2	20 5W 10	Trout Run Cr.	2.3	2.1	9.0	2.87	2.71	77.8	0.0	1	24	7.3	83	Clear	9-29-67
Creek 11-14 (E. Br. Trout Run Cr.)	20 5W 11	Trout Run Cr.	2.2	3.0	6.0	1.08	3.69	26.7	1.4	1	53	7.5	139	Clear	9-29-67
Creek 16-15	20 5W 16	Black Slough Cr.	0.2	1.0	2.0	0.07	0.70	66.7	0.0	9	35	7.2	122	Clear	9-29-67
Creek 30-15 (N. Br. Shake Hollow Cr.)	20 5W 30	Douglas Cr.	3.0	3.5	8.0	1.41**	2.94	45.1	0.0	1	78	7.3	233	Clear	9-28-67
Creek 31-4a (Woodward Cr.)	20 5W 31	Douglas Cr.	1.0	1.7	5.0	0.35	2.49	35.6	0.0	9	60	7.4	155	Clear	9-28-67
Creek 31-4d	20 5W 31	Douglas Cr.	1.0	1.5	5.5	0.67	2.71	50.0	0.0	9	73	7.2	244	Clear	9-27-67
Creek 32-10	20 5W 32	Douglas Cr.	0.2	0.8	1.5	0.14	1.00	71.4	0.0	9	118	7.3	305	Clear	9-27-67
Knapp Tn.															
Creek 19-6	21 1W 19	Townline Cr.	0.1	0.8	1.5	0.01	3.02	–	0.5	9	9	6.0	33	Drk. Brn.	9-13-67
Creek 28-2	21 1W 28	McKenna Cr.	2.4	3.3	6.0	0.15	5.73	–	0.6	9	5	6.2	25	Drk. Brn.	9-14-67

APPENDIX II – Physical and Chemical Data of Jackson County Streams (Continued)

UNNAMED STREAMS	OUTLET LOCATION T-N R-E-W SEC.	WATERSHED	SURFACE ACRES	LENGTH (MILES)	AV. WIDTH (FEET)	FLOW* (C.F.S.)	APPROX. WATERSHED AREA WITHIN COUNTY (SQ.MI.)	GRAD. (FT./MI.)	MILES OF PUBLIC FRONTAGE	FISHERY (SEE CODE)	METHYL PURPLE ALKALINITY (ppm)	pH	SPECIFIC CONDUCTANCE (mmhos - 77° F)	WATER COLOR	DATE OF SAMPLING
Komensky Tn.															
Creek 18-10	22 2W 18	Mollies Cr.	0.7	1.5	4.0	0.02	1.98	—	1.1	9	2	5.2	29	Drk. Brn.	7-13-67
Creek 29-2	22 2W 29	Morrison Cr.	3.5	3.8	7.5	0.72	12.38	—	6.1	9	6	6.6	30	Med. Brn.	7-14-67
Creek 29-8	22 2W 29	Morrison Cr.	7.1	4.9	12.0	2.05	5.03	—	9.8	8,9	6	6.8	39	Med. Brn.	7-19-67
Creek 2-9	22 3W 2	Arbutus L.	0.1	0.8	1.0	0.02	0.40	—	1.6	9	3	6.0	26	Drk. Brn.	7-6-67
Creek 3-16	22 3W 3	Black R.	0.1	0.5	2.0	0.12	0.12	—	0.0	9	13	6.9	45	Med. Brn.	7-7-67
Creek 14-12	22 3W 14	Mollies Cr.	1.2	1.9	5.0	0.56	1.79	—	2.8	9	12	6.6	45	Lt. Brn.	7-7-67
Creek 24-12	22 3W 24	Hay Cr.	0.2	0.5	2.5	0.05	0.59	—	1.0	9	3	6.1	32	Med. Brn.	7-11-67
Creek 29-10 (Clear Cr.)	22 3W 29	Black R.	0.8	1.0	6.5	1.07**	0.14	—	2.0	1	11	7.3	42	Clear	7-6-67
Manchester Tn.															
Creek 19-10 (Johnson Cr.)	20 3W 19	Robinson Cr.	0.5	1.2	3.5	0.16**	3.24	40.0	2.4	1	10	7.1	40	Med. Brn.	10-6-67
Creek 19-16 (Jacobs Cr.)	20 3W 19	Robinson Cr.	0.3	0.7	3.0	0.34**	1.66	40.0	0.1	1	7	7.5	36	Lt. Brn.	10-6-67
Creek 5-14	20 4W 5	Black R.	0.5	0.9	6.5	0.21	0.76	10.0	1.0	9	9	7.8	39	Clear	10-18-67
Creek 22-3	20 4W 22	Robinson Cr.	0.6	1.4	3.5	1.07	1.64	60.0	0.0	9	36	7.6	148	Clear	10-4-67
Creek 22-4	20 4W 22	Robinson Cr.	0.5	1.3	3.0	0.18	1.93	48.0	0.0	9	38	7.6	145	Clear	10-4-67
Melrose Tn.															
Creek 20-2	19 5W 20	Black R.	1.5	2.4	5.0	0.81	4.59	45.1	0.0	9	142	7.3	361	Clear	9-26-67
Creek 25-11	19 6W 25	Black R.	0.6	0.7	7.0	0.15	2.73	80.0	0.0	9	149	7.5	411	Clear	9-26-67
Millston Tn.															
Creek 17-14	20 2W 17	Pigeon Cr.	0.4	1.5	2.0	0.23	2.33	25.0	3.0	9	7	7.6	39	Drk. Brn.	10-10-67
Creek 23-13 (Beltz Cr.)	20 2W 23	Robinson Cr.	1.6	2.3	6.0	0.36**	3.14	31.6	3.0	1	5	7.4	66	Clear	10-11-67
Creek 28-3	20 2W 28	Rudes Cr.	0.2	1.0	2.0	0.02	0.69	25.0	2.0	9	3	7.3	89	Clear	10-11-67
North Bend Tn.															
Creek 5-11	19 6W 5	Beaver Cr., S. Fk.	0.8	2.2	3.0	0.14	4.71	45.7	0.2	9	87	7.4	261	Clear	9-21-67
Creek 20-11	19 6W 20	Wilson Cr.	0.3	0.8	3.5	0.08	1.05	66.7	0.0	9	218	7.8	510	Clear	9-22-67
Creek 32-4	19 6W 32	Black R.	0.8	1.1	6.0	2.00	0.19	—	0.0	9	68	7.6	197	Clear	9-22-67
Northfield Tn.															
Creek 9-9	23 6W 9	Beaver Cr.	0.3	1.3	2.0	0.43	1.09	40.0	0.6	9	27	7.8	82	Lt. Brn.	5-29-67
Creek 12-3	23 6W 12	Pigeon Cr.	0.4	1.4	2.5	0.53	1.46	53.3	0.0	9	24	7.8	93	Clear	5-29-67
Creek 16-7	23 6W 16	Beaver Cr.	0.4	1.5	2.0	0.09	0.86	46.1	0.0	9	57	7.4	168	Lt. Brn.	6-6-67
Creek 19-2	23 6W 19	Timber Cr.	0.1	0.5	1.5	0.31	0.38	—	0.0	9	64	7.5	232	Lt. Brn.	6-6-67
Creek 22-8bb	23 6W 22	Pigeon Cr.	0.4	1.0	3.0	0.36	1.48	50.0	0.0	9	45	7.9	145	Clear	6-2-67
Creek 22-8bc	23 6W 22	Pigeon Cr.	0.4	1.8	2.0	0.22	1.42	48.0	0.0	9	98	7.7	174	Lt. Brn.	6-2-67

APPENDIX II – Physical and Chemical Data of Jackson County Streams (Continued)

UNNAMED STREAMS	OUTLET LOCATION T-N R-E-W SEC.	WATERSHED	SURFACE ACRES	LENGTH (MILES)	AV. WIDTH (FEET)	FLOW* (C.F.S.)	APPROX. WATERSHED AREA WITHIN COUNTY (SQ.MI.)	GRAD. (FT./MI.)	MILES OF PUBLIC FRONTAGE	FISHERY (SEE CODE)	METHYL PURPLE ALKALINITY (ppm)	pH	SPECIFIC CONDUCTANCE (mmhos - 77°F)	WATER COLOR	DATE OF SAMPLING
Northfield Tn. (Continued)															
Creek 28-3	23 6W 28	Sands Cr.	0.2	0.6	2.0	0.17	0.68	80.0	0.0	9	50	7.0	131	Lt. Brn.	6-2-67
Creek 32-10	23 6W 32	Schermerhorn Cr.	0.3	1.1	2.0	0.18	0.98	40.0	0.0	9	22	7.4	96	Lt. Brn.	6-13-67
Springfield Tn.															
Creek 23-1	21 6W 23	French Cr.	1.2	2.8	3.5	0.53**	2.78	33.3	0.0	9	39	7.3	114	Clear	8-23-67
Creek 24-4	21 6W 24	French Cr.	3.3	4.5	6.0	0.27**	10.23	32.3	0.0	9	45	7.0	131	Clear	8-24-67
Creek 25-10	21 6W 25	Cr. 23-1	0.2	1.3	1.5	0.09**	0.72	80.0	0.0	9	53	7.5	131	Clear	8-23-67
Totals and Averages – Named Streams		**86**	**2,165.9**	**476.0**					**247.0**		**31.6**	**7.5**	**110.1**		
Unnamed Streams		**118**	**108.3**	**191.0**					**89.1**		**30.7**	**7.1**	**103.9**		
GRAND TOTALS AND AVERAGES		**204**	**2,274.2**	**667.0**					**336.1**		**31.1**	**7.3**	**106.5**		

FISHERY CODE:
1. Trout
2. Walleye
3. Muskellunge
4. Northern pike
5. Largemouth bass
6. Smallmouth bass
7. Catfish
8. Panfish
9. Forage fish

* Where possible, flow data were gathered from the lower third of the streams investigated. Unless otherwise indicated, all flows were determined by the floating chip method.

** Volume of flow determined by metering. The locations of the metering stations are shown in Figure 6. Flows metered on all Class I and II trout streams. Where the upper portion of a trout stream is Class II and the remainder a Class III, for example, the flow was metered in the Class II portion and the floating chip method was used to determine the flow further downstream in the Class III portion.

Appendix III

DEFINITIONS

To facilitate data collection and reporting, several technical terms are employed with which some readers may not be familiar. The following definitions should serve to clarify the meaning of these terms.

access - Refers to public right to approach water over public lands.

with parking - Must provide a specific area or facility for the legal parking of automobiles on public land but not on the shoulder of the road.

without parking - Usually exists where a road right-of-way adjoins a lake or stream and lacks an area or facility for parking automobiles.

navigable water - Refers to lakes or impoundments which have an inlet, an outlet, or both that are navigable by boat.

Unimproved or difficult - Exists when a road of any type which permits vehicular traffic lies within 200 feet of the shoreline but does not afford a direct access to the lake, impoundment, or stream. The road must be public or pass over public land in its entirety and the land from the road to the water just be in public ownership.

wilderness - Exists where public land adjoins the water from a public road that is over 200 feet from the water.

acidity - Is the preponderance of hydrogen (H) ions, which are acid, over the base (OH) ions that are alkaline. It is ordinarily expressed as a pH less than seven.

alkalinity - A measure of the carbonates, bicarbonates, and hydroxides present in a sample of water, expressed as parts per million calcium carbonate (ppm $CaCO_3$). In this report, alkalinity, determined with the acid-base indicator methyl purple, is assumed to represent total alkalinity.

aquatic plant types:

floating - Plants whose leaves normally float on the water surface such as duckweed, white water lily, and yellow pond lily, for example.

emergent - Plants whose leaves mostly emerge from the water such as cattail, pickerel weed, and arrowhead, for example.

submergent - Plants whose leaves are mostly beneath the water surface such as coontail, water milfoil and bladderwort, for example.

direct drainage areas - The land area where runoff flows directly into a particular lake or stream, as differentiated from watershed areas. The direct drainage for streams is only the area drained within the county; for lakes (not impoundments) the drainage area includes the total area that may also drain into lakes from other counties.

duck types

dabbler or puddle ducks - Ducks characteristic of small streams, ponds, and marshes and who obtain their food at or near the water surface by dabbling or tipping rather than diving. Examples include mallard, wood duck, black duck, pintail, and teal.

diving ducks - Ducks more commonly found on the more open bodies of water, such as large rivers and lakes, who dive for their food. When taking off from water, they run along the surface before taking wing instead of springing up. Examples include bluebill (scaup), redhead, canvasback, bufflehead, goldeneye, and ringnecked duck.

fertility classification - Used in the Jackson County report and in part from Moyle, 1946.

Total Alkalinity	Classification	Productivity	Fertility
0.0 - 20.0	very soft	low	infertile
21.0 - 40.0	soft	low - medium	fairly fertile
41.0 - 90.0	medium hard	medium - high	moderately fertile
91.0 and higher	hard	high	very fertile

lake types

drainage - Lake or impoundment having an inlet and outlet.

drained - Lake or impoundment that has no inlet but has an outlet of no substantial flow.

seepage - Lake that is landlocked, or nearly so. It is dependent upon groundwater seepage to maintain its level.

spring - Lake or impoundment that has no inlet but has an outlet of substantial flow.

pH - The negative logarithm of the hydrogen ion concentration expressed in gram equivalents. A pH of less than 7.0 is acid; a pH of 7.0 is neutral, and one more than 7.0 is alkaline. Usually swamp drainage contributes to a low pH.

shoal area - In this report, it refers to the shoreward part of the basin visible to the naked eye, but not exceeding the five-foot depth.

shoreline development factor (S.D.F.) - A method of expressing the degrees of irregularity of the shoreline of a lake. It is the ratio of the length of the shoreline to the circumference of a circle having the same area as the lake. The number is therefore never less than 1.00.

soil bottom types -

sand - Particles having diameters of 0.125 inch or less.

gravel - Has a diameter of 0.125 to 3.0 inches.

rock - Includes rubble (3.0 to 12.0 inches in diameter), rock 12.0 inches and larger in diameter, and bedrock.

muck - Includes detritus, silt, muck, clay and marl.

specific conductance - A measure of the ability of water to conduct an electric current. It is therefore a measure of the total dissolved electrolytes in water and has use in determining relative purity of waters. The unit of measurement is reciprocal megohms or microhms, as measured at 77°F (25°C).

transparency - It is a measure of vertical distance that can be seen into water using an instrument known as a secchi disk. The distance a secchi disk can be seen is influenced by a number of factors including amount of sunlight, turbidity, and water color to mention a few. Where secchi disks can be seen at depths not exceeding 5.5 feet, the transparency is low; 6.0 to 12.0 feet, moderate; 12.5 to 20.0 feet, high; and 20.5 feet and deeper, very high.

trout stream types:

class I - Good water conditions and with high natural reproduction and suitable density of wild trout, little or no stocking of hatchery fish.

class II - Good water conditions and may have some natural reproduction, but where natural reproduction is not sufficient to maintain a completely wild fishery. Moderate to heavy stocking of hatchery fish is necessary to assure satisfactory fishing.

class III - Marginal water conditions for sustaining trout populations on a year-round basis. Continual trout stocking at specific time intervals is necessary to provide fishing throughout the season.

water color - As used in this report, water was either clear, light brown, medium brown, or dark brown. The color was determined of samples taken directly from the water; therefore, apparent color rather than true color was measured as it included not only that color produced by materials in solution, but also any color produced by substances in suspension. According to the American Public Health Association (1949), true and apparent color of clear water having low turbidity is nearly alike.

watershed areas - The whole water gathering land surface of a lake or stream basin and includes the runoff surfaces of other lakes and streams above the one in question. Stream watershed areas, however, are only the runoff surfaces above to the county line, while lake (not impoundments) watershed areas include the entire basin system within and out of the county.

wetlands - Any area where the water table is at such a level that raising of a cultivated crop, other than cranberries, is usually not possible. Wetland classifications include bogs, fresh meadow, shallow marsh, deep marsh, shrub swamp and timber swamp.

winterkill - A fish mortality in ice and snow covered lakes resulting from the depletion of dissolved oxygen in the water to a level where it is no longer capable of supporting fish life. The high oxygen demand of, and the formation of methane, carbon dioxide, hydrogen sulfide and other gases by the decay of organic material contribute to the kill. Winterkills usually occur in shallow or very infertile lakes, or in shallow bay areas of deeper lakes.

SURFACE WATER RESOURCE PUBLICATIONS

Adams County	1966
Ashland County	1966
Barron County	1964
Burnett County	1966
Chippewa County	1963
Clark County	1965
Columbia County	1965
Dane County	1962
Dodge County	1965
Door County	1966
Dunn County	1962
Eau Claire County	1964
Green County	1961
Jackson County	1968
Jefferson County	1968
Kenosha County	1961
Kewaunee County	1966
Lafayette County	1967
Marquette County	1963
Menominee County	1963
Milwaukee County	1964
Oneida County	1966
Ozaukee County	1964
Polk County	1961
Racine County	1961
St. Croix County	1961
Shawano County	1968
Vilas County	1963
Walworth County	1961
Washington County	1962
Waukesha County	1963
Wood County	1967

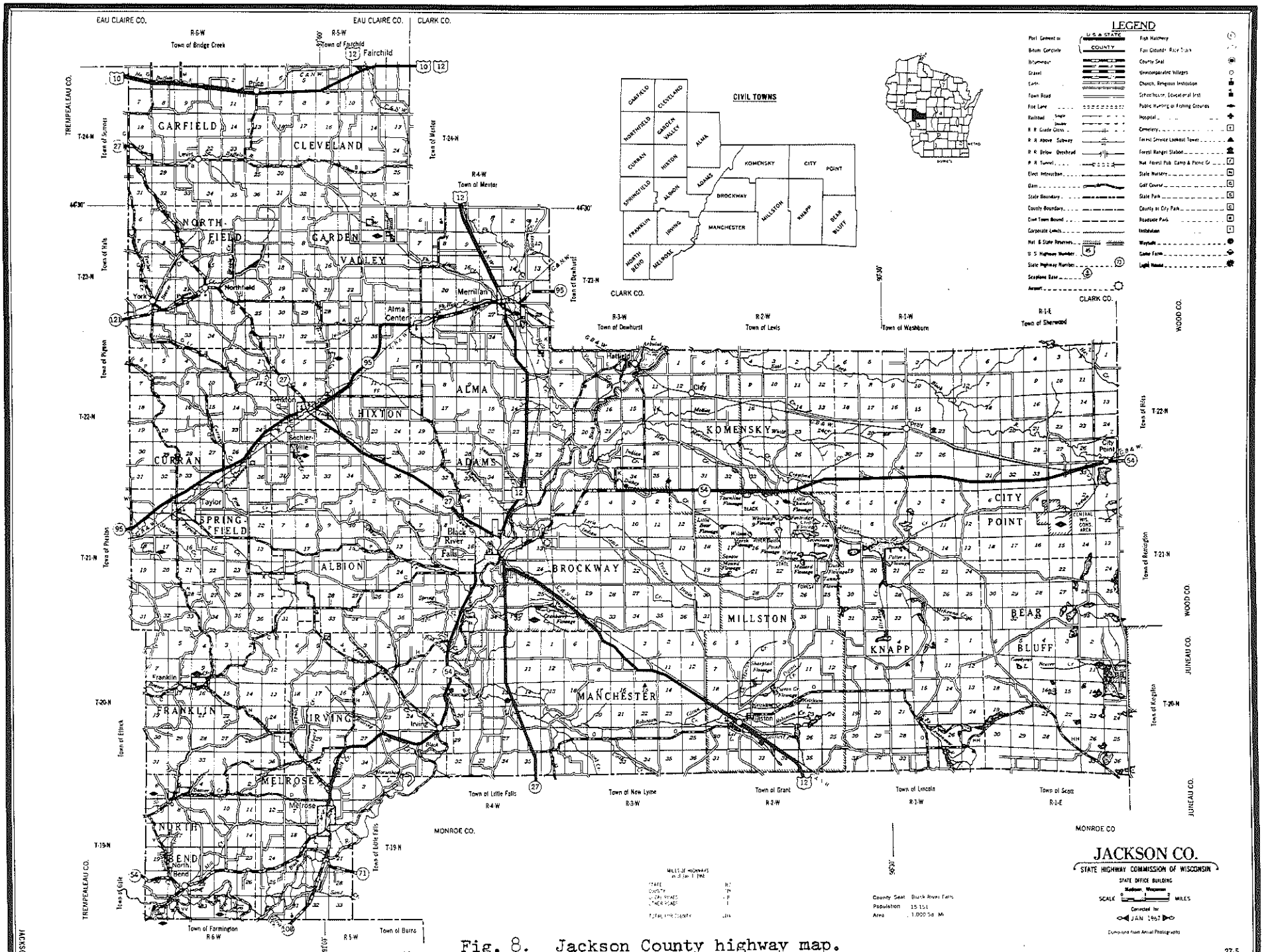

Fig. 8. Jackson County highway map.