

WISCONSIN MAPPING BULLETIN

Volume 3 No. 2 April 1977

INFORMATION ON CARTOGRAPHIC ACTIVITIES AND
AERIAL PHOTOGRAPHIC COVERAGE IN THE STATE
OF WISCONSIN; PUBLISHED QUARTERLY BY THE
STATE CARTOGRAPHER'S OFFICE, UNIVERSITY OF
WISCONSIN, 144 SCIENCE HALL, MADISON, WI 53706.

★ UW-CART LAB ★

Enclosed with this Bulletin is a brochure recently issued by the UW-Madison Cartographic Laboratory. The Lab's facilities and programs are briefly described. Additional information or copies of the brochure can be obtained from James Hilliard, UW Cartographic Laboratory, M380 Science Hall, Madison, WI 53706 (608) 262-1363.

NATIONAL AWARD TO NOTED WISCONSIN CARTOGRAPHER

Professor Arthur H. Robinson of the Geography Department, University of Wisconsin-Madison was awarded the Earle J. Fennell Award for outstanding contribution to surveying and mapping education at the 1977 national convention of the American Congress of Surveying and Mapping held February 27 to March 5, 1977 in Washington, D.C.

Since 1967 Professor Robinson has been the Lawrence Martin Professor of Cartography at the University. He was geography chairman from 1954 to 1958 and again from 1966 to 1968. Also from 1966 to 1973 he was director of the University's Cartographic Laboratory. On a worldwide basis he was president of the International Cartographic Association from 1972 until last year.

Our congratulations to Professor Robinson.

AERIAL PHOTOGRAPHY CATALOG PROVES POPULAR

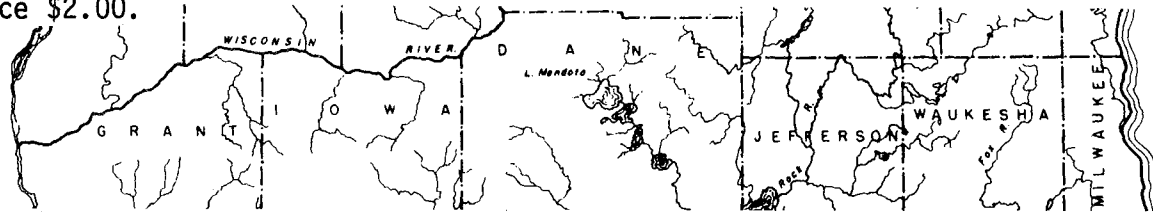
Over 400 copies of the Catalog of Aerial Photography 1971-1976 on Wisconsin have been distributed to date. Demand has remained consistent. Copies are still available free on request from the State Cartographer's Office. Persons are asked to limit requests for multiple copies.

★ ★ A.S.C.S. CORRECTION ★ ★

The Agricultural Stabilization and Conservation Service phone number is inaccurately given on page 26 of the Catalog of Aerial Photography 1971-1976. Please correct it to read (608) 252-5301.

JEFFERSON COUNTY--GROUND WATER & GEOLOGY

Ground-Water Resources and Geology of Jefferson County, Wisconsin by R.G. Borman and L.C. Trotta of the U.S. Geological Survey describes the county's geology and the occurrence, movement, quality, and availability of its ground water. It is intended to be an information base to aid planning, development, and management of water supplies from the ground-water resources. The illustrated report includes 14 maps at a scale of approximately 1 inch = 4 miles plus a 2-color separate map of the watertable at a scale of 1 inch = 3 miles. The 1976 Jefferson County report is Information Circular 33 of the Wisconsin Geological and Natural History Survey, 1815 University Ave., Madison, WI 53706, Map Sales (608) 262-0586, 31 p., price \$2.00.



U.S. HISTORICAL COUNTY BOUNDARY DATA FILE

The compilation of a United States Historical County Boundary Data File is now in process. The goal is to create a machine-readable file of all the boundary changes of counties and other governmental and administrative units for the period 1790-1970. Used with a computer-directed plotter, the data file will make it possible to produce on demand maps of nearly any size, scale, and projection that cover any specified area (including interstate regions) at any given date from 1790 through 1970. The project now underway covers New Jersey and Pennsylvania and is designed to demonstrate the concepts, methods, and utility of compiling such a boundary data file for the entire nation. In addition to county, state, and international boundaries, the demonstration project will include congressional districts, samples of state electoral districts and minor civil divisions, the locations of capitals and county seats, the areas of the spatial units, pertinent names, and the shoreline and major rivers of the two selected states.

The historical research will follow the traditional approach of searching statutes, official maps and surveyors' reports, court records, and other primary and secondary sources in order to establish a descriptive chronology of boundary changes from past to present. The cartographic compilation will commence with maps of the 1970 boundaries (i.e., the most accurate cartographic base); they will be amended through successive stages back to the pattern of 1790. The research and draft cartographic compilations will be executed at the Newberry Library, Chicago, under Project Supervisor John H. Long.

Cartographic compilation of the boundaries will be based upon the map series published by the U.S. Geological Survey @ 1:250,000 (1" = 4 miles). The data file will be designed and tested and the cartographic data digitized at the University of Wisconsin Cartographic Laboratory, Madison, under the direction of Joel Morrison, Director of the Laboratory.

The Newberry Library is sponsoring the demonstration project, which is under the general direction of David Woodward, Program Director of the Newberry's Hermon Dunlap Smith Center for the History of Cartography. A grant from the National Endowment for the Humanities provides the financial support.

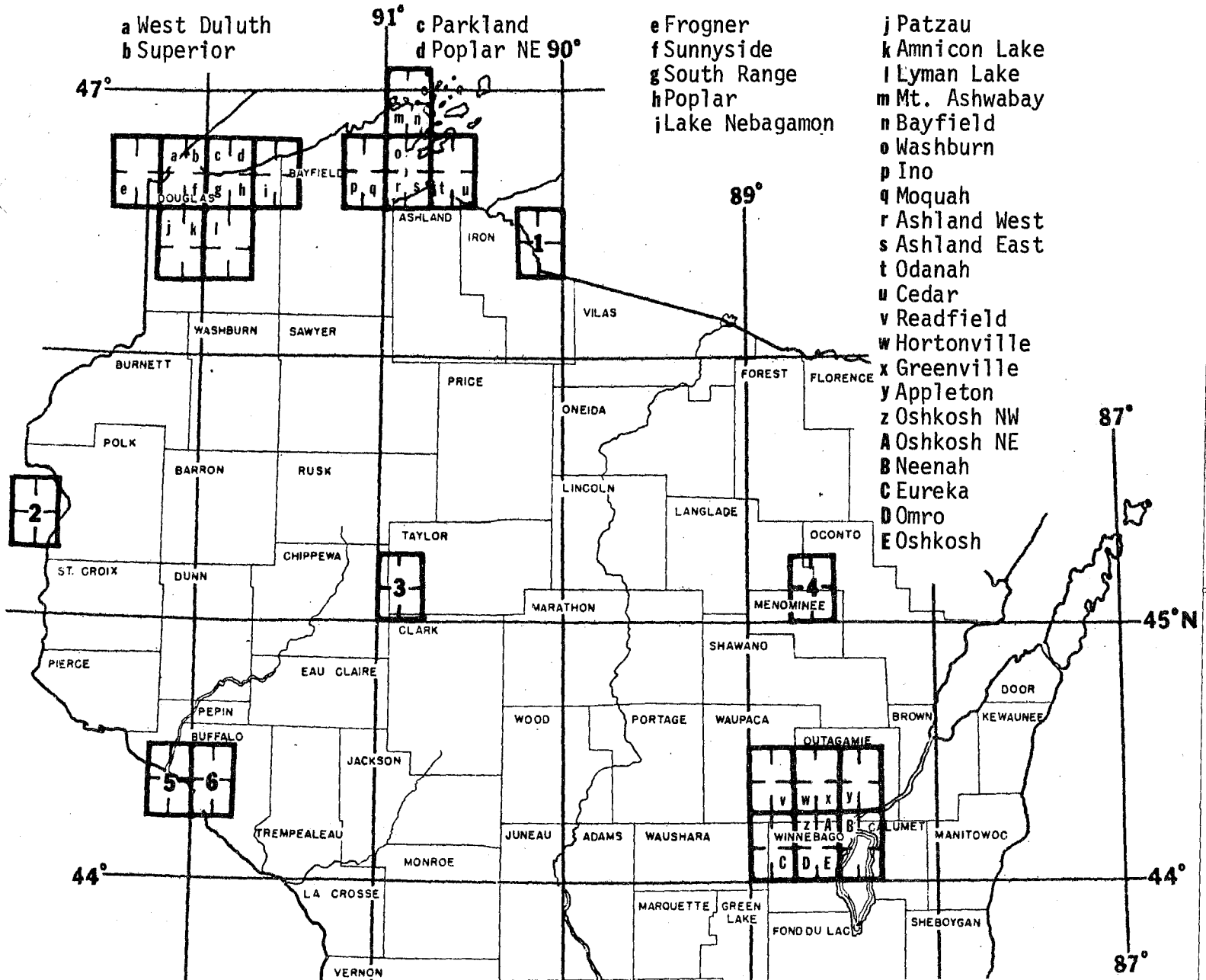
Interested persons should address their inquiries to John H. Long, Newberry Library, 60 West Walton Street, Chicago, IL 60610.

NEW PRODUCTION FROM U.S. GEOLOGICAL SURVEY

These newly published 7½' topographic quadrangle maps (1:24,000) are listed by their location on the superseded 15' topographic or planimetric map of the area. They are available from the Wisconsin Geological Survey, 1815 University Ave., Madison, WI 53706 (608) 262-0586. Topographic quadrangles \$1.50 each.

- | | | |
|--|--|--|
| <p>1 IRONWOOD 15' TOPO
 <i>NE¼ None</i>
 <i>NW¼ Ironwood '55</i>
 <i>SW¼ Pine Lake '73</i>
 <i>SE¼ None</i></p> | <p>2 FOREST LAKE 15' TOPO
 <i>NE¼ None</i>
 <i>NW¼ None</i>
 <i>SW¼ None</i>
 <i>SE¼ Scandia MN '74</i></p> | <p>3 GILMAN 15' TOPO
 <i>NE¼ None</i>
 <i>NW¼ None</i>
 <i>SW¼ Ruby '73</i>
 <i>SE¼ Bellinger '73</i></p> |
| <p>4 LANGLADE 15' PLAN
 <i>NE¼ None</i>
 <i>NW¼ Langlade '73</i>
 <i>SW¼ None</i>
 <i>SE¼ Fredenberg Lake '73</i></p> | <p>5 WABASHA 15' TOPO
 <i>NE¼ None</i>
 <i>NW¼ Pepin '74</i>
 <i>SW¼ None</i>
 <i>SE¼ None</i></p> | <p>6 ALMA 15' TOPO
 <i>NE¼ None</i>
 <i>NW¼ None</i>
 <i>SW¼ Alma '74</i>
 <i>SE¼ None</i></p> |

1975 PHOTOREVISED TOPOGRAPHIC QUADS





NEW MAPS

GROUND-WATER AVAILABILITY AND DISSOLVED SOLIDS CONTENT

A series of 6 multicolor maps showing probable water yields of wells and variations in the dissolved-solids concentrations in Wisconsin's ground water has been published by the Wisconsin Geological and Natural History Survey. They were compiled by R.W. Devaul under the cooperative water-resources program of the State Survey and the Water Resources Division of the U.S. Geological Survey.

The water-yield maps indicate the probable amount of water (gallons per minute) that can be obtained from wells drilled into each of the 3 major aquifers. The dissolved-solids concentrations maps indicate the probable amount of dissolved-solids (milligrams per litre) that can be expected in water obtained from wells drilled into each aquifer.

The maps, printed at a scale of 1:1,000,000 (app. 1 inch = 16 miles) are:

Probable Yields of Wells in the Sand-and-Gravel Aquifer

Probable Yields of Wells in the Sandstone Aquifer

Probable Yields of Wells in the Niagara Aquifer

Dissolved-solids Concentrations of Water in the Sand-and-Gravel Aquifer

Dissolved-solids Concentrations of Water in the Sandstone Aquifer

Dissolved-solids Concentrations of Water in the Niagara Aquifer

The maps can be obtained at a cost of \$1.00 each from the Wisconsin Geological and Natural History Survey, 1815 University Avenue, Madison, WI 53706 (608) 262-0586.



POTENTIAL FOR GROUND-WATER POLLUTION AND POTENTIAL FOR CRUSHED STONE PRODUCTION



The potential for ground-water pollution and for crushed-stone production in Wisconsin are indicated on 2 page-size maps published by the Wisconsin Geological and Natural History Survey.

Ground-water Pollution Potential Based on Recharge Rates was prepared in cooperation with the Water Resources Division of the U.S. Geological Survey. It is based on recharge rates determined from soil characteristics and indicates those areas of the state where the ground-water reservoir may easily become contaminated due to waste disposal or chemical application on the land. Because of its general nature the map is not intended to be used for specific site evaluations.

Areas with Potential for Crushed Stone Production in Wisconsin was prepared by the Wisconsin Geological Survey. This is generalized also. Detailed site studies are necessary to confirm the occurrence of suitable rock types at specific locations within any area.

Copies of maps are available at 10¢ each from the Wisconsin Geological Survey, 1815 University Avenue, Madison, WI 53706 (608) 262-0586.

WISCONSIN MAP SOCIETY MEETING

The first statewide meeting of the newly founded Wisconsin Map Society will be held in Madison on June 18, 1977. The meeting will begin at 1:00 p.m. at the Wisconsin Academy of Sciences, Arts, and Letters, 1922 University Ave., Madison. Ample free parking is available in Lot 41 just 100 yards east of the Academy on University Avenue.



The Society's constitution, aims, and affiliations will be discussed along with the election of officers. There will be a guest speaker also.

People interested in supporting and encouraging the study and preservation of maps and related materials for each of Wisconsin's counties are urged to attend this first meeting. Additional information can be obtained from Mr. Wilfred Beaver, P.O. Box 422, Sparta, WI 54656 (608) 269-6205.

◀ ATLAS OF GREAT LAKES INDIAN HISTORY ▶

The Atlas of Great Lakes Indian History is scheduled for completion by August 31, 1978 by the Newberry Library, Chicago.

The atlas will focus on the Great Lakes region of the United States and Canada as a distinct geographical and cultural area with its own historical development. It will consist of about 40 newly researched thematic maps and an accompanying text. Important factors in Indian history and the history of Indian-white relations in the area from 1615 to 1861, when treaty-making between Indian tribes and the American government ended, will be illustrated.

The major themes to be researched and mapped will be developed around basic demographic data. Two-color thematic maps will include economic, political, military, and social topics important in the history of the area and its people. As the first atlas in American Indian history it will be essential in further research.

For further information write: Helen Hornbeck Tanner, Director, Atlas of Great Lakes Indian History, The Newberry Library, 60 West Walton St., Chicago, IL 60610 (313) 943-9090.



A.G.S. LIBRARY MOVE DELAYED

Legal difficulties have delayed the move of the American Geographical Society's library and map collection to the UW-Milwaukee. The problem is due to the Society's being chartered in the State of New York. A 40-point brief has been filed against the relocation by the N.Y. Attorney General. A trial date may be set for May, with a decision coming sometime in June. The multimillion-dollar library is the largest, private collection in the Western Hemisphere.



UPCOMING MEETINGS

WISCONSIN MAP SOCIETY

The first meeting will be held on June 18, 1977 at the Wisconsin Academy of Sciences, Arts, and Letters, 1922 University Ave., Madison, WI. Contact: Wilfred Beaver, P.O. Box 422, Sparta, WI 54656.

FIFTH KENNETH NEBENZAHL, JR. LECTURES

The Newberry Library will sponsor the 5th Kenneth Nebenzahl, Jr. Lectures on August 11-13, 1977. The subject for the lectures will be "Mapping the Great Lakes, Motive and Method". Please write the Newberry Library, 60 West Walton Street, Chicago, IL 60610.

ASP-ACSM FALL MEETING

The joint meeting of the American Society of Photogrammetry-American Congress on Surveying and Mapping will be held October 18, 19 and 20, 1977 in Little Rock, Arkansas. Complete information will be in the July Bulletin.

AUTO-CARTO III

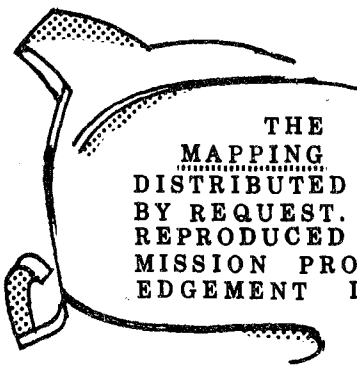
AUTO-CARTO III will be held in San Francisco, CA at the St. Francis Hotel January 16 through 21, 1978. The conference will be co-sponsored by the U.S. Geological Survey and the American Congress on Surveying and Mapping. While it is still too early for information releases, Mr. Jim Chamberlain, U.S. Geological Survey, Menlo Park, CA 94025 will be the person to contact.



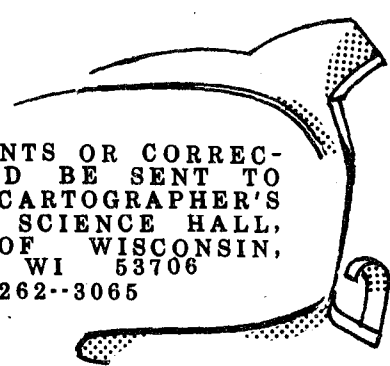
AUTO-CARTO II PROCEEDINGS AVAILABLE

Proceedings of the International Symposium on Computer-Assisted Cartography (AUTO-CARTO II) is now available. This second conference on automation in cartography was sponsored by the American Congress on Surveying and Mapping in cooperation with the U.S. Bureau of the Census. The Symposium proceedings were compiled and edited by John Kavaliunas. Copies are \$15 from:

American Congress on Surveying and Mapping
210 Little Falls Street
Falls Church, VA 22046



THE WISCONSIN
MAPPING BULLETIN IS
DISTRIBUTED FREE OF CHARGE
BY REQUEST. ARTICLES MAY BE
REPRODUCED WITHOUT PER-
MISSION PROVIDED ACKNOWLEDGEMENT IS GIVEN.



ANY COMMENTS OR CORRECTIONS SHOULD BE SENT TO THE STATE CARTOGRAPHER'S OFFICE, 144 SCIENCE HALL, UNIVERSITY OF WISCONSIN, MADISON, WI 53706
(608) 262-3065