

Green Lake County  
Land Records Modernization  
Five Year Plan  
1992

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Draft

## INTRODUCTION

### Background

Located within south-central Wisconsin, Green Lake County has a cornucopian of diverse and stimulating geographic landscapes. It is home to approximately 19,000 citizens and has 530 square miles of land dedicated to agriculture, industry, and tourism.

The geography of the County is colorful and picturesque. One can find phenomenal fishing in lakes, such as, Green Lake - the state's deepest freshwater body, or be surrounded by remarkable carved bluffs near Kingston. Pristine farmland in the north and protected wetlands in the southwest further exemplify the diversity of the county's landscape.

It is also a county of many proud identities: Berlin is the 'fur & leather capital of Wisconsin', Markesan is the 'Canning Capital of the U.S.', Green Lake is the 'oldest resort community west of the Niagara Falls', and Tuscumbia has the 'oldest golf course in Wisconsin'. These communities and others in Green Lake County have a proud heritage and distinctiveness that underscore the importance that farming, industry and tourism play in Green Lake County.

In all of these enterprises land records play a major part in the management and protection of the County's physical and cultural resources. There are also environmental concerns that need to be addressed, such as, groundwater and lake water quality, soil erosion, and wetlands preservation. All involve extensive examination of land records in order to make insightful & informed decisions. Consequently, land records modernization and the development of a geographic information system (GIS) is of major importance to County and State governmental units.

On June 19, 1990 the Green Lake County Board of Supervisors adopted a resolution creating a Land Information Office (LIO), forming the Green Lake Land Information Committee, and supporting land modernization activities (Appendix A). The charge of the Committee was to produce and implement a land records modernization plan for the County, as well as to supervise the eventual development of a County-GIS. This initiative was a direct result of the State of Wisconsin's creation of the Wisconsin Land Information Program (WLIP) and its authority under Wisconsin Act 31 and Act 339 in 1989 (ss. 59.88).

### Land Information Office

The Wisconsin Land Information Board (WLIB), as authorized under the State of Wisconsin Land Information Program (WLIP), recommends that every county establish a Land Information Office (LIO). The Green Lake Board of Supervisors designated that the Office of the Register of Deeds is the official LIO for Green Lake County. The Register of Deeds is the official contact person for the County Land Information Office;

Ms. Shirley Williams  
Register of Deeds Office  
Courthouse  
492 Hill Street  
Green Lake, Wisconsin 54941-3188  
(414) 294 - 4021

### Green Lake County Land Information Committee

Individuals serving on this Committee were chosen based either on their direct involvement with land records information within County government, or because of their knowledge of Green Lake County land records. A wide range of interests are represented on the Committee, which provides a forum for a broad exchange of land records modernization information and ideas.

James Hebbe, Chair  
County Conservationist  
Land Conservation Office

### Members

Herbert Dahlke  
County Board Chair

Tim Mashuda,  
Highway Commissioner  
Highway Department

Nancy K. Greget,  
Real Property Lister  
Land Description Office

Kathleen Morris,  
County Treasurer

James Jajewski,  
Zoning Administrator  
Zoning/Sanitation Office

Sam Mullen,  
County Surveyor

Rebecca Keipe,  
Data Systems Manager  
Deputy County Clerk

Raymond Stoll,  
County Clerk

Robert Malchetske,  
County Board Finance Chair

Shirley Williams,  
Register of Deeds

*Note: Committee members can be contacted through the Green Lake County Land Information Office.*

In addition to the member organizations, the following governmental units and private businesses have been active sponsors or supporters of land records modernization and the establishment of the Green Land County Land Modernization effort:

Green Lake County  
Agencies/Departments: Clerk of Courts  
Green Lake Chamber of Commerce  
Green Lake Sanitary District

Cities: Berlin  
Green Lake  
Markesan  
Princeton



Villages: Kingston  
Marquette

Towns: Berlin  
Brooklyn  
Green Lake  
Kingston  
Mackford  
Manchester  
Marquette  
Princeton  
St. Marie  
Seneca

Wisconsin Department of Natural Resources (DNR)  
Wisconsin Department of Transportation (DOT)  
Wisconsin Geological and Natural History Survey (WGNHS)  
Soil Conservation Service (SCS) Madison Office

GTE  
Marcus Cable  
North-West Telephone  
Wisconsin Bell Telephone  
Wisconsin Gas  
Wisconsin Power & Light

Central Engineers & Architects  
Gary Schindler, Surveying  
Green Lake Surveying Co.  
Green Lake Title & Abstract  
Grothman & Associates  
Mid-State Associates  
Mid-State Abstract  
Ripon Land Surveying  
Welch Land Surveying

[Contacts for these organizations are listed in Appendix B].

#### **PLAN INTENT and PURPOSE**

As recommended by the WLIB, the Green Lake Land Records Modernization Plan consists of four sections: Introduction, Current Activities and Inventory, Goals and Objectives, and Modernization and Implementation. The intent of this document is to provide a synopsis of the organizations affected by land records modernization, as well as provide a recommendation for modernization-implementation over the next five years. It should serve as a guideline for the Green Lake County Board, the WLIB, and affected Green Lake County government units and private organizations, as to the envisioned creation and maintenance of a viable Green Lake County land information system.



## CURRENT ACTIVITIES AND INVENTORY

The Green Lake County Land Information Committee and the University of Wisconsin-Stevens Point conducted an extensive survey to determine the current status of land records in Green Lake County. Either personal interviews or mailed questionnaires (Appendix B) were completed with over a hundred land record collectors, users, and custodians throughout Wisconsin. The majority of contacts replied with relevant information and questions about the County Plan. All known government and private firms who used Green Lake County land records were interviewed. Information was collected on types, usage, and maintenance of land records. Additionally, questions were asked of the agency or business if they had created or maintained any records in digital form. Interview results are summarized on the following pages, and in Appendices C through G. This summary is split into three major sections: County and Municipal Governments, Federal and State Agencies, and the Private Sector.

A glossary is provided (Appendix J) for readers unfamiliar with LIS/GIS terminology and acronyms.

### 1. County and Municipal Government

#### *County Departments*

{Figures 1 and 2 show a comparison of county agencies use of land records information. Appendix D summarizes responses to the survey.}

#### **a. Clerk of Courts**

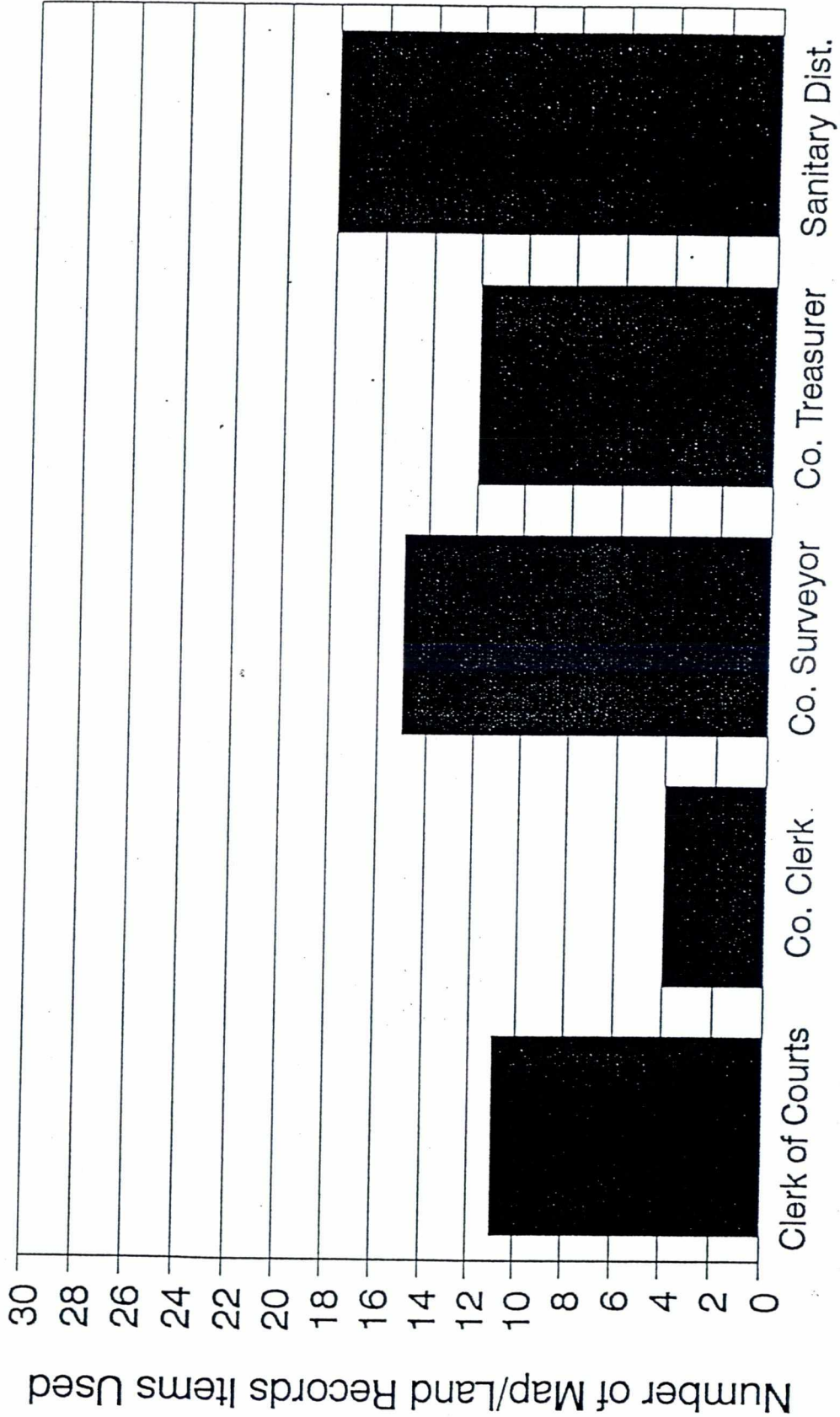
The Clerk of Court's Office maintains records of all civil cases, judgements, divorce records and liens. They need accurate information on land ownership and property assessment as such information may be critical to civil suits and other cases involving property decisions. A computerized land records database would expedite record keeping and office procedures.

#### **b. County Clerk**

The County Clerk's Office needs up-to-date maps of all political boundaries to answer questions from the general public. All election records are maintained in this office. At the present time, this office houses and maintains the county mainframe computer system (an HP3000 937LX). A computerized land information system would provide an efficient means of up-dating boundary and record changes.

#### **c. County Treasurer**

The Treasurer's Office is responsible for maintaining all tax status records. They also make extensive use of legal ownership, parcel identification (PIN), assessed value and tax jurisdiction information. A limited amount of legal ownership and parcel identification information is maintained in a digital format on the County mainframe computer linked with the County Clerk and Land Description Offices. The database currently in use for this information does not allow for enough space to enter an entire legal description in some cases. Converting all information into a digital format and tracking it with a standardized filing and numbering system would greatly assist day-to-day office operations. The County Treasurer recognizes the need for an improved parcel identification numbering system (PIN) and can see the benefits of a PIN that describes the exact location or "address" of a parcel.



Agency or Department

■ Map/Record



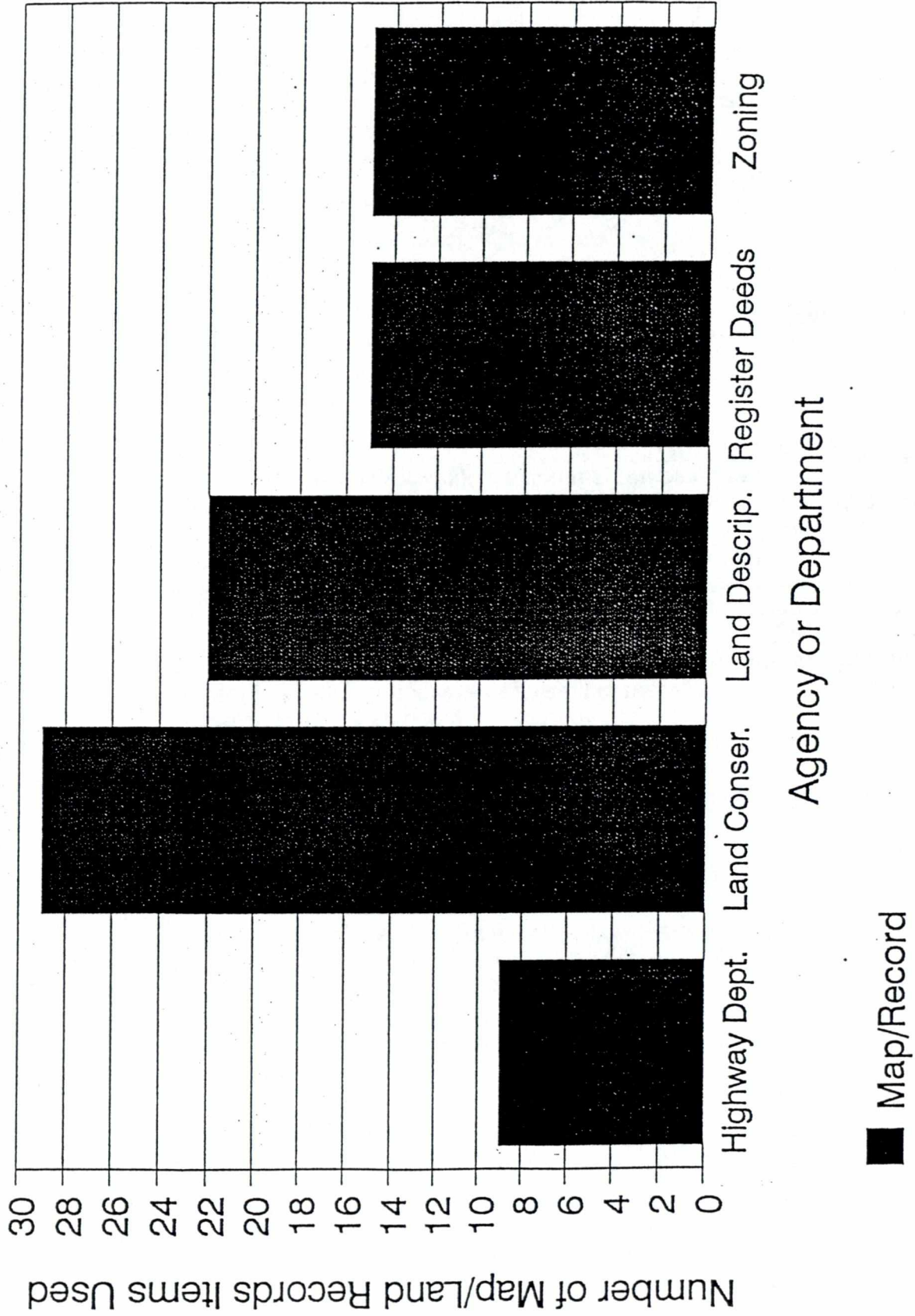


Figure 2.



**d. County Surveyor**

The Green Lake County Surveyor is actively involved with county efforts to modernize land records. A computerized land records system would consolidate survey records and facilitate records management. Remonumentation of the county was started in 1971. Of the 1400 total corners, nearly 80% have been remonumented. The center of sections and government lot corners are also being set as needed. The White River Marsh and Grand River Marsh areas remain undone. Both areas are owned by the Department of Natural Resources (DNR) and are quite marshy. Many corner points are underwater and inaccessible.

**1992 Land Records Modernization Expenditures**

Monumentation	\$14,000
Office Expenditures	\$ 6,287
	<hr/>
	\$20,287

**e. Green Lake Sanitary District (GLSD)**

The GLSD maintains a considerable amount of information on Green Lake parcels. There are 2,007 parcels within the GLSD. GLSD maintains files in dBASE containing tax number, township, fire number, legal description, lot-block-subdivision, well and septic system information for each parcel. They also have digital information on Big Green Lake that includes a lake map. The GLSD Administrator is very supportive of County efforts towards land records modernization and standardization.

**f. Highway Department**

The County Highway Department maintains information on official right-of-way, gas mains, electric lines and school bus routes. They also make extensive use of survey records and property ownership information generated and maintained by other County agencies. An integrated County land records system would allow for easier access and exchange of information.

**g. Land Conservation**

The Department of Land Conservation is very excited about the prospect of land records modernization. Their office is ready to take a leadership role in modernization activities. Their 1992 budget allows for 1000 hours of staff time specifically for land records maintenance. Primary office activities include providing information on soil erosion remedies, conservation practices, and water quality improvement. They have just completed a project on the Big Green Lake watershed area and are starting a similar project in the Little Green Lake and Grand River Area.

**h. Land Description**

The Land Description Office is responsible for maintaining all parcel information. Current county parcel (plat) maps are hand inked maps bound into 18 volumes. The maps vary in scale and date of origin. All updates and changes are drawn in with a pen. The most recent area to be updated with a tax map was the Town of Marquette which was completed approximately six years ago. A complete computerized land information and a standardized filing system would provide a much more efficient means of updating and retrieving parcel information.



### **i. Register of Deeds**

The Register of Deeds Office maintains property information on legal ownership, legal description, grantor/grantee and subdivision plats. Currently 1907 certified survey maps (CSM's) have been filed with the Office. A computerized land records system incorporating grantor/grantee information, CSM's and plat maps would greatly increase office efficiency and accuracy. Presently, nearly 60% of office time is spent on land records maintenance.

### **j. Sheriff**

The Sheriff's Department needs immediate access to current information on names, addresses, legal ownership and political boundaries. Currently, Green Lake County is investigating an Emergency 911 Computer Aided Dispatch System. It is hoped that the 911 database could be integrated into the county land information system. This combination would be able to provide accurate base maps and emergency routing options.

### **k. Zoning**

The Zoning Office answers numerous questions daily from the general public concerning zoning, soil conditions, building and sanitary system permits, and farmland preservation requirements. Nearly 80% of office time is spent on activities concerning land records maintenance. A County GIS incorporating soil survey, wetlands, land use and zoning information would be a invaluable aid in day-to-day operations.

## ***Municipalities***

### **Green Lake County - Cities, Villages and Towns**

Surveys were sent to the Chairman, Mayors, Presidents, Clerks and/or Treasurers and Assessors of all municipalities in Green Lake County. Responses were received from at least one contact in each municipality (see Appendix C).

At the present time, no town offices are using any sort of automated record keeping systems. They all indicated interest and support for County efforts to modernize land records. The Town Assessors and Clerks are especially aware of the need for standardized and automated records systems as they use and exchange information with County Offices on a regular basis.

All municipalities, with the exception of the Village of Kingston, have been platted. It is hoped that the Village will be platted sometime in the near future to facilitate integration with the County's planned GIS.

All Cities and Villages indicate support and interest in standardizing land records information. The City of Berlin, which is faced with the unique situation of being in both Green Lake and Waushara Counties, has indicated support for both Counties in their modernization efforts. Their Department of Public Works is using a CAD system and has begun converting some city map information.

## **Special Agencies**

Eight school districts and seven private schools serve Green Lake County. They make use of a wide variety of land records including plat books, census information, addresses, tax jurisdiction and some parcel assessment information. Most districts maintain maps of school bus routes and a current address file of district families.



There are four Historical Societies in the county. They frequently research legal ownership, grantor/grantee and historical maps in their restoration and preservation projects.

## 1. Federal and State Agencies

{Appendix F summarizes all Federal and State survey data}

### a. U.S. Census

The United States Census produces an incredible amount of geographic data. Statistical data is available on agriculture, population, housing, manufacturing and transportation. All data is available on computer disk or CD-ROM. TIGER and DIME Files (topologically encoded block information) is also available on CD-ROM. The accuracy and resolution of this data is not fine enough to serve many county land records needs.

### b. U.S. Geological Survey

The United States Geological Survey (USGS) is using a wide variety of computer applications to produce current national inventory maps. Digital Elevation Models (DEMs) are produced for every 1:24,000 topographic map quadrangle. These are 3-dimensional data files. Digital Line Graphs (vector based arc topographic files) are available for each county in the United States at scales of 1:100,000 or 1:2,000,000. This data is relatively inexpensive (\$25-\$500) but post processing is usually necessary and USGS does not provide user support or extensive documentation.

### c. EOSAT and SPOT Corporation

These two companies provide extensive remote sensing imagery for all areas of the United States from thematic mapper satellites. The imagery can be quite costly though and is usually beyond the normal budgets of County governments.

### d. Soil Conservation Service (SCS)

SCS currently does not have any digital information available pertaining to Green Lake County. They are anxious to work out digitizing arrangements with counties to convert soil sheets into a digital format.

### e. Wisconsin Department of Transportation (DOT)

The Department of Transportation is using Intergraph and ARC/INFO GIS software. At the present time digital information is available from the GB100 Database. The Technical Services Division plans to convert town and city maps into the system. They also have a Global Positioning System (GPS) survey program, and can share information with County Surveyors.

### f. Wisconsin Department of Natural Resources (DNR)

The DNR has been compiling an extensive GIS database for several years. They have a wide range of geological and topographic information available in digital form. (see Appendix F) All information can be obtained in a variety of formats.

### g. Wisconsin Geological and Natural History Survey (WGNHS)

The WGNHS does not have any digital information available on Green Lake County at this time. They are interested in what the County may produce as a GIS is developed.



### 3. Private Sector

{Appendix G summarizes survey results}

#### a. Fuel and Light Companies

Wisconsin Power and Light Co. is currently converting land records information into a CAD system and conducting pilot studies on the effectiveness of the system.

Wisconsin Gas recently had all their system information digitized from air photos by an outside vendor. Digital files contain roads, buildings and cadastral information. This information would be available for purchase by the County.

#### b. Telephone Companies

GTE currently does not have any digital information available for Green Lake County. They are working on pilot projects with Rock and Fond du Lac Counties. North-West Telephone is using AutoCAD to convert system information for some of their service areas. The Green Lake/Ripon service area has not been converted yet and there is no timeline in effect to indicate when conversion will begin. Wisconsin Bell Telephone is converting their system information into an AM/FM system developed by Intergraph.

#### Cable Television

Marcus Cable serves customers in Green Lake County. They are not using any sort of digital mapping or information system at this time nor do they have plans to convert to anything in the near future.

#### d. Surveyors and Engineers

Several area surveying and engineering companies are using a Cad system. These include Central Engineers & Architects, Green Lake Surveying Co., Grothman & Associates, Mid State Associates, Ripon Land Surveying and Welch Land Surveying. All indicated that their information would be available to the County and they would be happy to work with County officials to develop an automated land information system.

#### e. Real Estate, Appraisal and Title Insurance Companies

Real Estate Offices keep and use a wide variety of land records information. With the exception of Multiple Listing Service (MLS), nothing is being maintained in any sort of digital format. All Realtors contacted expressed interest in land records modernization and were supportive of county efforts.

Area title and abstract companies also use a variety of land description information and all expressed interest in seeing the County system modernized. Mid State Abstract Company is currently maintaining some parcel information in a digital form. They would like to see a public computer access terminal located in the Register of Deeds' Office.



## GOALS AND OBJECTIVES

### Goals

The main goal of Green Lake County is to increase the efficiency of land records maintenance and management through the improvement of land records accuracy, the cost reduction of handling land information, and the increase of its ability to develop effective land management analysis tools. All land records will ultimately be united within a Land Information System (LIS) or Geographic Information System (GIS) that will be supported by all land-related county and local governmental offices, as well as private businesses being given the opportunity to aid in its development and management.

The modernization of land records is an essential step in being able to handle the prodigious rise of geographic data being generated. Information commonly held in several county departments must be maintained in a centralized LIS/GIS to allow greater accessibility to up-to-date records, and to avoid duplication of effort. The cost of handling land records will eventually decrease by the avoidance of duplicate record keeping, and more efficient processing of land records.

A County LIS/GIS also presents a proficient mechanism to aid in the solution of multifaceted land management problems. Farmland encroachment, wetland preservation, residential service expansion, planned real estate development, underground storage tank leakage, and location site analysis are all more effectively and competently solved with a modern land records management system.

Lastly, both government and private cooperation will be a key ingredient in accomplishing land records modernization goals. Geographic information must be able to flow in a punctual and expeditious fashion through local, state, and national agencies. LIS/GIS data and software, therefore, must be standardized and cooperative agreements reached between all land records agencies.

### Objectives

[The general goals discussed in the previous section are synthesized into six specific goals listed below (underlined). Each has a finite list of *objectives* that need to be completed in order to have successfully met that goal.]

#### 1. Enhance land records accuracy and reliability.

This will be performed through the following steps:

- (a) Primary data custodians will be identified for all land records.
- (b) A maintenance and standardized filing system policy will be implemented for handling land records.
- (c) A new Parcel Identification Number (PIN) system will be developed and implemented that is consistent with WLIB State recommendations.
- (d) Create an emergency address coding system for the County. The codes will be used within an emergency '911' response system as well as integrated into the LIS/GIS County database.

#### 2. Conduct a pilot study to demonstrate a LIS/GIS capabilities.

A comprehensive LIS/GIS database will be developed and implemented for a diverse, large-scale area (2.5 sq. miles) of Green Lake County (Appendix H). Upon completion, it will be used to demonstrate the usage and efficiency of a modern land information system.

3. Establishing an accurate geographic foundation framework.

- (a) Complete remonumentation of United States Public Land Survey (USPLS) System and State Plane Coordinate (SPC) System as the basis for all land records. Both will be tied to PLSS corners.
- (b) Establish a comprehensive network of Global Positioning System (GPS) coordinate points.
- (c) Develop a complete large-scale aerial survey to attain rectified black & white aerial photography for all of Green Lake County.

4. Promote cost-effectiveness by:

- (a) Promoting land data compatibility and standardization among government agencies, utilities, and the private sector to reduce needless duplication.
- (b) Encouraging coordination and cooperation between all land records agencies involved in modernization activities.
- (c) Develop an access policy for the planned LIS/GIS and the land records database.

5. Educate the general public about Land Records Modernization.

In order to increase the public's general awareness of the process and importance of land records modernization a modest educational program will be implemented. A videotape will be developed that outlines the potential of GIS/LIS in improving the general quality of life in Green Lake County through improved services and decision-making capabilities. This will be presented to the County Board and disseminated to interested businesses and the public.

6. Strengthen Geographic Analysis Planning and Development Decisions by:

- (a) Creating a digital data base for prioritized natural resource layers, including soils, wetlands, floodplains, and land use/zoning districts.
- (b) Compiling a digital base map (i.e. coordinate reference and highway information).
- (c) Developing functional resource analysis models for Green Lake County.



## MODERNIZATION and IMPLEMENTATION

Many studies (Marble & Wilcox, 1991) have shown that the success or failure of a Land Information System (LIS)/Geographic Information System (GIS) is often tied to the ability of managers to clearly identify realistic and functional requirements for their program. Although there are several general frameworks for the establishment of a land modernization program, the specifics need to be keyed to the distinctiveness and individuality of the people that the program will impact.

Green Lake County has therefore followed the generic land modernization plan format recommended by the Wisconsin Land Information Board (WLIB), but has also carefully sculpted a plan that fits the needs of the County. It is a blueprint that is tenable and doable within the next five years, and will increase the efficiency of all agencies and individuals handling land records information in Green Lake County.

Accordingly, this section of the Plan examines the four WLIB mandated standards, as well as the particular activities as delineated by the Green Lake County Land Information Committee. Each division is designated to further the previously defined goals and objectives that will be accomplished within the proposed timeline. A synopsis of all proposed activities and a timeline implementation guide is illustrated at the end of this section.

### 1. Foundational Elements

#### a. Geographic Frameworks

Green Lake County uses both the United States Public Land Survey (USPLS) System and State Plane Coordinate (SPC) System as the basis for their land records. Both are tied to Public Land Survey System Corners that are currently being remonumented.

An extensive Global Positioning System (GPS) will be implemented from 1993 to 1995 to improve the geodetic control for the County. Approximately 70-75 GPS coordinate points (about every three miles) will be calculated within a geodetic network in order to attain an accuracy of 5ppm. The County Surveyor will contract out for GPS services. The points will be tied to PLSS section corners to verify corner and remonumentation accuracy. Acquisition of county-wide GPS coordinates and remonumentation completion will precede all parcel mapping, so that section corner SPC accuracy can be verified. The County is also considering the development of its own projection surface and coordinate system to increase geodetic accuracy. This would further enhance the accuracy of SPC measurements.

The spatial reference system necessary for the County GIS has been given a high land records modernization priority and should be complete by the end of 1995.

#### b. Parcels

Green Lake County's Land Description Office maintain parcel maps for the County. The majority of the hand drawn maps were created in the 1950's and early 1960's. Each map has been maintained and updated at the original scale (1" = 400') or as an enlargement (1" = 300' or 1" = 50'). They are housed in the Land Description Office, and are bound into eighteen volumes. Although not legal evidence, these cadastral maps are the only comprehensive illustrations available for graphically depicting ownership boundaries.

Even though the digital encoding of all parcel maps is the ultimate goal of the County, only the LIS/GIS pilot study area will be encoded over the next five years. This decision is based on time and logistic considerations. Before a parcel mapping initiative is started it is



necessary to have both a solid geodetic and geographic reference framework in place. This will not occur until 1995. Secondly, the present parcel numbering and encoding system is non-systematic, and a complete revamping of the Parcel Identification Number(ing) (PIN) system is necessary before parcel digitizing and COGO conversion.

Standardization of the PIN is a critical value in parcel digitizing, since it will be the key identification code for each parcel or lot within the planned GIS database. The Land Information Committee and the Land Description Office will make selection of the new PIN by the beginning of 1993. An adoption schedule and PIN integration procedure will begin by the following year. Translation should be complete by the end of 1995.

It is also the tentative primary goal of the next five-year Green Lake County Land Modernization Plan (i.e. after 1996) to digitize or COGO (COordinate GeOmetry) all of the parcel maps.

#### c. Wetlands Mapping

The Wisconsin Department of Natural Resources (DNR) is currently converting all its wetlands information into digital format. Under its Wisconsin Wetlands Inventory (WWI) the data (1:24,000 scale; from 1978-79 aerial photographs) is being converted to ARC/INFO format. The DNR originally estimated that all of the State will be converted by Fall, 1992. According to latest DNR statements, however, this may be an optimistic completion date.

Under a proposed DNR data sharing policy (2/92), it is estimated that it will cost Green Lake County approximately \$1,000 to acquire the DNR WWI data when it becomes available. It is estimated that the data may be available for purchase by 1993-1994. The Green Lake County Land Conservation Department also uses USDA Wetland Maps, and plans to have these converted to digital form by 1994.

#### d. Soils Mapping

The federal Soil Conservation Service (SCS) published their Soil Survey index for Green Lake County in 1977. Field work, aerial photographic compilation, and subsequent interpretation was conducted from 1970-73. There are 32 full or partial soil sheets covering Green Lake County, but none of them are in digital form.

The Madison-SCS office is currently re-evaluating their policy on soil sheet digital conversion. They will likely establish a cost-sharing program with each Wisconsin county to digitize all soil surveys. They hope to complete the whole state within seven years (by the year 2000). The SCS is planning on funding this operation by having each county pay \$2 a soil polygon, with the average being \$500-\$700 for each soil sheet. It is estimated that Green Lake would have to pay the SCS between \$15-20,000 to have them digitize all the soil sheets. If an outside vendor was contracted they would have to meet SCS conversion standards.

Green Lake plans to have all the SCS soil sheets converted to digital form by the year 1996. If the SCS cannot accomplish this goal within the specified timeline, an outside vendor that meets SCS standards will be hired. Both internal funding and outside grants will be used to contract for digital soils mapping. The SCS-CAMPS database will be linked to all the soil polygons.

#### e. Zoning Mapping

The Green Lake County Zoning/Sanitation Office develops and maintains all land use and zoning for the County. Incorporated areas (e.g. municipalities) maintain their own zoning regulations and coding systems. The original land use and zoning maps were completed in



the early 1980's on mylar for creating blueline (diao) copies. Periodically, the zoning maps are updated by Zoning Office personnel.

All zoning maps will be converted to digital form by the end of 1994. Two data sources will be used for conversion and updating land use information. The original land use and zoning maps will be converted to ARC/INFO format, along with information gleaned from aerial photographs (refer to "additional activities" section). Zoning and land use classification and boundary accuracy will be upgraded using aerial photography (see section 5b).

#### **f. Institutional Arrangements**

Only one formal agreement exists between Green Lake County and outside agencies. The Land Information Committee is the official contact for making cooperative land records interchanges or arrangements. All parties interested in land records and the implementation of the Green Lake County GIS will be directed through this Committee.

Standard informal arrangements also exist between County and State offices that normally exchange land record data. For example, the Register of Deeds provides information to the Wisconsin Department of Revenue (DOR), the general public, title insurance companies, assessors, appraisers, Realtors, and lenders (banks). In contrast, zoning provides data to the general public, and many other County and local agencies and offices.

The Land Information Committee, however, will explore the value and nature of formal agreements with both the public and private sector. Symbiotic data relationships may be cultivated between private businesses, such as, utility companies. Firms that want to access (read only) information for private enterprise and profit (e.g. Realtors) may be charged for County services. Exchange of geographic data between counties and state agencies may also be formalized to insure compatibility of the requested data (i.e. interchange standards).

Projects involving land records modernization research will also be cultivated if County benefits can be anticipated. The Land Information Committee believes in the philosophy of "opportunism." That is, when funding opportunities are presented outside the normal base budget County financing, they will be fully examined and developed to further aid the County LIS/GIS. Through the use of grant funding, special state or local funding, and the regular budget process, several parts of the land records modernization program may develop simultaneously. For example, the County Land Conservation Office is currently working with the USDA and the WI-DNR in developing watershed management plans. In turn, this will likely lead to more cooperative arrangements and data sharing.

#### **g. Communication, Education, and Training**

Two of the main objectives of the Plan involve educating both the general public and Green Lake County officials about the potential of LIS/GIS in improving land records maintenance efficiency. This will be accomplished through a proposed pilot project and the creation of a videotape.

As outlined in the "Additional Activities" section (5) an extensive pilot study will be implemented to illustrate the procedures involved in building a GIS, and its subsequent utility in maintaining land records and geographic problem-solving (e.g groundwater contamination analysis). The pilot study area will encompass both urban and rural areas, and will be targeted for completion by 1995. The end product will not only serve as a concrete example for Green Lake County citizens and officials, but will also thoroughly immerse County land record custodians in LIS/GIS techniques and terminology.



The videotape will be modeled after the Marathon County demonstration recently showcased at the 1992 Wisconsin Land Information Association (WLIA) Annual Conference. It will depict the versatility, flexibility, and capabilities of a modern computer-based land information system. The videotape will be made available to County officials (e.g. County Board) and the general public. It also will be offered to local schools and private groups with an interest in land records.

Additionally, it is the intention of the Land Information Office to improve the accessibility of land records by improving the coordination of land records maintenance between county, city, village and town offices. The Committee will develop a "top-down" design of information dissemination for all governmental units that handle geographic data within the County. Information dispersion can take on many forms, including the initiation of "brown-bag" GIS seminars, and a LIS planning newsletter.

The increase in land modernization activities will also generate a need for GIS education. Presently, no personnel in the County have formal GIS training. Eventually pc-workstations will be placed in several land records locations, and ultimately networked to the County mainframe. All personnel within these governmental units will need training that will be given through the University of Wisconsin, by attendance at conference workshops, or through private vendor seminars (e.g. ESRI).

#### **h. Public Access Arrangements**

Ultimately, the long-term goal of Green Lake County is to allow each citizen access to all public domain information, available through a central LIS/GIS database (i.e. County's HP-3000 mainframe) through either a remote uplink (e.g. home computer), or a computer terminal at one of the land records offices. County land records will be updated daily, immediately illustrating all changes. The County's HP-3000 and '486pc's, however, will be the main custodial GIS computers. It is likely that public terminal access will not be available until 1997-99 due to the lengthy digital conversion process.

#### **i. Additional Activities**

Further land records modernization activities are detailed in section five of this document.

## **2. Standards**

### **a. Geographic Frameworks**

#### **1. Geodetic Reference Systems**

All geographic data owned or maintained by Green Lake County is currently in ground SPC under the NAD 27 standard (horizontal datum) and NGVD 29 standard (vertical control). Due to its current investment in the NAD 27 standard, the NAD 83/91 and NAVD 88/91 standards will not be used until the completion of all remonumentation, the calculation of GPS points, and the re-determination of SPC points. Both NAD27 and NAD83 coordinates may be maintained (or NAD27 archived), since there are significant differences between the systems (e.g. NAD27 is in feet space, NAD83 is in meters).

Wisconsin Universal Transverse Mercator (UTM) coordinates will be supported for base information collected from state agencies that prefer the UTM system (e.g. Wisconsin Department of Natural Resources).



## 2. Public Land Survey System Corners

Remonumentation of all Green Lake County section corners is 80% complete. The twenty percent of the County that remains undone is mostly wetlands, which includes the White River and Grand River marsh area (owned by the WI-DNR). The remonumentation program was started in 1971, and will be concluded by the County Surveyor within the next three years. The final cost of the program will near \$300,000 (The County has invested approximately \$14,000 per year in this project since its implementation). This program meets all state statutory requirements. Coordinate values of each monument meets or exceeds Federal Geodetic Control Committee Third Order Class 1 standards.

## 3. Geographic Control Data

All of the planned geographic digital files of Green Lake County (e.g. land use/land cover, zoning) will be encoded in SPC. All analog source maps and digital map files will be converted to SPC (if necessary) for database compatibility. The accuracy and precision of the data will follow Federal Standard guidelines (i.e. FIPS - Federal Information Processing Standard). United States Geological Survey (USGS) topographic information, for example, has an accuracy standard of +/- 40 feet.

## b. Parcels

### 1. Cadastral or Legal Evidence

The Green Lake County Land Description Office is the primary custodian for all land ownership and legal information. There are approximately 18,000 total parcels, including 1,907 recorded certified survey maps (CSM's) and 251 assessor plats, that includes the cities of Berlin, Green Lake, Markesan, Princeton, and the Village of Marquette. Several municipalities, however, maintain duplicate parcel records, such as, the cities of Berlin, Green Lake, Markesan, and Princeton.

### 2. Parcel Boundaries

Green Lake County maintains all legal records and geographic base data for parcel boundaries. Any parcel map overlaps and gaps between properties has always been catalogued.

### 3. Parcel Administration

The Green Lake County Land Description Office is the only custodian of parcel maps. It assigns all identification codes and boundaries for every parcel. Consequently, the cities of Berlin, Green Lake, Markesan, and Princeton need to obtain all parcel information from the County. The City of Berlin is also unique in that part of the city lies in Waushara County, so that it developed a cross-reference index system between the Green Lake and Waushara PIN systems, along with its own numbering scheme.

### 4. Parcel Identification

Green Lake County is currently in the process of revamping its PIN to meet the requirements and guidelines of the WLIB and the Wisconsin Department of Revenue standards. The present PIN is derived from a non-systematic numbering system that is unique and distinctive for each town and village. Supplementary parcel records often have to be consulted to pinpoint the exact location of a parcel. Consequently, one of the main objectives in the Land Modernization Plan is to adapt a new PIN system based on recommended State standards. Further information about the current PIN and the model under consideration is in Appendix H.

Consideration is also being given to the modernization of the database format that currently is used for all tabular parcel information. Deficiencies in the current system indicate



potential incompatibilities with records modernization procedures that will have to be addressed with the implementation of the new PIN. A separate '911' address coding system also needs to be integrated into a compatible database form.

### **c. Wetlands Mapping**

The WI-DNR will provide the digital Wetlands Inventory Maps (i.e. pcARC/INFO coverages) under their data sharing cooperative arrangement agreement. Each map will cover one Public Land Survey Township at a scale of 1:24,000. A hierarchical coding scheme modeled after the U.S. Fish & Wildlife Service classification system is the basis of all wetland vegetation identification. Although analog (hard) copies of the maps are available now, Green Lake County will wait for the availability of the digital copies.

The USDA Wetland Maps will also be acquired, but in analog form, and then converted to SPC-based digital form. The DNR maps are in UTM coordinates and will have to be transformed to the SPC system for optimal County usage.

### **d. Soils Mapping**

All soil mapping will follow Soil Conservation Service (SCS) guidelines for digital conversion. The SCS regional office in Omaha, Nebraska establishes all conversion accuracy and precision standards. The final digital files will be transformed to SPC ground coordinates. The SCS-CAMPS database has over 100 attributes for each soil polygon (soil type). This will be linked to the completed Green Lake County soils data layer.

### **e. Zoning Mapping**

All zoning maps will be developed as ARC/INFO coverages in a SPC reference system. The Green Lake County Zoning Office will attempt to digitize all zoning maps in-house, or use student interns to complete the conversion by 1994. An outside vendor will be considered in order to expedite the conversion process. Zoning and land use maps will be converted to digital form in a prioritized township order.

The U.S. Census' TIGER files (census tracts and blocks) will be examined to determine if purchase of these files and their subsequent conversion will aid in the identification and classification of land use and zoning assignments.

### **f. Institutional Arrangements**

Formal and informal agreements and interchanges are discussed in section D. (Foundational Elements (1) (f)). Exchange of land records among institutions in a standardized data format is outlined in the next sub-section (Data Interchange Standards).

### **g. Communications, Education, and Training**

The general philosophy and education implementation procedures are detailed in the Foundational Elements (1) (g) section.

### **h. Public Access Arrangements**

Policies involving land records privacy will be developed before the implementation of any public terminal access system. Comprehensive security features are available for ARC/INFO and pcARC/INFO and corresponding operating system software. Careful scrutiny of the open records laws and right to privacy issue will direct the Land Information Committee to establish a policy and procedure for LIS/GIS public usage.



### 3. Data Interchange Standards

#### a. Informal Data Interchange Standards

All exchanges of digital land records data is informal at the present time. County land records are presently maintained in a data base management system (DBMS) on the County's HP3000 mainframe computer, but precise custodianship is ambiguous. As map information is converted to digital form, standards will be established for its installation and maintenance on pcARC/INFO workstations and the HP3000. Digital land records data will be documented so that source material (e.g. map, photograph, survey), the digitization process (e.g. manual, scanned), format (.DXF, ARC coverage, ASCII text), and compatibility format is known. The same system normally exists for relational land records databases (i.e. text information).

Green Lake County is planning to purchase ESRI's pcARC/INFO-GIS and will likely also acquire a CAD package for the County Surveyor's office. The CAD system (e.g. AutoCAD) will have direct exchange compatibilities with ARC/INFO (.DXF, ARC exchange, ARC/CAD conversion). Data congruency will therefore be assured for all land records within Green Lake County.

#### b. Formal Data Interchange Standards

Currently, there are no formal agreements among Green Lake County land record holders of digital data. The County, however, will be investing in developing ARC/INFO coverages (GIS data layers), so that it will become the *de facto* standard. This commitment to ARC/INFO will also help facilitate the transfer of information to Green Lake County since all Wisconsin Land Records Offices are using ARC/INFO (e.g. DNR, DOT). Furthermore, this GIS software is the most widely used in the world, so data attained from outside vendors and federal government agencies can likely deliver the information in ARC/INFO compatible format.

The Land Information Committee is also considering asking all surveyors and contractors to supply subdivision maps in .DXF (AutoCAD interchange) format. Conversion can then be made through ESRI's DXFARC translation or ARC/CAD programs. Translations of other digital data, however, are dependent on software compatibility. For example, Intergraph's MicroStation software and ARC/INFO use drastically different computer file formats and are difficult to interchange and convert. A state or national standard would therefore increase data compatibility. The United States Geological Survey (USGS) has recently developed a draft version of a national Spatial Data Transfer Standard that the State of Wisconsin may eventually adopt upon final revision. Green Lake County would support such a proposal.

#### c. Parcel Identification Numbers

The proposed parcel numbering system that the Land Information Committee is presently considering follows the mandatory requirements as stipulated by WLIP guidelines.

Explanation of the system can be found in Appendix H. Either this PIN or a similar version will likely be adopted in the near future.

### 4. Administrative Standards

This county-wide plan represents an agreement between Green Lake County and the Wisconsin Land Information Board (WLIP). This agreement is intended to effectuate the objectives of the WLIP as embodied in the enabling legislation. In order for this Plan to be approved, the WLIP and Green Lake County agree and consent as follows:

- a. Green Lake County agrees to observe and follow the statutes to the Wisconsin Land Information Program and other relevant statutes.



- b. Green Lake County agrees to permit the Wisconsin Land Information Board access to books, records and projects for inspection and audit upon reasonable notice by the Board.
- c. Green Lake County agrees to provide an annual status report of Plan progress and to update the Plan at the end of five years.
- d. The WLIB agrees to provide technical assistance to Green Lake County.
- e. The WLIB agrees to maintain and distribute an inventory of land information and land information systems for the state.
- f. The WLIB agrees to review and, where appropriate, approve plans and to provide guidance to Green Lake County with respect to plan development. In addition, the WLIB agrees to review and, where appropriate, approve updates and revisions to county-wide plans.
- g. WLIB approval of county-wide plans confers certain benefits on local government within Green Lake County, including continued participation in the WLIP and eligibility to make application for grants-in-aid.
- h. The WLIB agrees to review grants-in-aid project applications and to provide guidance to Green Lake County with respect to the development of such applications.
- i. The WLIB agrees to provide Green Lake County with an annual report regarding the status of the Wisconsin Land Information Program and the activities of the WLIB.
- j. Green Lake County will be entitled to retain increased recording fees upon designation of a Land Information Office provided that within two years of the designation it submits a county-wide plan to the WLIB, which is approved. WLIB approval of the county-wide plan also enables Green Lake County to apply for grants-in-aid for itself or any other local unit of government within its borders.

## **5. Additional Activities**

In order to complete the goals and objectives set forth in this Plan, additional investment in LIS/GIS development will be implemented with the following activities. It is anticipated that a majority of these endeavors will be completed within the next five years, but funding has not been secured. County funding will probably be invested in several of these projects, but a WLIB grant application will be requested to aid in the completion of a pilot GIS study.

### **a. Comprehensive LIS/GIS Pilot Project**

Pilot projects or "benchmark evaluations" often provide users with invaluable experience in the development of new techniques, such as, GIS. Most LIS planners recommend that these projects be limited to one data layer or limited to a small area. These projects also help introduce users to hardware and software, and aid in the dissection of problems in the system. The pilot project also provides a way of testing new applications before a county makes a full commitment to automated methods.

Green Lake County will develop a complete LIS/GIS database for a small area of the County that encompasses parts of the Towns of Brooklyn and Green Lake. The 2.5 square mile area was chosen based on its diversity of land usage and value. This area surrounds Green Lake (Appendix I), and has both high & low property values, urban and rural areas, and an unique wetland region. At a minimum the LIS database will include: parcels, soils, land use/zoning,



some utilities, and surface hydrology. The completion of the LIS/GIS pilot database will be targeted for mid-1995, and will be developed both internally and with outside vendor assistance.

**b. Aerial Photography**

Complete color or black & white aerial photographic coverage of Green Lake County will be performed by 1994. The County may contract with a vendor to fly the whole County during "leaf-off" conditions. The photography will be obtained to serve as a basis for comprehensive reference base map information for the LIS/GIS (e.g. zoning, land use, highways). It will be flown with horizontal and vertical control sufficient to meet national map accuracy standards at a final scale of one inch equals 400 feet (1" = 400').

An alternate strategy is to purchase a sample of the new USGS-NAPP (National Aerial Photography Program) photographs for a portion of Green Lake County. Although at a scale of 1" = 3333', and only black & white, they still may provide the necessary information for general base map data for the County. Some of the photos will be purchased later this Fall (1992) when they are available. The Green Lake County Land Information Committee will scrutinize their objectives in acquiring aerial photography after examination of the NAPP shots to determine if contracting for larger scale photographs is still needed.

**c. GIS Equipment Support (Hardware & Software)**

The County Clerk's, Land Description, and Treasurer's Office are currently the only departments linked to the HP3000 mainframe. There are also a limited number of stand-alone pc's located in the County building. GIS pc-workstations (e.g. '486pc's) will be purchased and initially placed in County agencies, personnel will then start learning GIS software and hardware operations. The initial number of pc's will be determined by mid-1992, when the level of County funding is known. At a minimum it is estimated that three GIS pc-workstations will be purchased. One area will also be designated as the main GIS laboratory in which a large-scale digitizer and plotter will be located.

Although it is feasible to operate ARC/INFO on the HP3000 mainframe, it was felt that greater LIS modernization success would be reached by starting with personal computers (i.e. 486pc's). Several key County personnel are unfamiliar with computing operating systems and totally unacquainted with LIS/GIS software and hardware. An 486pc, however, would present a more friendly learning environment with DOS and pcARC/INFO than a mainframe with ARC/INFO, and UNIX-based operating system, and a more complex "shell" environment. All pcARC/INFO coverages and files are also transferrable to ARC/INFO.

At the end of a three-year period, an assessment will be made as to whether the pc workstations should be networked to the mainframe. Eventually all workstations will be linked together and all will be accessing the same GIS database.

**d. 911 system**

The Sheriff's Department is currently examining '911' systems (Emergency Computer-Aided Dispatch System). Several 'enhanced 911' systems are being inspected (i.e. Motorola, Wisconsin Bell). The Land Information Committee will work in conjunction with the Sheriff's Office to select a 911 system that will be compatible and functional with ARC/INFO. This will allow the integration of the County's new emergency address coding system (i.e. county-wide coordinate system for tracking emergency calls) with the new PIN and other land records data. The result should be a highly utilitarian automated emergency response system with features, such as, caller address matching and call tracing.



#### e. Natural Resource Planning and Management

In Green Lake County, tourism and recreation have always played a major part in its identity and economic stability. Consequently, the protection and wise management of its natural resources is of major importance to the County. Surface and groundwater quality, wetlands protection, and the prevention of soil erosion are just a few of the concerns of Green Lake County. Given these stresses, additional GIS programs will be implemented, including acquisition of USGS 1:24,000 surface hydrology and topographic digital data. Digital floodplain mapping for the whole County is also a high priority in creating an environmental database, but cost factors will have to be examined before a time schedule is set. The identification and geo-referencing of hazardous materials (e.g. pesticides) and other point pollution sources will also be investigated for integration into the County LIS before 1996.

#### 6. Land Records Activities and Timeline Schedule

In order to fulfill the planned objectives, several projects were endorsed and scheduled by the County Land Information Committee for completion by 1996. A timeline (Figure 3) illustrates the targeted tasks for the development of at least twelve LIS/GIS digital acquisition and conversion activities. This can be classified into four general groups: Geodetic Control, Land Records Enhancement, the Pilot Project, and Environmental Management.

Top priority is being given to finishing a precise and accurate geodetic framework by the end of 1995. This includes remonumentation, SPC determination, the purchase of large-scale aerial photography, and establishing a GPS network. Some of these activities will continued to be funded through the County Surveyor's budget, while other potential funding may come from the Register of Deeds recording fees, special County financing, and potential grant funding.

Also given high priority is the pilot project, which is seen as extremely important in demonstrating the utility of a modern LIS/GIS in Green Lake County. The pilot area will only be 2.5 square miles, but a wide-range of LIS layers will be digitized (e.g. parcels, zoning, highways, soils, wetlands). Target date for finishing the pilot data layers is the end of 1994. Funding for the pilot project will probably come from WLIB grant funding, Register of Deeds recording fees and special County financing.

Modernization of the PIN and establishment of the '911' system and address codes are seen as an essential objective in preparing the County parcel records for digital conversion (1996-1998?). Revamping the PIN will be covered by the Register of Deeds and Land Description Offices, while '911' address coding will be paid by each Green Lake County town government.

Finally, several physical and cultural environmental digital layers will be created to improve management decisions and policy implementations. Initially, these include zoning, wetlands, soils, surface hydrology, topography, as well as the acquisition of aerial photography. These projects will be on-going through 1996. Cooperative state and federal agreements and grants and in-house digital processing will fund the mapping jobs.

During the five-year period of the Plan, activities will also be developed for land records education, and cooperative activities (Figure 4). County funding is presently available for GIS pc-workstations, and financial and logistic planning will begin in 1994 for the potential migration of all LIS/GIS functions to the HP mainframe in 1995. Custodians of all digital land records will be also be identified, and GIS standards and maintenance policies will be established. Further co-operative links will be developed between the County and local, state, and federal agencies. LIS/GIS training will commence by the end of 1992, and will be continue throughout the five-year Plan. Finally, the pilot project educational videotape is targeted for completion in 1995 (after the conclusion of creating the data layers).

If all activities on the timelines are completed by 1996, Green Lake County will have made significant improvement in several facets of land records modernization. The County should also be poised for COGO conversion of its parcel maps during the next five-year planning period. More importantly, the County should benefit with substantial cost savings in both land records maintenance and improved environmental support systems.

#### References

Marble, Duane F., and Darlene L. Wilcox, (1991) "GIS Design and Implementation," Association of American Geographers Workshop Presentation, Miami, Florida.

United States Geological Survey (1991), Spatial Data Transfer Standard, version 12/90, Reston, Virginia.



# Land Records Conversion **TIMELINE**

GIS / LIS Digital  
Conversion Activity

1992 1993 1994 1995 1996

Remonumentation  
(PLSS Corners)

SPC Determination  
of PLSS Corners

GPS Network  
(Global Positioning System  
Geodetic Reference)

Revised PIN

Pilot Project

Zoning

Wetlands

Soils

911 System &  
Address Coding

Aerial Photography

Surface Hydrology  
(1:24,000)

Topography  
(1:24,000)

Target Completion Dates

Potential Extension Due to  
Funding Uncertainty

# GIS Education, Development, and Cooperative Activities

## TIMELINE

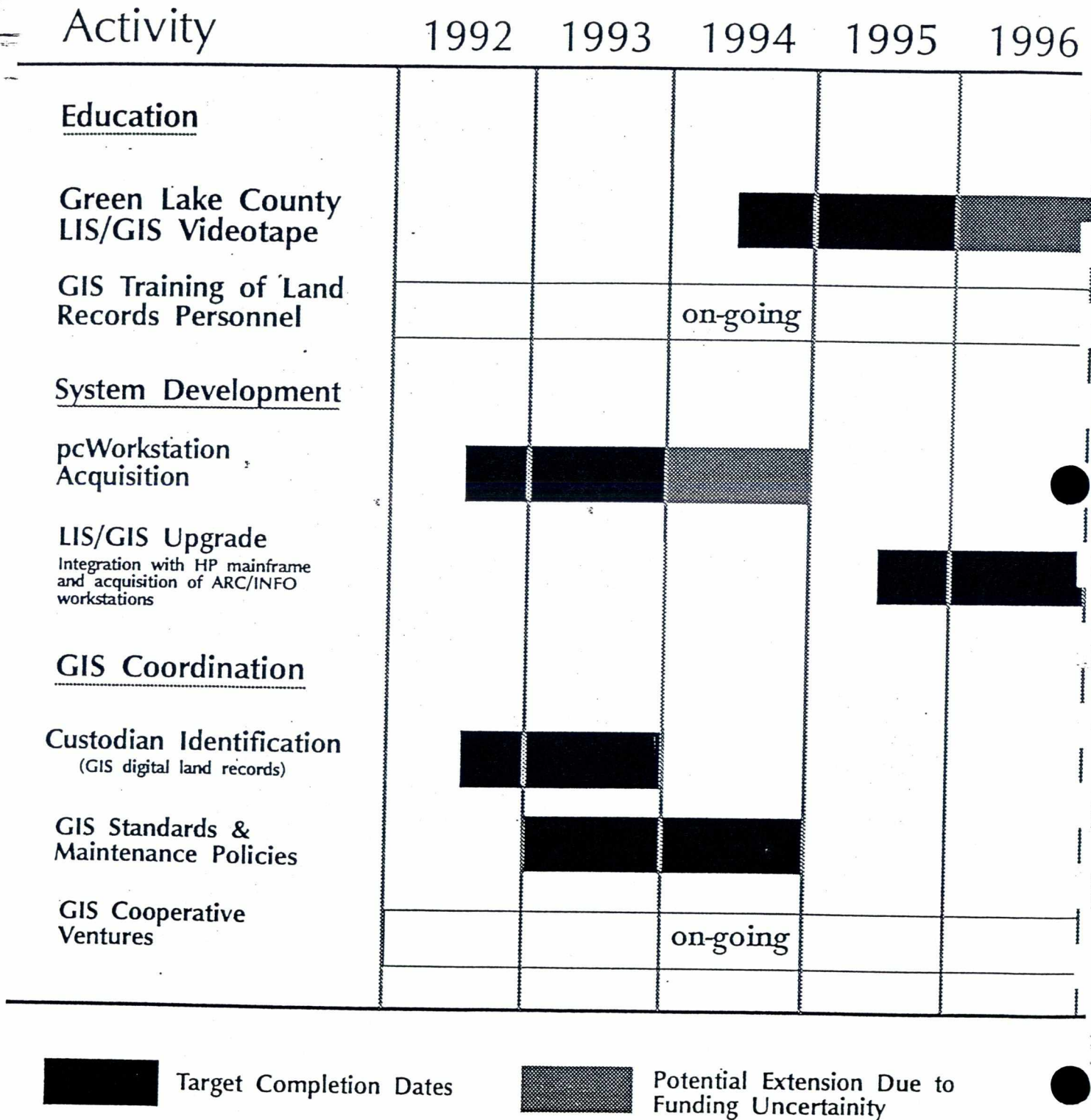


Figure 4.



# Appendix A

Green Lake County  
Land Records Modernization Resolution

## RESOLUTION NUMBER 30-90

## Relating to Creation of Land Information Office

The County Board of Supervisors of Green Lake County, Green Lake, Wisconsin, duly assembled at its regular meeting begun on the 19th day of June, 1990, does resolve as follows:

WHEREAS, existing methods of recording, storing and handling of land records are accurate but inefficient; and,

WHEREAS, a modernized land records system would be beneficial to the general public, municipalities, businesses and County offices; and,

WHEREAS, Wisconsin Act 339, which becomes effective July 1, 1990, requires that effective July 1, 1990 the Register of Deeds charge increased fees for recording any instrument entitled to be recorded in that office; and,

WHEREAS, said Wisconsin Act 339 further provides that the County may retain a portion of said fees provided: 1. The County has established a land information office under ss. 59.88(3); 2. A land information office has been established for less than 2 years or has received approval for a countywide plan for land records modernization under ss. 59.88(3)(b); and, 3. The County uses the fees retained under this subparagraph to develop, implement and maintain the countywide plan for land records modernization;

Roll Call on Resolution No. 30-90 Submitted by Finance Committee

Ayes 21, Nays 0, Absent 0, Abstain 0.

Passed and Adopted/~~Rejected~~ this 19th day of June, 1990.

Herbert A. Dahlke  
County Board Chairman

ATTEST: [Signature]  
County Clerk  
Approved as to Form:

[Signature]  
Corporation Counsel

Arlyn W. Hollander  
Arlyn W. Hollander, Chairman

[Signature]  
Robert A. Malchetske

Donald A. Bartol  
Donald A. Bartol

[Signature]  
James E. Schommer

Michael R. Stoddard  
Michael R. Stoddard



Resolution Number 30-90 Relating to Creation of Land Information Office  
Continued:

NOW, THEREFORE, BE IT RESOLVED that the Office of the Register of Deeds shall be designated as the Green Lake County Land Information Office, in compliance with the requirements of ss. 59.88, Wisconsin Statutes; and,

BE IT FURTHER RESOLVED that a Land Information Committee is established to assist the Land Information Office in meeting the requirements of ss. 59.88, consisting of the Register of Deeds, the County Clerk, the Data Systems Manager, the Real Property Lister, the County Surveyor, the Zoning Administrator, the County Conservationist, *Treas*, the Highway Commissioner, the Chairman of the Finance Committee, and the Chairman of the County Board. This Committee shall be maintained until June 30, 1996, the specified termination date for this program, and shall be entitled to meeting reimbursements as appropriate under Resolution Number '56-89.

FISCAL NOTE: Based on 1989 activity in the Register of Deeds Office, the additional collections the first year should be in excess of \$14,000, of which half or \$7,000 would be retained by Green Lake County if this resolution is approved. This \$7,000 along with similar amounts received through June 30, 1996, would then be applied toward the computerization of the land records in the Register of Deeds, Zoning and Surveyor's offices. Establishment of this program would also entitle the County to participate in a grant program, whereby up to 75% of costs of the modernization program not covered by fees would be paid through grants from the State.

RESOLUTION NUMBER 30-90

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WHEREAS, said Wisconsin Act 339 further provides that the County may retain a portion of said fees provided: 1. The County has established a land information office under ss. 59.88 (3) ; 2. A land information office has been established for less than 2 years or has received approval for a countywide plan for land records modernization under ss. 59.88 (3) (b) ; and, 3. The County uses the fees retained under this sub-paragraph to develop, implement and maintain the countywide plan for land records modernization;

NOW, THEREFORE, BE IT RESOLVED that the Office of the Register of Deeds shall be designated as the Green Lake County Land Information Office, in compliance with the requirements of ss. 59.88, Wisconsin Statutes; and,

BE IT FURTHER RESOLVED that a Land Information Committee is established to assist the Land Information Office in meeting the requirements of ss 59.88, consisting of the Register of Deeds, the County Clerk, the Data Systems Manager, the Real Property Lister, the County Surveyor, the Zoning Administrator, the County Conservationist, Treasurer, the Highway Commissioner, the Chairman of the Finance Committee, and the Chairman of the County Board. This Committee shall be maintained until June 30, 1996, the specified termination date for this program, and shall be entitled to meeting reimbursements as appropriate under Resolution Number 56-89.

FISCAL NOTE: Based on 1989 activity in the Register of Deeds Office, the additional collections the first year should be in excess of \$14,000, of which half or \$7,000 would be retained by Green Lake County if this resolution is approved. This \$7,000 along with similar amounts received through June 30, 1996, would then be applied toward the computerization of the land records in the Register of Deeds, Zoning and Surveyor's offices. Establishment of this program would also entitle the County to participate in a grant program, whereby up to 75% of costs of the modernization program not covered by fees would be paid through grants from the State.

Roll Call on Resolution No. 30-90.

Ayes 21, Nays 0, Absent 0, Abstain 0.

Passed and Adopted this 19th day of June, 1990.

-s-Herbert A Dahlke, County Board Chairman

-s-Raymond F. Stoll, ATTEST: County Clerk

Approved as to Form: -s-John B. Selsing, Corporation Counsel

Submitted by Finance Committee: -s-Arlyn W. Hollander, Chairman; -s-Robert A. Malchetske; -s-Donald A. Bartol; -s-James E. Schommer; -s-Michael R. Stoddard.

Room No. 230-2



# Appendix B

## Green Lake County Land Records Modernization Questionnaire

# Green Lake County Land Records Modernization Questionnaire

Department/Agency \_\_\_\_\_

Please indicate with a check (✓) the land record information your office uses and/or maintains.

Contact Person \_\_\_\_\_ Phone \_\_\_\_\_

	Use	Maintain		Use	Maintain
Cable TV Lines			Political & Administrative Boundaries		
Census Information			Congressional District		
Gas & Electric Utilities			Election District		
Gas Mains			Fire District		
Pipelines			Police Jurisdiction		
Easements			School District		
Electric Lines			Township Boundary		
Health & Safety			Railroad Lines & Tracks		
Evacuation Routes			Roads & Streets		
Hazardous Materials			Addresses		
Hazardous Waste			Centerlines		
School Bus Routes			DOT Classification		
School Locations			Road Names		
Land Use/Characteristics			Official Road Maps		
Geology			Right-Of-Ways		
Historic Sites			Survey Control Point Data		
Land Use/Cover			Remonumentation Progress		
Landfills			Telephone Utilities		
Parks & Open Spaces			Easements		
Soil Surveys			Transmission Lines		
Topography			Water Features		
Underground Tanks			Groundwater Information		
Vacant Lands			Floodplains		
Well Locations			Lakes & Rivers		
Zoning			Watersheds		
Parcel Information			Wetlands		
Assessed Value			Water & Sewer Utilities		
Grantor/Grantee			Hydrants		
Legal Description			Manholes		
Legal Ownership			Sewer Mains		
Parcel Boundaries			Water Mains		
Parcel ID (PIN)			Other:		
Plat Maps					
Subdivision Plats					
Tax Jurisdiction					
Tax Status					

Do you have use for any of this information in a digital form? If so, which items?

Are you interested in and /or support a county effort to modernize land records information?  
(Please feel free to use the back of this sheet for any additional comments)

Thank you for your participation.



## Appendix C

Summary of Green Lake County  
Municipalities Responding to  
Activities and Interest Survey

<u>Municipality</u>	<u>Response ?</u>
Town of Berlin	yes
" Brooklyn	yes
" Green Lake	yes
" Kingston	yes
" Mackford	yes
" Manchester	yes
" Marquette	yes
" Princeton	yes
" St. Marie	yes
" Seneca	yes
City of Berlin	yes
" Green Lake	yes
" Markesan	yes
" Princeton	yes
Village of Kingston	yes
" Marquette	yes



[illegible]

	Gas Mains	Pipelines	Easements	Electric Lines	Telephone Lines							
City of Berlin Zoning/Building Office		✓										
City of Green Lake Clerk/Treasurer	✓	✓	✓	✓								
TOTALS	1	1	2	1	1							6



# Health and Safety

	Evacuation Routes	Hazardous Materials	Hazardous Waste	School Bus Routes	School Locations							
Town of Green Lake Clerk			✓									
Town of Mackford Chairman		✓	✓									
Town of Mackford Clerk		✓	✓									
Town of Marquette Chairman		✓										
Town of Princeton Clerk	✓	✓										
TOTALS	1	1	3	4								9

[illegible]



# Land Use and Characteristics

	Geology	Historic Sites	Land Use/Cover	Landfills	Parks & Open Spaces	Soil Surveys	Topography	Underground Tanks	Vacant Lands	Well Locations	Zoning
Town of Berlin Assessor	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Town of Berlin Chairman			✓								✓
Town of Brooklyn Assessor	✓	✓	✓		✓	✓	✓	✓	✓	✓	✓
Town of Brooklyn Chairman		✓	✓		✓						✓
Town of Green Lake Assessor	✓	✓	✓		✓	✓	✓	✓			✓
Town of Green Lake Clerk			✓	✓							✓
Town of Mackford Assessor					✓						✓
Town of Mackford Chairman			✓								✓
Town of Mackford Clerk			✓							✓	✓
Town of Manchester Assessor	✓	✓		✓	✓	✓	✓	✓	✓	✓	✓

THE UNIVERSITY OF CHICAGO

	Geology	Historic Sites	Land Use/Cover	Landfills	Parks & Open Spaces	Soil Surveys	Topography	Underground Tanks	Vacant Lands	Well Locations	Zoning
Town of Marquette Chairman		✓			✓	✓					✓
Town of Princeton Clerk			✓								
Town of Seneca Chairman			✓								
TOTALS	4	6	10	2	7	5		4	1	11	50



# Land Use and Characteristics

	Geology	Historic Sites	Land Use/Cover	Landfills	Parks & Open Spaces	Soil Surveys	Topography	Underground Tanks	Vacant Lands	Well Locations	Zoning
City of Berlin Clerk			✓	✓					✓	✓	✓
City of Berlin Zoning/Building Office	✓	✓		✓				✓			✓
City of Green Lake Clerk/Treasurer						✓					
City of Markesan Assessor					✓	✓					
City of Markesan Clerk			✓					✓		✓	✓
Village of Kingston Assessor			✓		✓	✓		✓		✓	✓
TOTALS	1	1	3	2	2	3		2	2	4	20

[illegible]



[illegible]

# Parcel Information

	Assessed Value	Grantor/Grantee	Legal Description	Legal Ownership	Parcel Boundaries	Parcel ID (PIN)	Plat Maps	Subdivision Plats	Tax Jurisdiction	Tax Status
Town of Berlin Assessor	✓	✓	✓	✓	✓	✓	✓	✓		
Town of Berlin Chairman						✓	✓			
Town of Brooklyn Assessor	✓	✓	✓	✓	✓	✓	✓	✓		
Town of Brooklyn Chairman							✓	✓		
Town of Green Lake Assessor	✓	✓	✓	✓	✓	✓	✓	✓		
Town of Green Lake Clerk	✓	✓	✓		✓	✓				
Town of Kingston Assessor	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Town of Mackford Assessor	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Town of Mackford Chairman	✓	✓	✓	✓	✓	✓		✓	✓	✓



# Parcel Information

	Assessed Value	Grantor/Grantee	Legal Description	Legal Ownership	Parcel Boundaries	Parcel ID (PIN)	Plat Maps	Subdivision Plats	Tax Jurisdiction	Tax Status
Town of Mackford Clerk	✓	✓	✓	✓	✓			✓	✓	✓
Town of Manchester Assessor	✓	✓	✓	✓	✓	✓	✓			
Town of Manchester Clerk	✓	✓			✓		✓	✓		
Town of Marquette Assessor	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Town of Marquette Chairman	✓	✓	✓	✓	✓	✓	✓	✓	✓	
Town of Princeton Assessor	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Town of Princeton Clerk	✓	✓	✓	✓	✓	✓	✓	✓	✓	
Town of Seneca Chairman	✓	✓	✓	✓		✓				
Town of St. Marie Assessor	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Town of St. Marie Clerk	✓	✓	✓		✓	✓		✓	✓	
TOTALS	17	13	17	16	14	16	17	14	7	145

# Parcel Information

	Assessed Value	Grantor/Grantee	Legal Description	Legal Ownership	Parcel Boundaries	Parcel ID (PIN)	Plat Maps	Subdivision Plats	Tax Jurisdiction	Tax Status
City of Berlin Zoning/Building Office	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
City of Green Lake Clerk/Treasurer	✓	✓	✓	✓	✓	✓	✓			
City of Markesan Assessor	✓	✓			✓	✓	✓			
City of Markesan Clerk	✓					✓	✓	✓	✓	✓
City of Princeton Assessor	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
City of Princeton Treasurer				✓		✓				
Village of Kingston Assessor	✓	✓	✓	✓	✓	✓	✓		✓	✓
TOTALS	6	4	5	4	5	5	6	3	4	49



# Political & Administrative Boundaries

	Congressional District	Election District	Fire District	Police Jurisdiction	School District	Township Boundary						
Town of Berlin Assessor				✓	✓	✓						
Town of Berlin Chairman	✓	✓	✓	✓	✓	✓						
Town of Brooklyn Assessor				✓	✓	✓						
Town of Brooklyn Chairman		✓				✓						
Town of Green Lake Assessor				✓	✓	✓						
Town of Green Lake Clerk	✓	✓	✓	✓	✓	✓						
Town of Mackford Assessor				✓	✓							
Town of Mackford Chairman		✓		✓	✓	✓						
Town of Mackford Clerk		✓		✓	✓	✓						
Town of Manchester Assessor						✓						

# Political & Administrative Boundaries

	Congressional District	Election District	Fire District	Police Jurisdiction	School District	Township Boundary							
Town of Manchester Clerk	✓	✓		✓	✓								
Town of Marquette Chairman	✓	✓		✓	✓								
Town of Princeton Clerk	✓	✓	✓	✓	✓								
Town of St. Marie Clerk				✓									
TOTALS	3	6	8	2	12	12							43



## Political & Administrative Boundaries

	Congressional District	Election District	Fire District	Police Jurisdiction	School District	Township Boundary
City of Berlin Clerk	✓	✓	✓	✓		
City of Markesan Clerk	✓					
Village of Kingston Assessor				✓		
TOTALS	1	2	1	1	1	7

# Road and Street Information

	Addresses	Centerlines	DOT Classification	Road Names	Official Road Maps	Right-Of-Ways						
Town of Berlin Chairman	✓	✓	✓	✓	✓	✓						
Town of Brooklyn Chairman	✓		✓	✓								
Town of Green Lake Clerk	✓		✓	✓								
Town of Mackford Chairman	✓	✓	✓	✓	✓	✓						
Town of Mackford Clerk	✓	✓	✓	✓	✓	✓						
Town of Manchester Assessor	✓		✓		✓	✓						
Town of Manchester Clerk			✓	✓	✓	✓						
Town of Marquette Chairman	✓		✓		✓	✓						
Town of Princeton Clerk	✓	✓	✓	✓	✓	✓						
TOTALS	8	4	4	9	7	7						39



[illegible]

	Groundwater Information	Floodplains	Lakes and Rivers	Watersheds	Wetlands								
Town of Berlin Assessor		✓	✓										
Town of Berlin Chairman	✓												
Town of Brooklyn Assessor		✓	✓										
Town of Green Lake Assessor		✓	✓										
Town of Mackford Chairman		✓	✓						✓				
Town of Mackford Clerk		✓	✓						✓				



	Groundwater Information						Floodplains		Lakes and Rivers		Watersheds		Wetlands								25
Town of Manchester Assessor																					
Town of Marquette Chairman																					
Town of Princeton Clerk																					
TOTALS	2	8	8	8	2	5															

TOTALS



[illegible]

[illegible]



## Appendix D

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Summary of Green Lake County  
Agencies Responding to  
Activities and Interest Survey

# Gas, Electric and Telephone Utility Information

	Gas Mains	Pipelines	Easements	Electric Lines	Telephone Lines							
Clerk of Courts			✓	✓								
Highway Department	✓		✓									
Land Conservation	✓	✓		✓								
Register of Deeds	✓	✓	✓	✓								
TOTALS	3	2	1	3	3							12



[illegible]

# Land Survey Information

[illegible]



## Land Use and Characteristics

County Surveyor	Geology	Historic Sites	Land Use/Cover	Landfills	Parks & Open Spaces	Soil Surveys	Topography	Underground Tanks	Vacant Lands	Well Locations	Zoning
Green Lake Sanitary District	✓				✓	✓			✓	✓	✓
Land Conservation	✓	✓			✓	✓	✓	✓	✓	✓	✓
Land Description		✓									
Zoning					✓					✓	✓
TOTALS	2	1	2		3	3	1	1	2	3	18

# Miscellaneous Categories

	Cable TV Lines	Census Information	Railroad Tracks and Lines	Sanitary District	Sanitary System	Building Permits	Condo Plats			
Clerk of Courts	✓									
County Clerk	✓									
Green Lake Sanitary District	✓		✓							
Land Conservation	✓									
Land Description			✓							
Register of Deeds						✓				
Zoning				✓	✓					
TOTALS	1	3	2	1	1	1				9



# Parcel Information

	Assessed Value	Grantor/Grantee	Legal Description	Legal Ownership	Parcel Boundaries	Parcel ID (PIN)	Plat Maps	Subdivision Plats	Tax Jurisdiction	Tax Status
County Clerk.		✓								
County Surveyor	✓	✓	✓	✓	✓	✓	✓	✓		
County Treasurer	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Green Lake Sanitary District	✓	✓	✓			✓	✓			
Land Conservation	✓	✓	✓	✓	✓	✓			✓	✓
Land Description	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Register of Deeds		✓	✓			✓	✓			
Zoning		✓	✓	✓	✓	✓	✓			
TOTALS	4	4	7	5	5	7	6	2	3	51

	Congressional District	Election District	Fire District	Police Jurisdiction	School District	Township Boundary						
Clerk of Courts	✓		✓		✓							
County Clerk	✓	✓										
County Surveyor					✓							
County Treasurer				✓	✓							
Green Lake Sanitary District					✓							
Land Conservation					✓							
Land Description				✓	✓							
Register of Deeds					✓							
<b>TOTALS</b>	<b>2</b>	<b>1</b>	<b>1</b>	<b>1</b>	<b>7</b>	<b>13</b>						



# Road and Street Information

	Addresses	Centerlines	DOT Classification	Road Names	Official Road Maps	Right-Of-Ways						
Clerk of Courts	✓	✓	✓	✓	✓							
County Surveyor		✓		✓	✓							
County Treasurer	✓											
Green Lake Sanitary District	✓											
Highway Department		✓	✓	✓	✓							
Land Conservation	✓			✓								
Land Description	✓	✓		✓	✓							
Register of Deeds	✓		✓									
Zoning	✓											
TOTALS	7	3	2	4	5	4						25

TOTALS



# Appendix E

## Activities and Interest Contact List

# Contact List

## Interest and Activity Survey

### State Agencies

Soil Conservation Service  
Ken Lubich, State Soil Scientist  
(608) 264-5589

Wisconsin Department of Natural Resources (DNR)  
Brad Duncan, Project Leader  
(608) 267-2415

Wisconsin Department of Transportation (DOT)  
Barbara Jenkin, Geographic Data Editor  
(608) 267-1228

Wisconsin Geological and Natural History Survey (WGNHS)  
(608) 262-1705

### Green Lake County Government

#### TOWN OF BERLIN

Robert Bohn, Chairman  
N7702 County F  
Berlin, WI 54923  
(414)361-3702

Bonnie Kline, Clerk  
N8702 Landing Road  
Berlin, WI 54923  
(414)361-0320

Elizabeth Rowley, Assessor  
N6277 Depot Road  
Green Lake, WI 54941  
(414)294-3309

#### TOWN OF BROOKLYN

Walter Wagner, Chairman  
W1195 Lillian  
Green Lake, WI 54941  
(414)294-3132

Carolyn King, Clerk  
N6008 Heritage Drive  
Green Lake, WI 54941  
(414)294-6981

Elizabeth Rowley, Assessor  
N6277 Depot Road  
Green Lake, WI 54941  
(414)294-3309

#### TOWN OF GREEN LAKE

James W. Fox, Chairman  
Rt. 3  
Markesan, WI 53946  
(414)398-2729

Lorraine Kimble, Clerk  
Rt. 1  
Markesan, WI 53946  
(414)398-2479

Elizabeth Rowley, Assessor  
N6277 Depot Road  
Green Lake, WI 54941  
(414)294-3842

#### TOWN OF KINGSTON

Alfred Graff, Chairman  
Rt. 1 Box 21  
Dalton, WI 53926  
(414)394-3188

Edward Brekke, Clerk  
Box 56  
Dalton, WI 53926  
(414)394-3755

Leland Rataczak, Assessor  
Rt. 1  
Princeton, WI 54946  
(414)295-3302



## TOWN OF MACKFORD

Orville Biesenthal, Chairman  
Rt. 2 Box 561  
Markesan, WI 53946  
(414)398-2968

Delores Van Doren, Clerk  
Rt. 1 Box 289  
Markesan, WI 53946  
(414)398-2650

Sandra James, Assessor  
Rt. 1 Box 221  
Markesan, WI 53946  
(414)398-2693

## TOWN OF MANCHESTER

Wallace Williams, Chairman  
Rt. 2  
Randolph, WI 53956  
(414)398-3764

Douglas Drager, Clerk  
Rt. 2  
Markesan, WI 53946  
(414)398-2465

David Severson, Assessor  
Rt. 2  
Markesan, WI 53946  
(414)398-32369

## TOWN OF MARQUETTE

David Jahnke, Chairman  
Rt. 3  
Markesan, WI 53946  
(414)398-3156

Jean Golz, Clerk  
Rt. 3 Box 620  
Markesan, WI 53946  
(414)398-2708

Leland Rataczak, Assessor  
Rt. 1 Box 249  
Princeton, WI 54968  
(414)295-3302

## TOWN OF PRINCETON

Raymond Salbego, Chairman  
Rt. 1 Box 144  
Princeton, WI 54968  
(414)295-3687

Nancy Greget, Clerk  
Rt. 1 Box 347C  
Princeton, WI 54968  
(414)295-3316

Leland Rataczak, Assessor  
Rt. 1 Box 249  
Princeton, WI 54968  
(414)295-3302

## TOWN OF ST. MARIE

Bruce Prellwitz, Chairman  
Rt. 1  
Green Lake, WI 54941  
(414)294-3109

Joan Beck, Clerk  
Rt. 1 Box 387  
Princeton, WI 54968  
(414)294-6493

Leland Rataczak, Assessor  
Rt. 1 Box 249  
Princeton, WI 54968  
(414)295-3302

## TOWN OF SENECA

Florian Lrueger, Chairman  
Rt. 3  
Berlin, WI 54923  
(414)361-3115

Diane Franke, Clerk  
Rt. 3  
Berlin, WI 54923  
(414)361-0498

Marion Krause, Assessor  
Rt. 3  
Berlin, WI 54923  
(414)361-0419

## CITY OF BERLIN

Gordon Schwark, Mayor  
108 N. Capron  
Berlin, WI 54923  
(414)361-0800

Louise Sedarski, Clerk/Treasurer  
Mary Newbary, Zoning/Building Office  
(same as Mayor)

## CITY OF GREEN LAKE

James L. Roberts, Jr., Mayor  
604 DeMoss Rd.  
Green Lake, WI 54941  
(414)294-6912

Barbara Dugenske, Clerk/Treasurer  
534 Mill St.  
Green Lake, WI 54941  
(414)294-6912

Jerrell Abendroth, Assessor  
Markesan, WI 53946  
(414)398-3520

## CITY OF MARKESAN

Joan Ballweg, Mayor  
77 W. John St.  
Markesan, WI 53946  
(414)398-3031

Elizabeth Stoll,  
Clerk/Treasurer  
(same as Mayor)

Jerrell Abendroth, Assessor  
Markesan, WI 53946  
(414)398-3520

## CITY OF PRINCETON

James L. Hallett, Mayor  
428 W. Water St.  
Princeton, WI 54968  
(414)295-6612

Donna Scheuers, Clerk  
Lois Jankowski, Treasurer  
(same as Mayor)

Leland Rataczak, Assessor  
Rt. 1 Box 249  
Princeton, WI 54968  
(414)295-3302

## VILLAGE OF KINGSTON

Larry Jenkins, President  
331 Main St.  
Kingston, WI 53939  
(414)394-3127

Lenora Glover,  
Clerk/Treasurer  
230 Gilbertson  
Kingston, WI 53939  
(414)394-9393

David Pryse, Assessor  
Box 486  
Pardeeville, WI 53954  
(608)429-2525

## VILLAGE OF MARQUETTE

Byron Winchell, President  
Marquette, WI 53947  
(414)394-3263

Mildred Winchell, Clerk  
(same as President)

Leland Rataczak, Assessor  
Rt. 1 Box 249  
Princeton, WI 54968  
(414)295-3302

## County Agencies

## Clerk of Courts

Betty Hoffman  
492 Hill St.  
Green Lake WI 54941  
(414)294-4142

## Green Lake Area Chamber of Commerce

Carla Mattke  
P.O. Box 386  
Green Lake, WI 54941  
(414)294-3231

## County Clerk Office

Rebecca Keipe  
492 Hill St.  
Green Lake, WI 54941  
(414)294-4008

## Green Lake Association

Ray Nickols  
509 South Street  
Green Lake, WI 54941  
(414)294-6480

## County Surveyor

Sam Mullen  
492 Hill St.  
Green Lake, WI 54941  
(414)294-4030

## Green Lake Sanitary District

Ron Edwards  
P.O. Box 417  
Green Lake, WI 54941  
(414)294-3261

## County Treasurer

Kathlene Morris  
492 Hill St.  
Green Lake, WI 54941  
(414)294-6207

## Highway Department

Timothy Mashuda  
570 South Street  
Green Lake, WI 54941  
(414)294-4062



Land Conservation  
James Hebbe  
492 Hill St.  
Green Lake, WI 54941  
(414)294-4051

Register of Deeds  
Shirley Williams  
492 Hill St.  
Green lake, Wi 54941  
(414)294-4021

Land Description  
Nancy Greget  
492 Hill St.  
Green Lake, WI 54941  
(414)294-4015

Zoning/Sanitation Office  
James Jajewski  
492 Hill St.  
Green Lake, WI 54941  
(414)294-4027

Little Green Lake Protection & Rehabilitation District  
Joyce Harttert  
P.O. Box 212  
Markesan, WI 53946  
(414)398-3557

## Other Interested Parties

Board of Realtors  
Julie Berger  
118 Doty  
Ripon, WI 54971  
(414)748-6683

GTE  
100 Communications Dr.  
Sun Praire, WI 53590  
1-800-826-4700

Central Engineers & Architects  
Ron Condon  
910 Grave St.  
Beaver Bam, WI  
(414)887-3127

Marcus Cable  
P.O. Box 457  
Wautoma, WI 54982  
1-800-242-0023

Gary Schindler Surveying  
103 West Main St.  
Wautoma, WI  
(414)787-4110

Mid State Associates  
Fred Zietlow  
1230 South Boulevard  
Baraboo, WI 53913  
(608)356-8344

Green Lake Surveying Co.  
Sam Mullen  
P.O. Box 131  
Green Lake, WI 54941  
(414)294-6666

Mid State Abstract  
Jim Hansen  
503 Mill St.  
Green Lake, WI 54941  
(414)292-6056

Green Lake Title & Abstract  
Mike Bierman  
Pam Rominski  
535 Mill St.  
Green Lake, WI 54941  
(414)294-6070

North-West Telephone  
Jack Gamble  
19 W. Fond du Lac  
Ripon, WI 54971  
(608)372-8425

Grothman & Associates  
Cliff Curry  
412 E. Slifer St.  
Portage, WI  
(608)742-7788

Ripon Land Surveying  
Sam Mullen  
W764 Brooklyn J Rd.  
Ripon, WI 54971  
(414)748-9696

Smart Surveyors  
Jerol Smart  
107 W. Main St.  
Montello, WI  
(608)297-2688

Welch Land Surveying  
Bob Welch  
Rt.1 Hwy. 21  
Redgranite, WI  
(414)566-4655

Wisconsin Bell Telephone  
722 N. Broadway  
Milwaukee, WI 53202  
1-800-924-3368

Wisconsin Gas  
Robert Berrendt  
Hardy Mehsner  
1175 N. Margaret St.  
Markesan, WI 53946  
(414)291-6716

Wisconsin Power & Light  
Darrell Zarr  
112 Watson St.  
Ripon, WI 54971  
(414)929-6733

## Historical Societies

Berlin Historical Society  
John Lahlers  
430 Broadway  
Berlin, WI 54923

Dartford Historical Society  
Lawrence Behle  
491 Canal  
Green Lake, WI 54941

Markesan Historical Society  
Gilman Ness  
Box 264  
Markesan, WI 53946

Princeton Historical Society  
Lucille Krueger  
418 N. Fulton  
Princeton, WI 54968



## Public Schools

Berlin School District  
265 E. Huron St.  
Berlin, WI 54923

Cambria-Freisland Schools  
410 E. Edgewater  
Cambria, WI 53923

Green Lake School District  
Phil Baranowski  
612 Mill St.  
Green Lake, WI 54941  
(414)294-6441

Markesan School District  
100 Vista Blvd.  
Markesan, WI 53946

Montello Public Schools  
Schmidt St.  
Montello, WI 53949

Moraine Park Technical Inst.  
235 N. National Avenue  
Fond du Lac, WI 54935

Princeton School District  
Marvin Groskreutz  
Princeton, WI 54968  
(414)295-6571

Ripon Public Schools  
Marty Valasek  
651 Metomen Street  
Ripon, WI 54971  
(414)748-5151

## Private Schools

Berlin Catholic School  
Jeanne Pischke  
315 SW Ceresco St.  
Berlin, WI 54923  
(414)361-1781

Faith Luthern Church School  
Walker Ave.  
Green Lake, WI 54941

Jubilee Fellowship School  
325 Sunnyview Lane  
Princeton, WI 54968

Peace Luthern School  
Walker Ave.  
Green Lake, WI 54941

St. John's Catholic  
125 Church Street  
Princeton, WI 54968

St. John's Luthern School  
Curt Snow  
146 Mount St.  
Berlin, WI 54923  
(414)361-0555

St. John's Luthern School  
227 Harvard St.  
Princeton, WI 54968

# Appendix F

Federal, State and Regional  
Land Records Information



Agency	Information Available	Format	Cost to Purchase
U.S. Census	<p>A. GBF (Geographic Base Files) DIME Files TIGER Files Topological encoded census block information.</p> <p>B. Statistical Data --Agriculture --Population --Housing --Manufacturing --Transportation</p>		\$100 - \$200 on CD-Rom
United States Geological Survey (USGS)	<p>A. Digital Elevation Models (DEM) 3-Dimensional topographic data 1:250,000 (adjusted planimetrically) 1:24,000 (non-adjusted)</p> <p>B. Digital Line Graphs (DLG) 1:2,000,000 1:100,000 Political Boundaries Roads Railroads Streams Water Bodies Cultural Features</p>	<p>Raster - based or ASCII format</p> <p>Arc/Vector based (.DXF conversion needed.)</p>	<p>\$50.00 per quadrangle</p> <p>\$500</p>
EOSAT SPOT Corporation	Landsat and SPOT Imagery Available for any day of the year.	Raster - based	\$1,000's





Agency	Information Available	Scale	Format
Soil Conservation Service (SCS)	No digital Information available for Green Lake County at this time.		
Wisconsin Geological and Natural History Survey (WGNHS)	No digital Information available for Green Lake County at this time.		

# Appendix G

## Private Sector Land Records Information



Company	System	Software	Information	Available To County?
Marcus Cable			No digital mapping Information or system in use at this time.	
Wisconsin Power & Light	CAD	AutoCAD	Conducting Pilot Studies at this time.	No
Wisconsin Gas	IBM GPG		Roads, Buildings, Cadastral Information Digitized from air photos.	Yes \$
GTE			No digital mapping Information or system in use at this time. Working on projects with Rock and Fond du Lac Counties.	
North-West Telephone	CAD	AutoCAD	Ripon/Green Lake service areas have not been converted into digital system at this time.	maybe
Wisconsin Bell Telephone	Intergraph	AM/FM	Lines, Poles, Junction Points Road Network Customer Information	No

\$ - Indicates user will be charged for information.

Company	System	Software	Information	Available To County?
Central Engineers & Architects	CAD	AutoCAD	Various project information.	Yes \$
Gary Schindler Surveying			Not using any type of automated system at this time.	
Green Lake Surveying Co. Ripon Land Surveying	CAD	Carlson	Various project information.	Yes \$
Grothman & Associates	CAD	AutoCAD	Various project information.	Yes \$
Mid State Associates	CAD	AutoCAD	Various project information.	Yes \$
Welch Land Surveying	CAD	AutoCAD	Various project information.	Yes \$

\$ - indicates user will be charged for information.



# Appendix H

Green Lake County  
PIN System



# Green Lake County PIN System

The current PIN system has been in place for a number of years and relies heavily on the local knowledge of office personnel.

Each parcel number consists of 12 digits (000-0000-00-000).

The first three digits of the PIN indicates the Town, City or Village of the parcel. For example:

002: Town of Berlin	206: City of Berlin
004: Town of Brooklyn	231: City of Green Lake
006: Town of Green Lake	251: City of Marquette
008: Town of Kingston	271: City of Princeton
010: Town of Mackford	
012: Town of Manchester	141: Village of Kingston
014: Town of Marquette	154: Village of Marquette
016: Town of Princeton	
018: Town of St. Marie	
020: Town of Seneca	

Consecutive numbers are based on the following criteria:

Towns start in the NE quarter of Section 1 and number from 1. Divisions of that parcel are indicated as 1.1, 1.2, 1.3, etc.

Cities start numbering with 1 on the original plat.

Villages are using a numbering system that is unique and distinctive to their individual offices.

Because of the essentially non-systematic numbering system found within each town, the County Treasurer and Land Description Offices always have to consult additional records (i.e. other parcel documentation) for the names of owner and neighbors to pinpoint the exact location of a parcel.

Obviously, the current PIN needs to be revised for use in the County GIS and a new system is under development. This new system of "parcel address" could also be incorporated into the 911 Emergency Dispatch System.

# Parcel Identification Numbering System Under Consideration

A-57

**230204240826110000068**

**Required**

**Optional**

23 006 4 24 08 26 1 1 000 0068

23 County Code    006 Municipality Code    4 E/W Principal Meridian    24 Township Number    08 Range Number    26 Section Number    1 Quarter Section    1 Quarter-Quarter\*    000 Metes & Bounds (unplatted)    0068 Parcel Number

**230064240826000040005**

0 0 004 0005

0 0 004 0005  
Unknown Denotes Government Lot Parcel Number  
or Government Number  
Other Lot

**230064240826090660014**

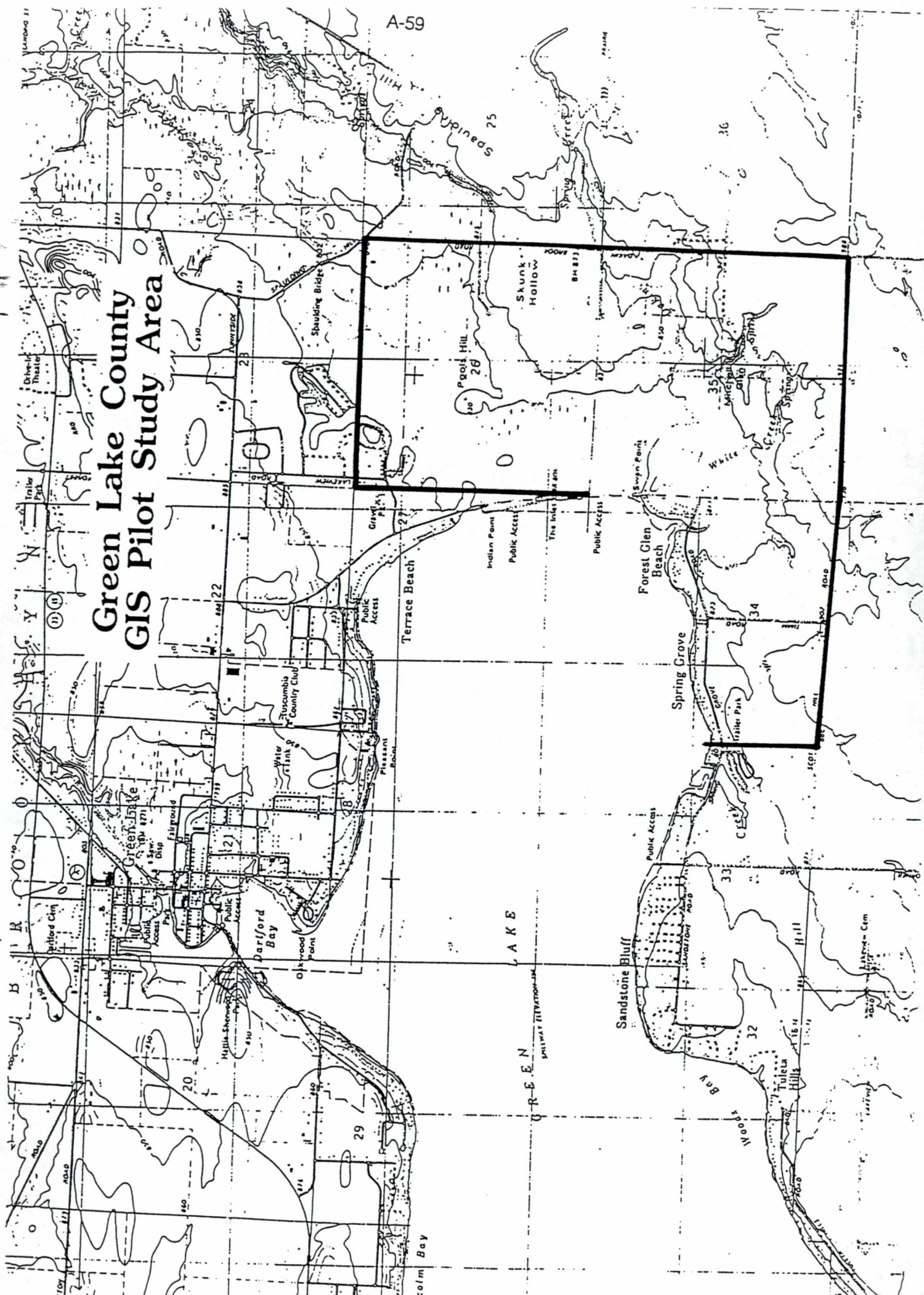
0 9 066 0014

0 9 066 0014  
Unknown Denotes Subdivision Block Number  
or Platted Number  
Other Subdivision Block & Lot Number

# Appendix I

GIS Pilot Study Area





# Appendix J

## Glossary

GLOSSARY

AM/FM	Automated Mapping/Facility Management.
AutoCAD	Automated Computer Aided Drafting. A CAD program developed by Autodesk, Inc.
CAD	Computer Aided Drafting.
Cadastral	Mapping or recording of legally defined pieces of land for the purpose of recording ownership. A cadastral map, or parcel map, was traditionally used for tax collection.
CD-ROM	Compact Disc with Read Only Memory A large amount of digital data can be stored on a compact disc. This data can only be viewed or read, not changed.
COGO	Coordinate Geometry.
DEM	Digital Elevation Model.
DIME	Dual Independent Map Encoding A geocoding system developed by the U.S. Census that describes blocks used for enumeration and reporting and the boundaries (streets) for these blocks as a network of points, lines and areas.
DLG	Digital Line Graph.
DNR	Department of Natural Resources.
DOR	Department of Revenue.
DOT	Department of Transportation.
Easement	A limited right to land owned by someone else.
EOSAT	Earth Observation Satellite Company. Sells information obtained from the LANDSAT remote sensing satellites.
Geodetic Reference System	A series of permanent control points that are located with coordinates that have been established with respect to the national system of geodetic control points.



GIS	Geographic Information System. A system that allows the user to automate, manipulate, analyze and display geographic data from digital form.
GPS	Global Positioning System.
LIS	Land Information System. A system of filing, storing and managing land records.
Monumentation	Permanent markers placed at geodetic control points.
NAD27	North American Datum of 1927.
NAD83	North American Datum of 1983.
NAVD88	North American Vertical Datum of 1988.
NGVD29	National Geodetic Vertical Datum of 1929.
Parcel	A plot of land.
pcARC/INFO	GIS software developed by ESRI of California.
PIN	Parcel Identification Number.
Plat Book	Ownership maps drawn to scale to show land boundaries and parcel divisions.
PLSS	Public Land Survey System.
Remote Sensing	The measurement or acquisition of information by a recording device not in physical contact with the object under study.
SCS	Soil Conservation Service.
SPC	State Plane Coordinate. Geographic coordinates that locate a point on the Earth's surface with reference to a grid on a mathematical reference surface that represents "Sea Level" in that State.
SPOT	French-owned remote sensing satellite. The SPOT Corp. sells information gathered their satellite.

TIGER	Topologically Integrated Geographic Encoding and Referencing System. A geocoding system developed by the U.S. Census.
USDA	United States Department of Agriculture.
USGS	United States Geological Survey.
UTM	Universal Transverse Mercator.

