2043 LUXEMBURG
SEWER SERVICE AREA PLAN

Village of Luxemburg
Sewer Service Area Plan 2043

BAY LAKE
Regional Planning Commission | Since 1972

Prepared by the
Bay-Lake Regional Planning Commission in cooperation with
the Village of Luxemburg and the State of Wisconsin Department of Natural Resources

Recommended for WDNR review by the Village of Luxemburg
Sewer Service Area Plan Technical Advisory Committee on:
March 14, 2023

Approved by WDNR on:
[date]

Technical Advisory Committee Members

Jack Seidl - Village President

Dan Rueckl - Village Trustee

Kathy Garfinkel - Public Works Department

Bob Romuald - Public Works Department

Davina Bonness - Kewaunee County

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Village Resolution of Adoption

RESOLUTION NO. 12-2023A

VILLAGE OF LUXEMBURG BOARD ADOPTION OF THE *VILLAGE OF LUXEMBURG SEWER SERVICE AREA PLAN 2043*

WHEREAS, a Sewer Service Area Plan was adopted in 2000 for the Village of Luxemburg, as required by the Federal Clean Water Act and Wisconsin State Administrative Code NR 121 which establishes rules and regulations for Areawide Water Quality Management Plans and sewer service area (SSA) planning;

AND WHEREAS, the *Village of Luxemburg Sewer Service Area Plan 2043 is* a formal element of Wisconsin's Areawide Water Quality Management Plan and serves as the basis for state and federal permit approvals and grant funding for planning, construction, and extension of wastewater treatment and sewage facilities and infrastructure;

AND WHEREAS, this Sewer Service Area Plan was prepared by the Bay-Lake Regional Planning Commission as directed by the Village of Luxemburg Sewer Service Area Plan Technical Advisory Committee (TAC);

AND WHEREAS, this Sewer Service Area Plan was thoroughly reviewed by the Village of Luxemburg TAC to ensure the document incorporates the needs of the Village and will serve to guide the Village of Luxemburg in recommending or making future land use and water quality management decisions;

AND WHEREAS, this Sewer Service Area Plan was thoroughly reviewed by the Wisconsin Department of Natural Resources to ensure to ensure that it is compliant with state water quality programs;

NOW, THEREFORE BE IT RESOLVED the Village of Luxemburg Board hereby adopts the *Village of Luxemburg Sewer Service Area Plan 2043* and recommends Wisconsin Department of Natural Resources certification of the plan update.

Adopted this 12th day of December, 2023.

APPROVED:

Dan Porath, Village President

ATTEST:

MiLissa Stipe, Clerk Treasurer

Page reserved for WDNR Approval Letter

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Background

The Clean Water Act sets the structure for regulating discharges of pollutants into waters of the United States and for states to create water quality management programs, with major goals of these programs being to make the nations waters "fishable and swimmable." These goals are achieved through comprehensive water quality planning, municipal wastewater facilities, and a discharge permitting program.

Wisconsin state statutes s. 281 (Water and Sewage) and s. 283 (Pollutant Discharge Elimination) give the Wisconsin Department of Natural Resources (WDNR) authority to supervise and control over the waters in the state and to plan, manage, and regulate policies and programs necessary for the purpose of the state statutes.

Wisconsin Administrative Code NR 121 establishes rules and regulations for Areawide Water Quality Management Plans and sewer service area (SSA) planning. Both Wisconsin Administrative Codes NR 121 and NR 110 require permits to be obtained for wastewater treatment facilities, facility plans, interceptors and sewer extensions, all of which must be in conformance with the Areawide Water Quality Management Plan.

The WDNR is responsible for working with planning commissions, county governments, municipalities, towns, and the public to develop sewer service area (SSA) plans that guide publicly sewered growth and protect water quality.

Purpose

The purpose of the plan is to provide a policy framework and set of guidelines to enforce the federal, state, and local water quality programs.

SSA plans are created to identify future areas of growth that could support cost-effective sewer extensions and facilities without negatively impacting the environment and water quality. These plans also identify best management practices needed to protect groundwater and surface water from adverse impacts of urbanization, including non-point source pollution.

This plan also serves as a basis for the WDNR to approve of state and federal grants for the planning and construction of wastewater treatment and sewage facilities, for WDNR approval of locally proposed sanitary sewer extensions, and Department of Safety and Professional Services (WDSPS) approval of private sewer laterals.

The 2043 Village of Luxemburg Sewer Service Area Plan serves the following purposes:

1. Establish the geographic extent of the sewer service area to the year 2043.
2. Identify environmentally sensitive areas for protection from development.
3. Identify where future growth will be located and project future land use needs using population, housing, and economic projections.
4. Provide information on current sewerage system capacities and identify future wastewater treatment and collection needs.
5. Define the procedures for reviewing boundary and plan amendments.
6. Serve as a guideline for government interaction and development of community plans.

Plan History

The initial Village of Luxemburg sewer service area plan was adopted in 2000. Since the adoption of the 2000 plan, approximately 20 acres of land have been added by amendments to the sewer service area boundary and a sanitary relocation/re-alignment for the Luxemburg-Casco High School. Amendments were made in 2021 for the following:

- Addition of approximately 1.49 acres of land (proposed to be primarily residential development)
- Addition of approximately 18.44 acres of land (proposed to be commercial and heavy industrial development, along with street right-of-way)

This plan updates and supersedes the 2000 Village of Luxemburg Sewer Service Area Plan.

Planning Process

To update the Village of Luxemburg SSA Plan, the village formed a Technical Advisory Committee (TAC) to guide the planning process, review draft material and chapters, and give a final recommendation of the plan to the WDNR. The TAC is made up of four representatives from the village, one from the Town of Luxemburg, and one from Kewaunee County.

The delineation of the sewer service area boundary utilized the following criteria:

1. Environmentally sensitive areas
2. Local water quality issues
3. Existing sewer systems, service areas, and engineering constraints
4. Projected housing, population, and economic growth
5. Land use patterns
6. Local comprehensive and strategic plans

TAC meetings were open for the public and agendas were posted prior to each meeting. Please see Appendix A for meeting agendas. An open house and public hearing were held on March 14, 2023 to provide the public an opportunity to review the document and provide comments. In addition to the TAC members and village board, one village resident attended the open house. There were no attendees at the public hearing and no comments were made. Appendix B includes sign in sheets for the open house and public hearing, as well as minutes for the public hearing. After the public hearing, the TAC made a recommendation of the plan to the WDNR for review. Following the recommendation, the Bay-Lake RPC submitted the plan to the WDNR for review on March 15, 2023. The WDNR reviewed which then went to the Village Board for adoption. The Village Board adopted the plan on December 12, 2023. The WDNR approved the plan on month, day year.

SSA plans should be reviewed every five to ten years to verify that the plan is still up to date with sewage and wastewater needs of the community. If the plan is determined to need an update, the same planning process will need to be undertaken, or amendments to the plan can be undertaken. Plan updates and amendments are discussed further in Chapter 7 of the plan.

Planning Area

The Village of Luxemburg is located in the northeast section of Kewaunee County, and its incorporated area is roughly 1,606 acres. The village is completely encircled by the Town of Luxemburg, but other nearby municipalities include the Village of Casco and the City of Kewaunee, which is located downstream from the village. In the delineation of the planning area, certain criteria were set which include:

- Areas which potentially could be provided public sewer service.
- The recognition of extraterritorial powers for zoning, subdivision review and official mapping.
- Areawide land use trends and patterns.
- Water quality problems are areawide concerns.
- Location of existing sanitary districts.

Ultimately, a 0.75 mile setback from the village's municipal boundary was determined as the planning area in order to incorporate these criteria.

The Village of Luxemburg is the only Designated Management Agency within the SSA. All infrastructure from the Village to the waste water treatment plant is owned by the Village of Luxemburg. Piping to NEW Water is owned by NEW Water, but the Village "rents" capacity in the pipes.

The planning area is shown on Map 1.

Map 1: Planning Area

Village of Luxemburg Sewer Service Area Plan 2043

- Municipal Boundary
- Planning Area (.75 mile setback from Village)
- 2043 SSA Boundary

0 0.25 0.5 Miles

Sources: NAIP Imagery, 2020; Kewaunee County, 2019, 2022; Bay-Lake RPC, 2023.

Disclaimer: This map is neither a legally recorded map nor a survey and is not intended to be used as one. This drawing is a compilation of records, information, and data used for reference purposes only. Bay-Lake RPC is not responsible for any inaccuracies herein contained.

Chapter 2: Goals and Objectives

An early task in any planning process is to establish the goals and objectives that will provide the direction and a framework for the development of policies which lead to final plan implementation. The goals are a statement of direction, while the objectives consist of measurable results that determine if the goals are being attained. Policy statements are guidelines for action that achieve the goals and objectives.

The diversity of local community interest requires that common concepts be established for the sewer service area plan. Establishing common concepts, such as goals, objectives, and policies, provides a framework for cooperative planning efforts in other areas of inter-community interest such as transportation, recreation, and economic development. These goals, objectives, and policies are based off region-wide goals, objectives, and policies that BLRPC uses as a guide to ensure consistency in its planning efforts on a local and regional scale.

Goal 1:

Plan in an orderly manner so public services are cost effective and efficient.

Objective 1:

New development patterns should be contiguous and compact with other surrounding urban land uses.

Policies:

1. Encourage infill development and redevelopment.
2. Compact and contiguous developments should be prioritized over sprawling developments.
3. Continue to plan for all types of residential densities, low to high densities.
4. Sewer service extensions are prohibited beyond the 20-year sewer service boundary without plan amendment.
5. Sewer service extensions should be adequately sized to handle projected sewage and water volumes.

Objective 2:

Utilize the comprehensive plan and other planning documents when reviewing the *Sewer Service Area Plan* and amending the boundary.

Policies:

1. Utilize the Village's Zoning Ordinance, future land use map, and sewer service area boundary as a tool for reviewing and guiding development.

Objective 3:

Review and update the *Sewer Service Area Plan* as needed every five to ten years.

Policies:

1. As new demographic and economic data becomes available, update the plan so decision markers have up-to-date information.
2. Update each section as needed.

Objective 4:
Be aware of rural development.

Policies:

1. Work with the Town of Luxemburg on future developments and annexations.
2. Rural development should take place adjacent to existing development to prevent urban sprawl.
3. Future residential development should be directed to existing platted subdivisions.
4. Commercial and industrial development should be clustered around existing development to prevent scattered or strip development.
5. Growth should promote contiguous and compact development.
6. SSA planning should not be used to promote nor hinder annexation.

Goal 2:
Protect water quality, natural resources, and environmentally sensitive areas.

Objective 1:
Restrict development from areas which would result in the degradation of water quality and environmentally sensitive areas.

Policies:

1. Sanitary sewer lines will not be extended into floodways or wetlands except to serve compatible recreation uses or existing development that is experiencing severe on-site sewage disposal problems.
2. Sewer extensions should not be approved in developments that negatively impact water quality and environmentally sensitive areas without proper mitigation or resolution.
3. Local land use plans and zoning ordinances should be maintained and revised as needed to protect water quality and environmentally sensitive areas.
4. Guide developments away from environmentally sensitive areas using local plans and zoning ordinances.
5. Sewer extensions into sensitive areas not included in the environmentally sensitive areas shall conform to applicable rules and regulations this includes the Wisconsin Administrative Code NR 116 for shoreland-floodplains, and should be reviewed on a case-by-case basis.
6. Developments are encouraged to plan with natural resources, especially regarding the surrounding forests.
7. Utilize the *Wellhead Protection Plan* and the *Wellhead Protection Ordinance* when making decisions regarding land uses near wellhead protection areas.
8. Development should be avoided in outdoor recreation and open space resource areas identified in Kewaunee County's *Outdoor Recreation Plan* and the Village of Luxemburg's *Comprehensive Plan*.

Objective 2:
Continue to work on connecting to the Green Bay water supply.

Objective 3:
Minimize health hazards associated with failing wastewater disposal systems and protect the quality of the water and land resources in the planning area.

Goal 3:
Minimize public sewage service costs.

Objective 1:
Plan service extensions.

Policies:

1. Avoid the duplication of facilities.
2. Continue to review the installation of public sewage systems in the planning area.

Objective 2:
Stage the installation of new or expanding facilities.

Policies:

1. Plan sewage extensions and treatment facilities so that they can be installed incrementally, as needed.
2. Avoid long extensions across undeveloped property.
3. In cases where sanitary sewer service is extended to an outlying developed area through an undeveloped area, laterals from that line shall not be extended to support unplanned development along that line which would foster urban sprawl.
4. Discourage the use of on-site sewage systems in areas planned to receive sanitary service during the life of the plan.
5. In the case that developments are permitted within the areas planned to receive sanitary service during the life of this plan, it should be designed so that the public costs of conversion to public sanitary sewer service are minimized. Except in the case of failing existing systems, new holding tanks should only be permitted in those areas where public sanitary sewer service is planned for construction within five years of the installation of the holding tank.

The purpose of this section is to discuss and analyze natural features, environmentally sensitive areas, land and water considerations, and land use. These factors are important to reduce the risk of expensive mistakes and to protect natural resources for future generations to enjoy.

Natural Features

Areas of unique natural features and environmental significance in the Luxemburg area have been identified by the WDNR, Kewaunee Land & Water Conservation Department, and Bay-Lake RPC. Many of these features are found in corridors that are located along rivers, creeks, shorelines, and natural drainage ways, and are essential to maintaining ecological value, and preserving the natural beauty of the area.

The delineation of sensitive environmental areas plays an important role in the sewer service planning process and assists in directing future urban development in order to protect these resources.

Water Resources

When discussing water resources, it is important to have a systems thinking approach as an impact in one place may have a larger impact downstream. The principal water resources within the Village of Luxemburg planning area is the Kewaunee River which flows southeasterly to Lake Michigan. The western portion of the village is drained by School Creek and the eastern portion by Luxemburg Creek. The Casco Creek-Kewaunee River HUC 12 code is 040301020304. The subwatersheds within the SSA are detailed in the watersheds section.

The Village of Luxemburg is served by a public water distribution system. The water supply for this system is from groundwater through four community wells. The village has a 250,000 gallon elevated storage tank. Water distribution mains generally lie in the same trench above the sewer mains throughout the village because of the expense of constructing utility trenches in bedrock. Water supply for the study area is also supplied from groundwater through private wells. The water quality from these wells is reported from Robert E. Lee & Associates as being generally good; however, the village is at capacity for the four wells, meaning that well contamination or village growth will create water supply problems for village residents. The village anticipates future connection to NEW Water, the brand of the Green Bay Metropolitan Sewerage District.

Watersheds

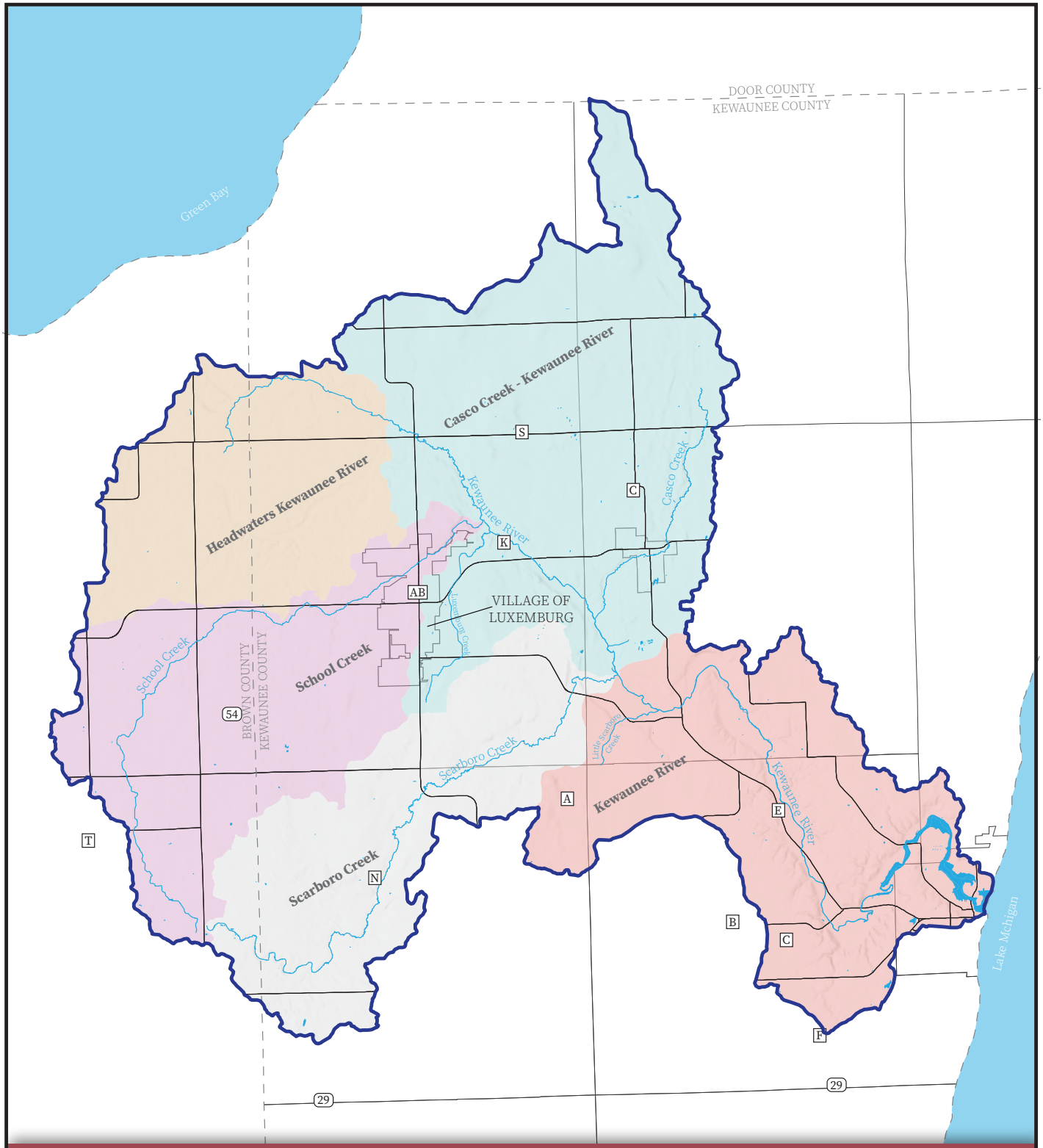
The Village of Luxemburg is entirely within the 91,000 acre Kewaunee River Watershed, which contains 295 miles of stream and rivers and 7,313 acres of wetlands, according to the WDNR. The primary land use in the watershed is agriculture. The Village of Luxemburg is mostly within the School Creek subwatershed (HUC 12 code 040301020302) of the Kewaunee River Watershed. School Creek drains a watershed area of 25 square miles and 14 miles long, but has only 5.6 miles of perennial flow. The creek has sporadic high flows and spring flooding, and water quality is generally low due to high water temperatures, low flows, and agricultural runoff. Portions of the planning area are also located in the Casco Creek - Kewaunee River subwatershed (HUC 12 code 040301020304), a small, clear, spring fed stream that flows 10 miles before flowing into the Kewaunee River. See the WDNR Kewaunee River Watershed 2011 Water Quality Management Plan Update for more information on watersheds in the planning area. See Map 2 for a map of watersheds in the planning area.

Water Quality and Impairments

The Kewaunee River Watershed was designated as a priority watershed in 1984 under the WDNR Wisconsin Non-point Source Water Pollution Abatement Program. In the planning area, School Creek and Luxemburg Creek are impaired due to high phosphorus levels. Sources for phosphorus include non-point pollution.

Non-point source pollution in the watershed comes from animal lot runoff, winter spread manure, cropland erosion, stream bank erosion, and roadside erosion. Practices needed to produce a basic level of control of non-point sources of pollutants throughout the planning area are the ordinances described in the Land Use Control section of this plan. In the Kewaunee River Watershed, groundwater aquifers, or water bearing rock units, are the major sources of water for agricultural and industrial use.

The objectives of the priority watershed plan are to: assess existing water quality problems, identify significant non-point sources of pollution and determine other pollution sources, identify water quality improvements



Map 2: Kewaunee River Watershed

Village of Luxemburg Sewer Service Area Plan 2043

- Major Road
- Major River/Stream
- Municipal Boundary
- County Boundary
- Kewaunee River Watershed Boundary

Subwatersheds

- Casco Creek - Kewaunee River
- Headwaters Kewaunee River
- Kewaunee River
- Scarboro Creek
- School Creek

0 1.5 3 Miles

Sources: WDNR, 2022; Kewaunee County, 2022; Bay-Lake RPC, 2023.

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and objectives that can be reasonably achieved through non-point source controls, and identify the priority management area and best management practices. The village can implement practices identified on page 12 of the *WDNR Kewaunee River Watershed 2011 Water Quality Management Plan Update*, such as minimizing agricultural runoff and increasing citizens' watershed awareness.

Site contamination is a potential area for point source pollution. The Bureau for Remediation and Redevelopment Tracking System tracks contaminated sites: all but one site in the Village of Luxemburg have been remediated and are closed. The open site is classified under the Environmental Remediation Program (ERP) which includes sites with contaminated soil and/or groundwater. Above and below ground storage tanks also represent potential point sources of pollution. The Department of Agriculture, Trade, and Consumer Protection maintains a database of all storage tanks. Currently in Luxemburg, there are 123 storage tanks in active use: none have been flagged for leaking. Other sources of pollution could be on-site septic systems. There are no known leaks in the five on-site systems in the village.

In 2023, the WDNR designated the Northeast Lakeshore TMDL to address surface water quality of tributaries, streams, rivers and lakes, the boundaries of which the planning area falls within.

Shorelands and Floodplains

Floodplains are defined as areas subject to inundation by the 100-year recurrence interval flood event. This area excludes the stream channel. This event has a one percent chance of occurring in any given year. The floodplains within the village planning area are adjacent to the Kewaunee River, School Creek, and Luxemburg Creek. Refer to Map 5: Environmentally Sensitive Areas for Floodplain locations.

Shorelands and floodplains are valuable recreational and environmental resources in both urbanized and rural areas. These areas provide for storm water retention, groundwater recharge, habitat for various types of wildlife unique to the area, and recreational opportunities. Development that is permitted to take place in these areas may have an adverse effect on water quality, wildlife habitat, and stormwater drainage. In addition, it may also result in increased development and maintenance costs when providing for protection from the occurrence of flooding and high water, increased flood insurance premiums, extensive site preparation, and maintenance and repairs of roads, sewers and water mains.

As a result, Section 87.30(1) of the Wisconsin Statutes and Wisconsin Administrative Code NR 116 requires counties, cities and villages to adopt floodplain zoning ordinances to address the problems associated with development in floodplain areas. Any development adjacent to or within a designated floodplain should be discouraged, if not strictly prohibited. Specific design techniques must be considered when developing in shoreland areas. The authority to enact and enforce these types of zoning provisions is set forth in Chapter 59.97 of the Wisconsin Statutes and Wisconsin Administrative Codes NR 115, 116, and 117 and is established in the Kewaunee County Shoreland Zoning Ordinance No. 104-1-69 and Kewaunee County Flood Plain Zoning Ordinance No. 118-7-80.

Kewaunee County is currently administering its Shoreland/Floodplain Ordinances in its unincorporated areas. The jurisdiction of the ordinance includes shoreland of navigable waters of the county which are 1,000 feet from the normal high water elevation of a lake, pond or flowage; and 300 feet from the normal high water elevation of a river or stream, or to the landward side of a 100 year floodplain boundary. The Village of Luxemburg has also adopted its Shoreland - Wetland Zoning Ordinances, in 1994, which is identical to the model ordinance adopted by Kewaunee County.

Wetlands

Wetlands are areas where water is at, near, or above the land surface long enough to be capable of supporting aquatic or hydrophilic vegetation. There are several different types of wetland ecosystems, including swamps, bogs, ferns, and marshes. Many of the wetlands are located adjacent to the identified surface water features.

Wetlands provide several ecosystem services, listed in ch. NR 103, Wis. Adm. Code, such as:

- Stormwater retention
- Groundwater recharge
- Pollution filtration
- Shoreline protection against erosion
- Habitat for many plants and animals
- Scenic open space
- Recreational, cultural, educational, and scientific uses

There are 701 acres of wetlands in the planning area and 100 acres in the SSA boundary. These acreages are estimated based on the Wisconsin Wetlands Inventory, which is based on aerial imagery. Additional wetlands may be present within the SSA and should be confirmed with field delineations prior to ground-disturbing activities.

Because of their importance, there are strict regulations regarding wetlands. Section 404 of the Clean Water Act established a federal permit program for discharges of dredge and filled material. The program does not allow wetlands to be filled without a permit and only if a practicable alternative does not exist that is less damaging to the aquatic environment or if the nation's waters would be significantly degraded. All wetlands in Wisconsin are also regulated by the WDNR under s. 281.36, Wis. Stats.

Activities in wetlands regulated under federal and/or state programs include fills for development, water resource projects (such as dams and levees), infrastructure development (such as highways and airports), and conversion of wetlands to uplands for farming and forestry.

When a permit is applied for in conjunction with any of the above activities, the applicant must show that they have:

1. Taken steps to avoid wetland impacts where practicable,
2. Minimized potential impacts to wetlands, and
3. Provided compensation for any remaining unavoidable impacts through activities to restore or create wetlands. The permit process is often accompanied by a field review of the site.

Topography

The topography of the village planning area varies from nearly level to gently rolling hills, following the patterns of the glacial geology. The elevation of the planning area is higher in the south at 850 feet in the south to southeast and drops in the north to northwest portion of the area to 761 feet. The topography of any area, as related to ground slope and natural drainage feature, determines the size and the location of sewers and the tributary area to a common collection point, as well as the need for the location of sewage lift stations.

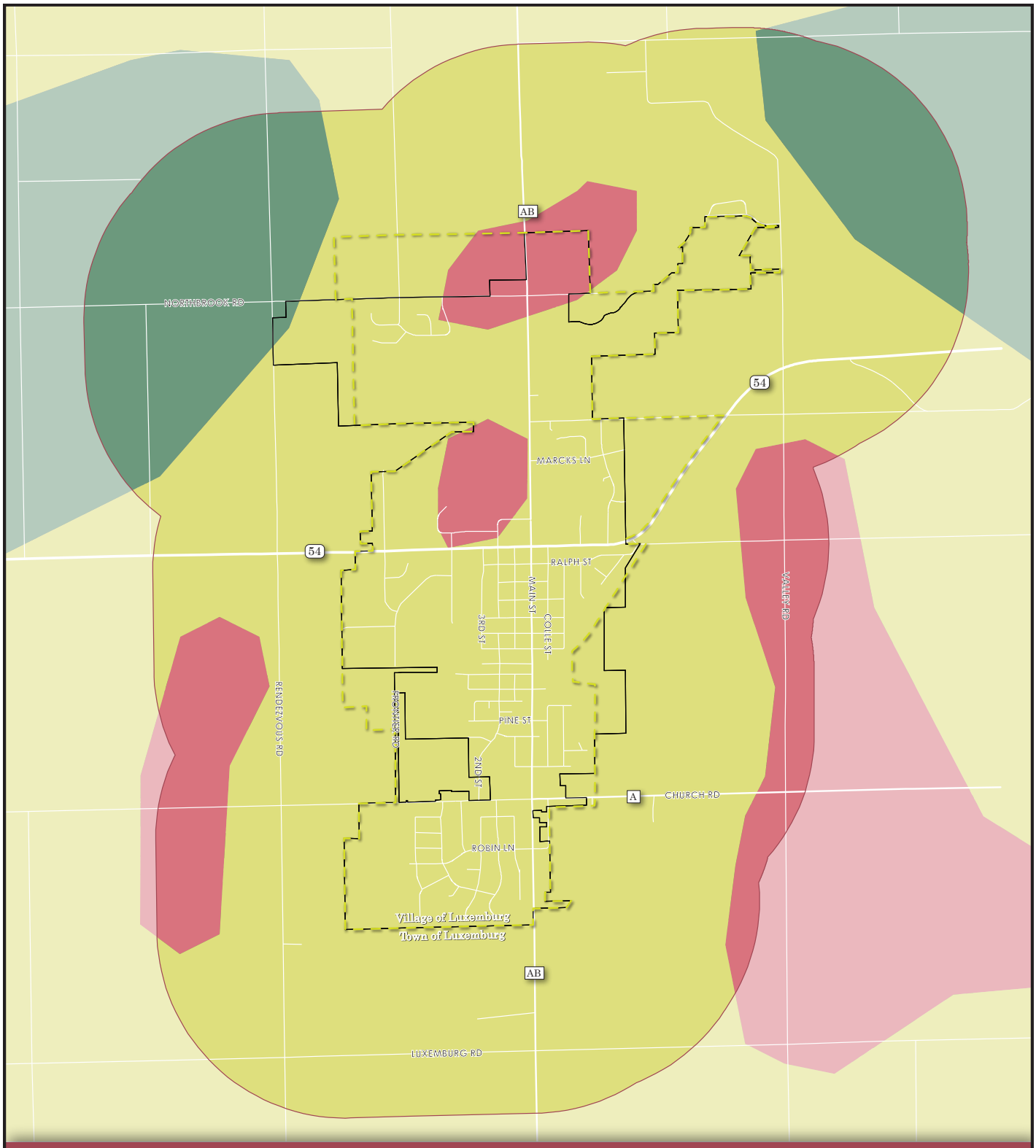
Map 5 shows the areas of steep slope (slope 12 percent or greater) based on soil characteristics within the planning area. Soils characterized as containing steep slopes are more susceptible to erosion and may require special building and construction restraints, such as retaining walls or major grading efforts to remove the area of steep slope.

Bedrock

Within the planning area, the geology is comprised of glacial drift consisting of ground moraines and end moraines overlies the bedrock in the area. The thickness ranges from a few feet to over 100 feet in the southwest portion of the planning area. The surface bedrock consists of undifferentiated dolomites approximately 350 feet thick. The dolomite is underlaid by a formation known as the Mequoketa Shale. Below the Mequoketa Shale are a group of rock units consisting of sandstone, shale, and dolomite, known collectively as the sandstone aquifer. The rock units associated with the sandstone aquifer include the Sinnipee Group, the St. Peter Formation, the Prairie du Chien Group, and the Cambrian System. The Mequoketa formation is estimated to be 400 to 450 feet thick. The sandstone aquifer is estimated to be 800 to 850 feet thick.

The Niagara Dolomite bedrock formation of the area consists of sedimentary deposits. These sedimentary rocks are solidified marine sediments that dip to the southeast towards Lake Michigan. The Niagara formation makes up the bedrock formation of village planning area and virtually all of Kewaunee County.

Because the bedrock in the Village of Luxemburg, in some areas, is close to the surface (see Map 3), it can cause concerns with groundwater contamination. Kewaunee County and municipal residents get their groundwater from the Eastern Dolomite Aquifer. The Eastern Dolomite Aquifer contains interconnected pores and fractures which contain groundwater. This aquifer contains karst geology that can directly connect surface water and ground water. Karst geology is characterized by bedrock which has dissolved to form fractures, sinkholes, and caves. When shallow soils and these karst features are present, surface water that could be carrying pollution and bacteria can more easily and directly infiltrate to groundwater causing concerns for contamination.



Map 3: Limiting Conditions: Bedrock Depth

Village of Luxemburg Sewer Service Area Plan 2043

- Municipal Boundary
- Planning Area (.75 mile setback from Village)
- 2043 SSA Boundary

Depth to Bedrock
- 0 - 5 Feet
- 5 - 50 Feet
- 50 - 100 Feet

0 0.25 0.5 Miles

Sources: WDNR GCSM - Bedrock Depth, 2019; Kewaunee County, 2022; Bay-Lake RPC, 2023.

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Soil Limitations

According to the WDNR's Central Lake Michigan Coastal Ecological Landscape document, soils in this region tend to be:

- Reddish-brown loamy till
- Loamy or clayey with a silt loam surface
- Moderately slow permeability
- High available water capacity

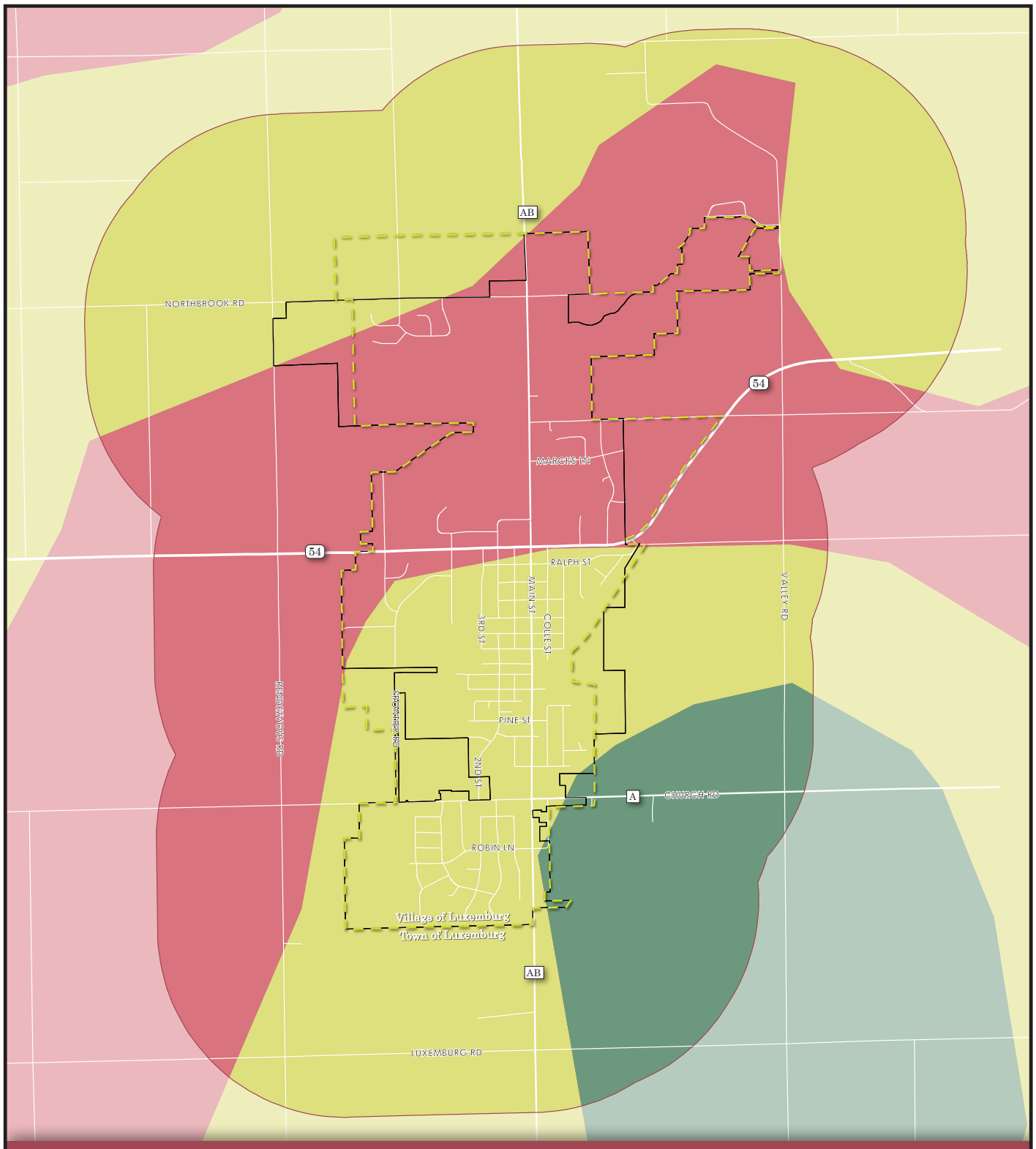
Soil is composed of varying proportions of sand, gravel, silt, clay and organic material. The composition of a soil affects the specific properties of that soil, especially in determining the capacity of supporting on-site wastewater treatment facilities. These properties must be evaluated prior to any development. Without such considerations, on-site wastewater treatment systems may fail and collection systems may require expensive and frequent maintenance. Factors which are considered when evaluating soils for on-site waste systems are:

- **High or Fluctuating Water Table.** When groundwater is near the soil surface, proper filtering cannot take place and often results in on-site systems either backing up into the home or contamination of groundwater. In addition, construction techniques used to de-water systems are costly. If sewer lines in wet soils have been placed improperly or if they break from the adverse soil conditions, groundwater infiltration occurs. As a result, the additional water would then enter the sewer lines and reduce the available capacity of the pipe and the overall effectiveness of the wastewater treatment plant. See Map 4 for the depth to water table.
- **Bedrock.** Large stones or bedrock near the soil surface may hinder excavation and considerably increase the cost of construction. In addition, conventional on-site septic systems cannot function properly, which may result in wastewater passing through the cracked bedrock and contaminating the groundwater. See Map 3 for the depth to bedrock.
- **Soil Permeability.** Permeability refers to the rate at which water flows through the soil. For an on-site disposal system to be successful, the soil must be capable of removing harmful substances and transmitting liquids. When passage is too rapid, groundwater can become polluted. If it is too slow, the soils can become saturated and effluent ponding may result.
- **Flooding.** On-site waste disposal systems that are located within a floodplain can result in problems. As water levels rise during periods of flooding, the system becomes saturated and results in untreated solid and liquid waste being discharged into the ground or surface waters.

These limitations guide the type of wastewater treatment that can be used in a given location. Areas with shallow bedrock or depth to the water table, for example, are not well suited for on-site septic systems, and therefore will need access to municipal systems. Septic tanks are prohibited in wellhead protection areas. On-site septic systems in the planning area are generally located in rural settings outside the village, with only five systems currently located within village limits. Without consideration of the properties of these soils, on-site wastewater treatment systems may fail and collection systems may require expensive and frequent maintenance.

Woodlands

There are approximately 832 acres of woodland in the planning area. Refer to the Current Land Use Map on page 29 for locations. Woodlands are mostly located along bodies of water, wind rows for fields, and in some cases small forest pockets. Preservation of woodlands in the planning area contributes to ecosystem services, including, but not limited to, stormwater retention, erosion control, improved air quality, and thermal regulation. Woodland preservation is included as a recommendation in the 2043 Village of Luxemburg Comprehensive Plan.



Map 4: Limiting Conditions: Depth to Water Table

Village of Luxemburg Sewer Service Area Plan 2043

- Municipal Boundary
- Planning Area (.75 mile setback from Village)
- 2043 SSA Boundary

Depth to Water Table
- 0 - 20 Feet
- 20 - 50 Feet
- Greater than 50 Feet

0 0.25 0.5 Miles

Sources: WDNR GCSM - Water Table Depth, 2019; Kewaunee County, 2022; Bay-Lake RPC, 2023.

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Land Use Controls

The Village of Luxemburg utilizes several documents to mitigate the risk of water quality impacts. These documents include Shoreland-Wetland and Floodplain Zoning Ordinances, the Village of Luxemburg Zoning Ordinance, the Comprehensive Plan, and Erosion Control and Stormwater Management Ordinances. The Village also considers the Kewaunee County Sanitary Ordinance and the Town of Luxemburg Zoning Ordinance. These ordinances identify best management practices that can be implemented at different scales to impact local and regional groundwater and surface water quality.

Wellhead Protection and Groundwater Recharge Areas

Wellhead protection and groundwater recharge areas are designated areas which are meant to protect water supplies from the risk of pollution. Land uses which have the potential to cause pollution should not be built within these areas. In the Village of Luxemburg, the WDNR has identified four Groundwater Protection Areas around municipal wells. WDNR has set a 1,200 foot buffer around each wellhead protection and groundwater recharge area.

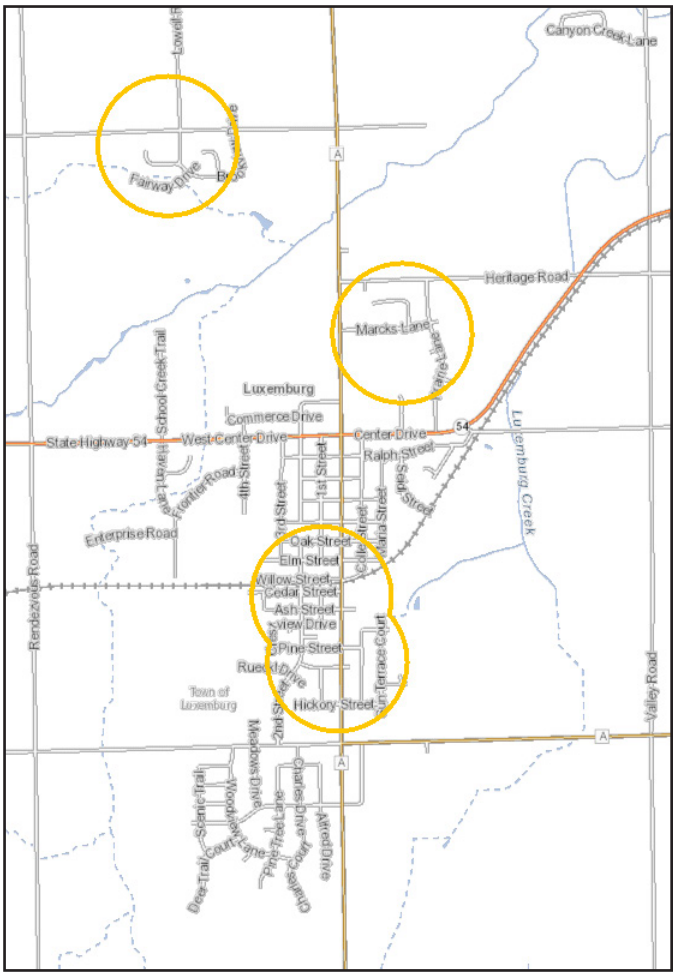
Wellhead protection areas are represented by yellow circles on Figure 1. The water supply system in the village consists of four well stations, one ground storage reservoir, and one elevated storage tank.

The Village of Luxemburg has developed a Wellhead Protection Ordinance that establishes a Primary Protection Zone and Management Zones.

The Primary Protection Zone has a 500 feet radial setback from the wellhead. Management Zone One includes all areas in the Primary Protection Zone and the Zone of Contribution for the five year time of travel. Management Zone Two includes all area extending between the outer perimeter of Management Zone One and a minimum of 1,000 feet radially or the Village Limit boundaries (whichever is less).

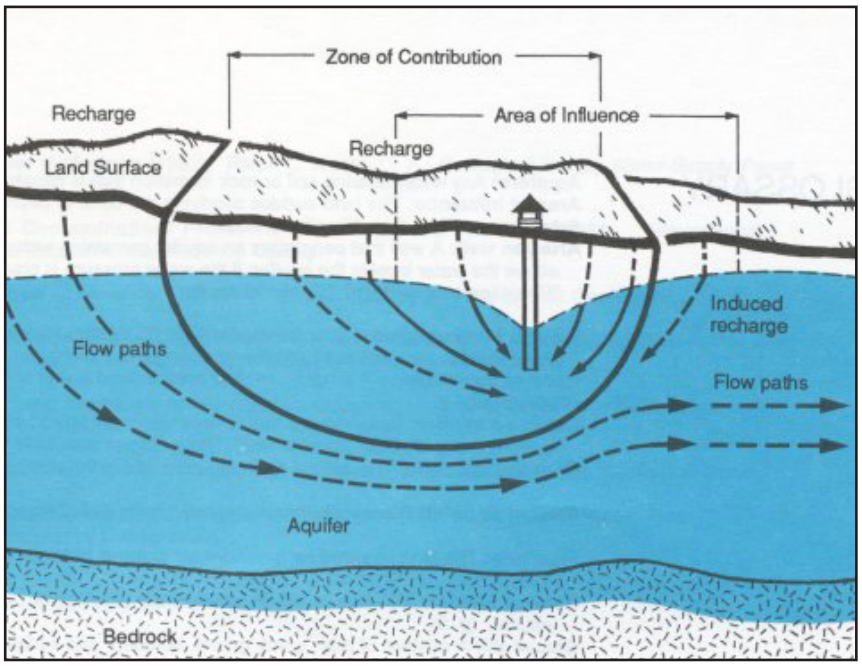
Figure 2 illustrates the zone of contribution for water supply for wells.

Figure 1: Wellhead Protection Areas



Source: WDNR Surface Water Data Viewer

Figure 2: Zone of Contribution



Source: Michigan State University Extension, Water Quality Bulletin #35

The *Wellhead Protection Ordinance* prohibits uses from each zone. Uses are prohibited because they pose a potential risk to drinking water quality if a spill or contamination were to occur. Examples of prohibited uses include concentrated animal facilities, gas stations, landfills, septic tanks, and several other hazardous uses. The *Wellhead Protection Ordinance* lists several more uses and should be reviewed when making land use considerations.

Robert E. Lee Inc. created a *Wellhead Protection Plan* for the Village of Luxemburg to mitigate the risk of groundwater contamination. The plan has several maps covering topics such as setbacks, the zone of contribution, and nearby potential contamination sources for each well. Table 1 shows land use setbacks from wellheads. The plan also contains a contingency plan for emergencies.

Table 1: Wellhead Setback Separation Distances

Source	Separation (ft)
Storm Sewer Drain	50
Sanitary Sewer Main	200
Septic Tank (<8,000 GPD)	400
Gasoline/Fuel Oil Storage Tank	600
Land Application of Municipal, Commercial, or Industrial Waste	1,000
Solid Waste Storage, Transportation, Transfer Operation	1,200

Source: Robert E. Lee & Associates

Environmentally Sensitive Areas

Environmentally sensitive areas are defined in Chapter NR 121 (Areawide Water Quality Management Plans) as:

> "Major areas unsuitable for the installation of waste treatment systems because of physical or environmental constraints are to be excluded from the service area. Areas to be considered for exclusion from the sewer service area because of the potential for adverse impacts on the quality of the waters of the state from both point and non-point sources of pollution include but are not limited to wetlands, shorelands, floodways and floodplains, steep slopes, highly erodible soils and other limiting soil types, groundwater recharge areas, and other such physical constraints." NR 121.05 (1)(g)(2)(c).

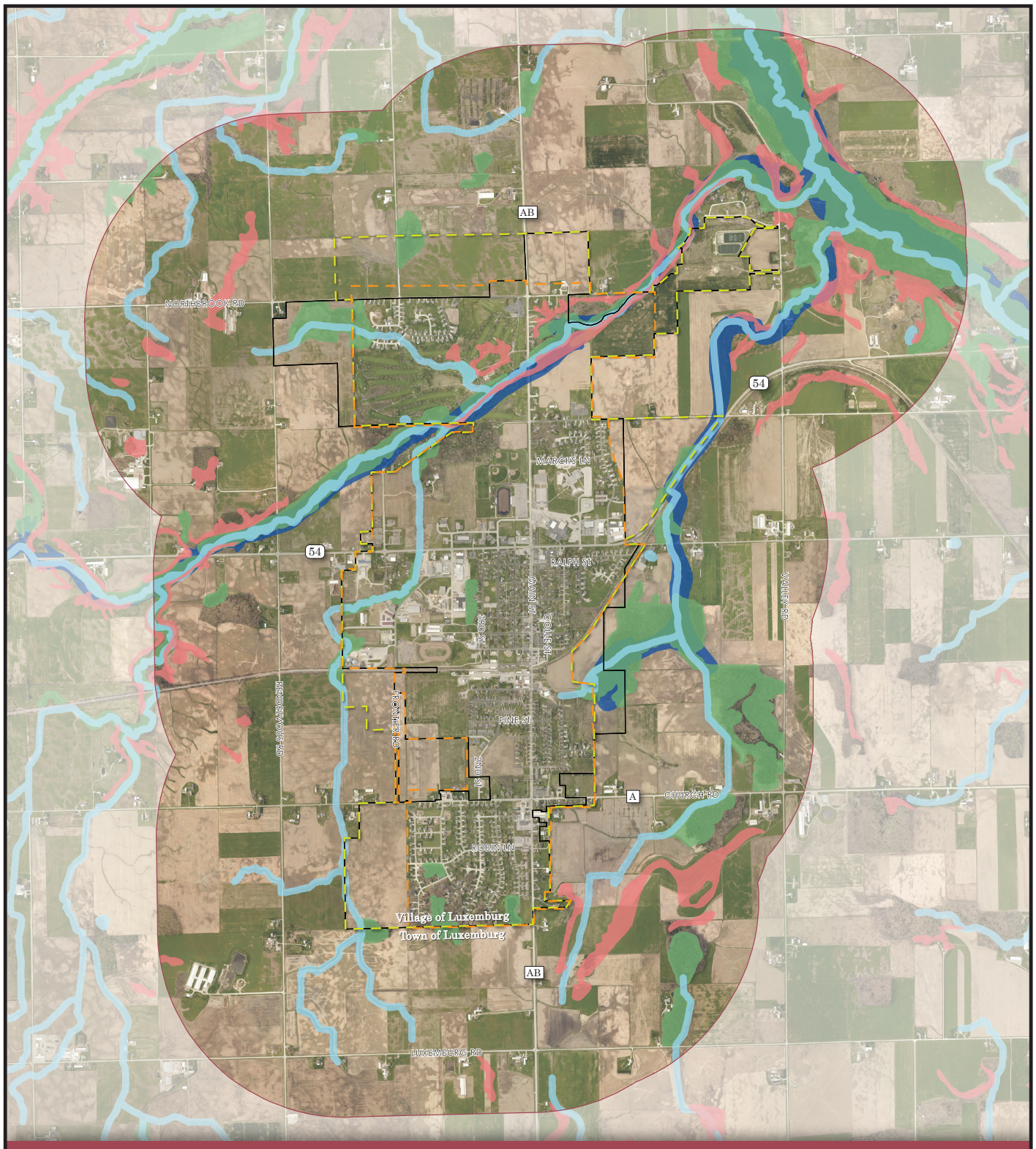
Environmentally sensitive areas should not be developed without serious considerations of alternatives and adverse impacts. These areas can be costly to develop as environmental constraints need to be mitigated and permits through the state and federal government are necessary. Designation of ESA's is intended to:

1. Protect general public health, safety, and welfare;
2. Protect surface and groundwater quality;
3. Reduce damage from flooding and stormwater runoff;
4. Maintain important wildlife habitats or outdoor recreation areas (with the support of local units of government); and
5. Reduce the costs of public utilities and environmental damages.

Environmentally sensitive areas within the BLRPC region have uniform regulations on the following:

- *Wetlands (with a 50 foot setback):* Wetlands are defined by Wis. Stats. s. 23.32 (1) as "an area where water is at, near, or above the land surface long enough to be capable of supporting aquatic or hydrophytic vegetation and which has soils indicative of wet conditions." Water quality standards for wetlands in the state are set forth in ch. NR 103, Wis. Adm. Code. Many of Wisconsin's wetlands have been filled and as Wisconsin's climate becomes warmer and wetter, wetlands are needed to help retain stormwater to mitigate flooding and to improve water quality. Wetlands provide many ecosystem services that include providing areas for fish spawning and nurseries, bird habitat and nesting, and recreation. This includes all delineated wetlands under Wis. Stats. s. 281.36.
- *Floodplains:* Floodplains are lowland areas that provide stormwater retention areas after snow melt and rain events. The 100-year flood is utilized as a baseline to represent an extreme flood event that has a 1% chance of occurring each year. These areas are designated by the Federal Emergency Management Agency (FEMA). Floodplains are regulated by county floodplain zoning ordinances that protect the health, safety, and welfare of human life, while mitigating property damage.
- *Steep Slopes:* Steep slopes are defined as slopes that have a 12 foot, or greater, vertical rise over 100 feet of horizontal run, or a 12% slope. These slopes are hazardous and costly to build on due to the steepness of the slope, erosion, and the need to develop necessary infrastructure to access the site. Steep slopes offer opportunities for unique habitats for plants and animals, while providing recreation areas and scenic views for humans.
- *Surface Water (with a 75 foot setback):* Wisconsin has numerous surface water resources that require special protection to preserve this resource for future generations. NR 115 and 117 regulate the shoreland and wetland setbacks for Wisconsin municipalities as a 75-foot setback from the ordinary high-water mark (OHWM) for all structures and buildings, with a 35-foot vegetated buffer. These buffers are necessary to maintain the health of lakes and shorelines as they help to reduce shoreline erosion, prevent nutrient overloading that causes algae blooms and sedimentation that destroys fish spawning habitat from occurring in our bodies of water.

Other significant natural resource features, including but not limited to, river and stream headwaters, woodlands, high-value wildlife habitat areas, geologic and natural area sites, and wet, poorly drained and organic soils, shall be considered for inclusion as an ESA on a case-by-case basis by the TAC.



Map 5: Environmentally Sensitive Areas

Village of Luxemburg Sewer Service Area Plan 2043

- Municipal Boundary
- Planning Area (.75 mile setback from Village)
- 2043 SSA Boundary
- 2019 SSA Boundary

Environmental Corridors

- Steep Slope (12% or Greater)
- Surface Water (with a 75 ft buffer)
- Wetlands (with a 50 ft buffer)
- 100-Year Floodplain

0 0.25 0.5 Miles

Sources: FEMA, 2009; NRCS, 2021; WDNR, 2021; Kewaunee County 2019, 2022; Bay-Lake RPC, 2023.

Disclaimer: This map is neither a legally recorded map nor a survey and is not intended to be used as one. This drawing is a compilation of records, information, and data used for reference purposes only. Bay-Lake RPC is not responsible for any inaccuracies herein contained.

Intensive uses to be considered for exclusion from within ESA's include but are not limited to: permanent structures such as residential, commercial, or industrial buildings; impervious surfaces such as parking lots and concrete or asphalt surfaced storage areas; and site disturbing activities such as extensive clearing, grubbing, grading, and filling. Any consideration of development within or adjacent to an ESA must be in conformance with all applicable Federal, State, and local rules and regulations including the provisions and requirements of the Federal Clean Water Act, Wisconsin Administrative Codes NR 103, 115, 116, 117, 121, 200, 216, and 299, and local zoning ordinances.

Uses which may be compatible with the protection and preservation of ESA's include non intensive recreational facilities such as trails and picnic areas; in some instances, utility facilities such as sewer and water lines, detention basins, and stormwater drainage-ways; and limited clearing, grubbing, grading, and filling.

If there is any doubt as to the location of or infringement on ESA's at the time of sewer extension or boundary amendment requests (as delineated on the review maps), the Bay-Lake Regional Planning Commission will consult with and request site specific information (including proposed building footprints) from the local municipality. This information, along with the ESA criteria from this plan, will be used to make a recommendation on the proposal. Bay-Lake Regional Planning Commission will make the final determination on the ESA boundary for all proposed projects.

Application of the above ESA's definition will not apply to those areas currently developed or platted at the time of the plan publication, but will apply to those areas not yet developed or platted at the time of plan publication.

The Village of Luxemburg planning area contains approximately 1,760 acres of environmentally sensitive areas. Map 5 illustrates the environmentally sensitive areas in the planning area.

Parks and Recreation

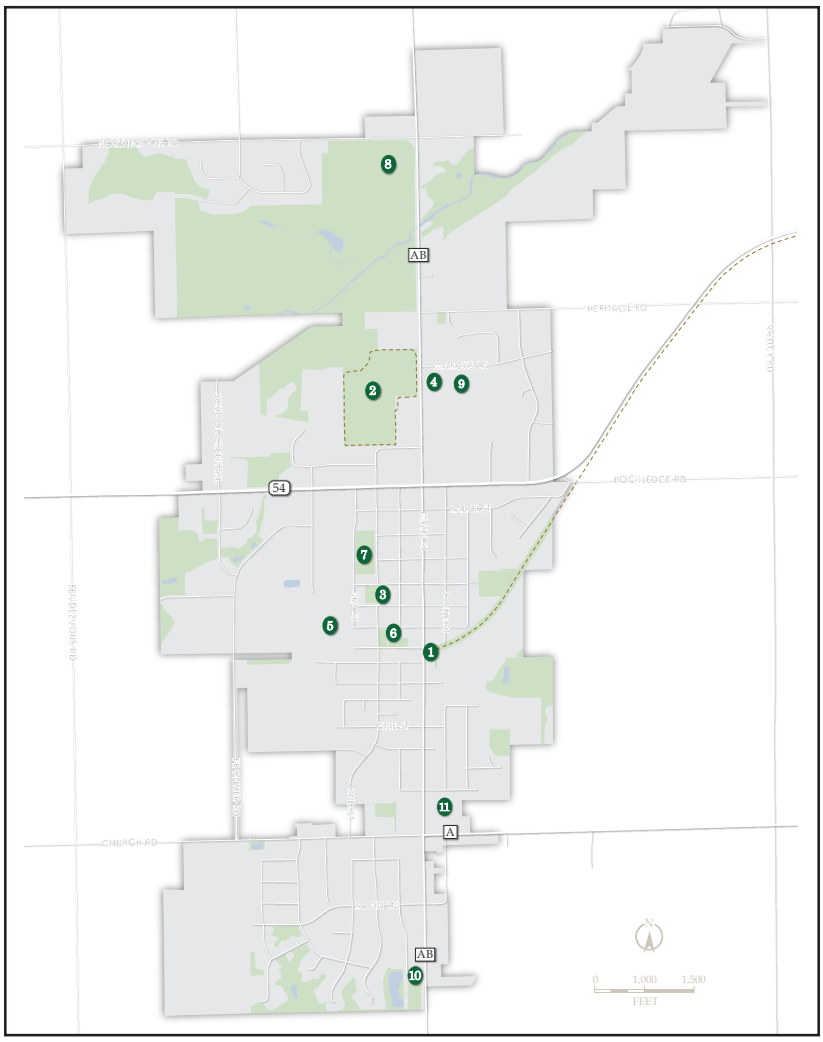
Environmentally sensitive areas represent potential opportunities for preserves, parks, and recreation areas. Parks and recreation facilities built in these areas should consider the environmental constraints for septic systems, which should not be built in environmentally sensitive areas which could flood or cause waste to leak into sources of water.

Potential areas for preserves, parks, and recreation areas are:

1. Areas along river corridors such as School Creek and Luxemburg Creek
2. Unimproved parks in floodplain areas
3. Areas which bedrock is close to the surface or where steep slopes exist
4. Wooded areas
5. Wetlands

Figure 3 shows the parks and recreations areas in the village. These areas help increase the capacity for stormwater management by increasing the amount of large green spaces in the village. There is approximately 190 acres of park and recreation area in the planning area, the majority of which is a golf course.

Figure 3: Parks and Recreation Locations



Parks and Recreation

1. Ahnapee Trail
2. Athletic Field Complex
3. Fireman's Park
4. Intermediate School Playground
5. Kewaunee County Fairgrounds
6. Legion Field
7. Luxemburg Youth Park
8. Northbrook Golf Course
9. Primary School Playground
10. South End Park
11. St Mary's School Playground

Source: BLRPC, 2022

Planning Area Land Use

Table 2 shows the approximate acreages of land uses in the planning area, and Table 3 shows land use in the sewer service area. See Map 6 for location and distribution of land uses. The planning areas contains approximately 7,313 acres of land, and the Sewer Service Area contains roughly 1,797 acres of land. The major land use in the planning area is agricultural at 4,924 acres and woodlands at 833 acres. The land uses in the new sewer service area boundary is also mostly agricultural. Within the village limits, the major land uses are residential, natural areas, and woodlands. Technically, the sewer service area does not include environmentally sensitive areas, which are delineated as an overlay and do not count in acreage allocations for sewered development.

Direct comparisons between land use in the current and previous planning areas are not possible due to the differing methods of designation. The previous planning area was the entire Town of Luxemburg, whereas the planning area in this plan is a 0.75 mile setback from the Village boundaries.

The two large institutional/governmental blocks are the Kewaunee County Fairgrounds and the Luxemburg-Casco School District Campus. The large green parks and recreation area is the Northbrook Golf Course.

Since the 2000 plan, 1.49 acres have been added to the village for residential properties, 18.44 acres for proposed commercial and heavy industrial development along with street right of way, and 110 acres for two proposed residential developments.

Table 2: Planning Area Land Use

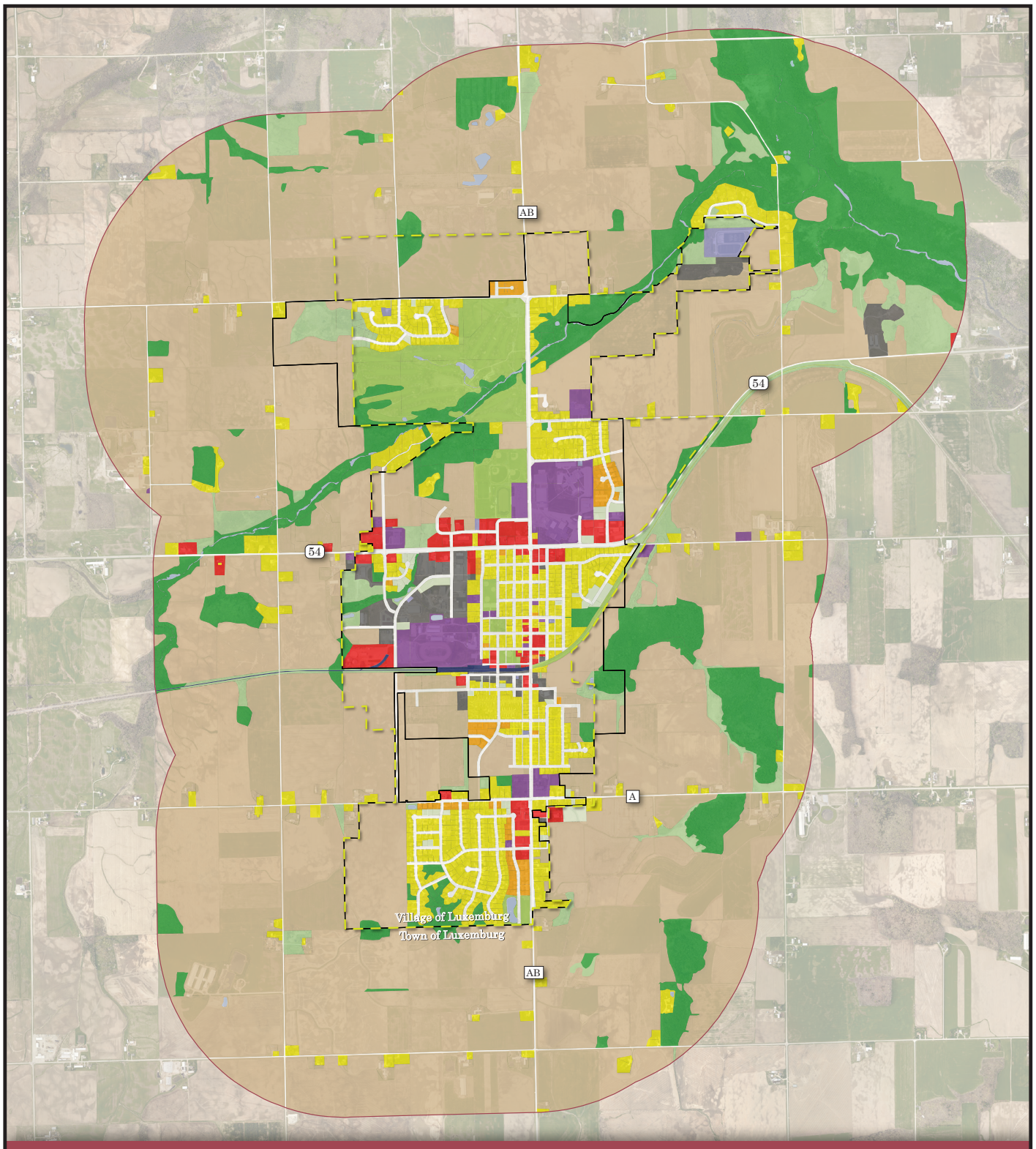
Land Use	Acreage	Percentage
Agriculture	4,923.87	67.33%
Commercial	81.98	1.12%
Communication/ Utilities	15.39	0.21%
Industrial	79.91	1.09%
Institutional/ Governmental	120.99	1.65%
Multi-Family	35.47	0.49%
Natural Area	251.61	3.44%
Open Land	27.62	0.38%
Park & Recreation	189.94	2.60%
Residential	460.23	6.29%
Right-Of-Way	259.97	3.55%
Transportation	7.46	0.10%
Water	25.85	0.35%
Woodlands	832.54	11.38%
Total	7,312.85	100.00%

Source: BLRPC, 2023

Table 3: Sewer Service Area Land Use

Land Use	Acreage	Percentage
Agriculture	576.65	32.09%
Commercial	73.92	4.11%
Communication/ Utilities	15.30	0.85%
Industrial	66.18	3.68%
Institutional/ Governmental	117.37	6.53%
Multi-Family	35.47	1.97%
Natural Area	47.32	2.63%
Open Land	23.68	1.32%
Park & Recreation	186.48	10.38%
Residential	311.27	17.32%
Right-Of-Way	188.59	10.50%
Transportation	5.81	0.32%
Water	10.06	0.56%
Woodlands	138.69	7.72%
Total	1,796.78	100.00%

Source: BLRPC, 2023



Map 6: Current Land Use

Village of Luxemburg Sewer Service Area Plan 2043

- Municipal Boundary
- Planning Area (.75 mile setback from Village)
- 2043 SSA Boundary

- Agricultural
- Commercial
- Communications/Utilities
- Institutional/Governmental
- Industrial
- Multi-Family
- Natural Area

- Open Lands
- Park and Recreation
- Residential
- Right-Of-Way
- Transportation
- Water
- Woodlands

0 0.25 0.5 Miles

Sources: NAIP Imagery, 2020; Kewaunee County, 2019, 2022; Bay-Lake RPC, 2023.

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Chapter 4: Wastewater Management

This chapter outlines the Village of Luxemburg's current wastewater treatment facility and collection system, provides information on current sewerage system capacities, and identifies future wastewater treatment and collection needs. Existing elements of the sanitary sewer system are identified in Map 7.

Inventory of Existing Wastewater Treatment Systems

Wastewater Collection Facilities

The Village of Luxemburg wastewater collection system was first constructed in the 1940s, with the original wastewater plant being constructed in 1948. This plant was a conventional activated sludge plant using primary and secondary clarification to treat the wastewater.

The current wastewater treatment facilities were constructed in 1976 and consist of two aerated lagoons with a rock filter for solids removal. Effluent was treated with chlorine prior to being sent to the Kewaunee River. In 1999 the effluent flow was diverted from the Kewaunee River and sent to NEW Water upon completion of the construction of a new pumping house and force main. The wastewater treatment plant changed to a pre-treatment facility which no longer requires water quality testing to meet WPDES permit limits. Chlorine disinfection was discontinued. The original discharge lines to the Kewaunee River were left in place with the out flow opening in the aeration basin sealed with cement.

The original sanitary sewer service system was constructed of clay pipe with oakum and mortar joints. Since installation, there have been several sewer service extensions. Extensions installed prior to 1976 were built with concrete or transit pipe which used rubber gasket joints. Sewer extensions after 1976 were constructed using PVC pipe.

In 1999, the Village of Luxemburg connected to NEW Water to provide wastewater services for the village. All effluent is pre-treated in the Village of Luxemburg facility and then transported by pipe to NEW Water in Green Bay via the forcemain extending West on Northbrook Road.

Description of Wastewater Collection System

Gravity Sewers and Forcemains

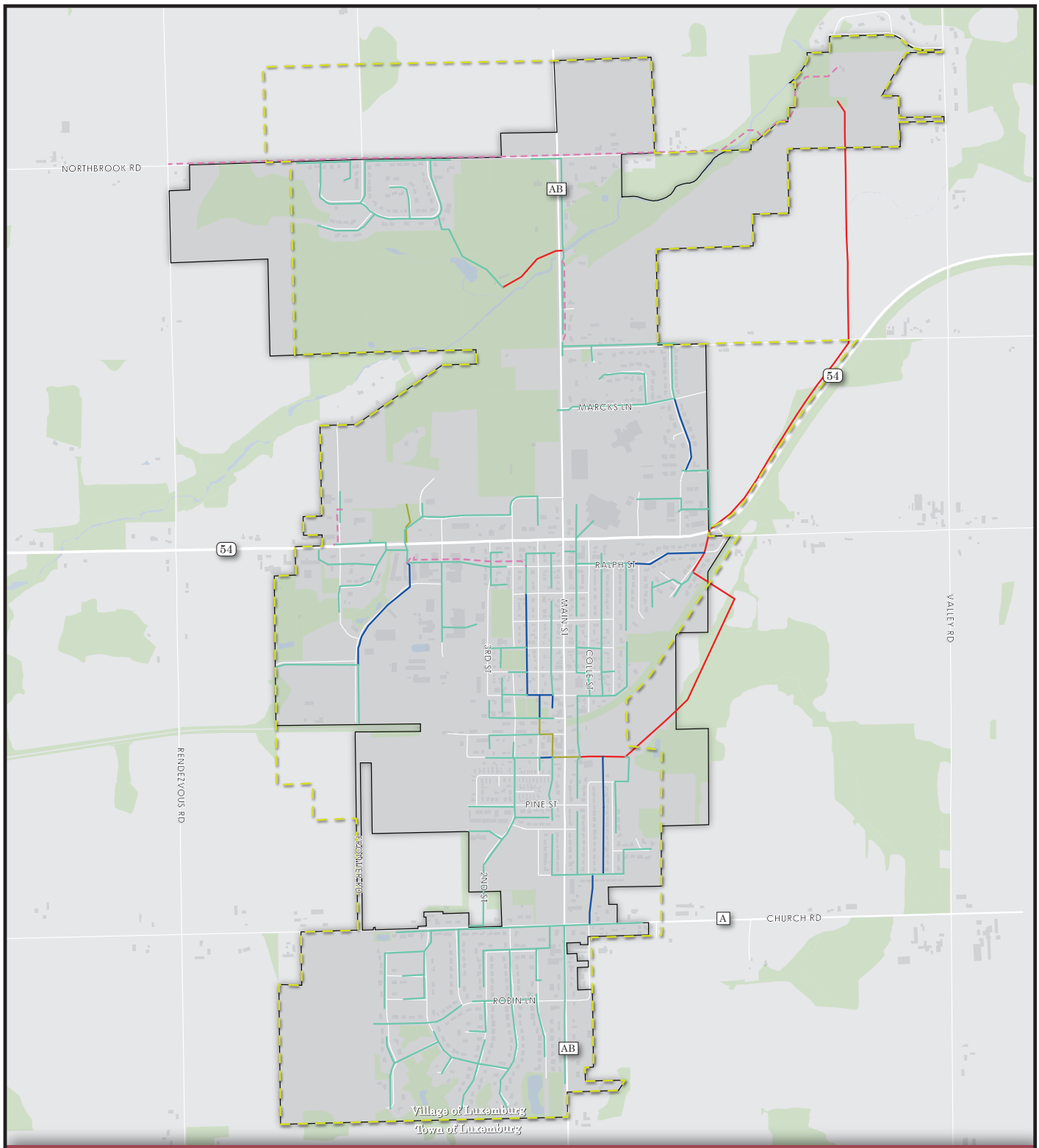
The existing sanitary sewer collection system includes 18.6 miles of sewer lines, with all new piping being plastic. In the previous plan adopted in 2000, there were 44,310 feet (8.3 miles) of collection and trunk sewers. Notable extensions of sanitary sewer include subdivisions in the northwest section of the village off of Northbrook Road and the south at the intersection of Main Street and Church Road. See Map 7 for the size and location of sewer lines. Sewer lines extending outside of the sewer service area boundary were placed due to cost-efficiency and gravity flow. They do not serve areas outside the boundary.

Lift Stations

Lift station No. 1 serves the area west of Second Street which includes an industrial wastewater contributor, Packerland Whey.

Lift station No. 1 was installed in 1982 and includes two vacuum primed pumps set up for alternate operations. The lift station has a capacity of 200 gpm at an 88-foot TDH. In 2016 lift station No. 1 went through major rehabilitation. The lift station does not have a standby generator, however, the village does have a trailer-mounted gasoline driven pump for use during power outages.

Lift station No. 2 was installed and serves developments north of School Creek along North Main Street and Northbrook Road. The design of this lift station is similar to lift station No. 1, except it has a capacity of 140 gpm.



Map 7: Sanitary System

Village of Luxemburg Sewer Service Area Plan 2043

Municipal Boundary
2043 SSA Boundary

Sanitary System
8" Sanitary Sewer
10" Sanitary Sewer
12" Sanitary Sewer
18" Sanitary Sewer
Forcemain

0 1,000 2,000 Feet

Sources: Robert E. Lee & Associate, 2022; Kewaunee County, 2022; Bay-Lake RPC, 2023.

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Wastewater Treatment Facilities

Plant Description and Operation

Water is gravity fed from the Village to the WWTP influent building. The treatment plant consists of a two-cell aerated lagoon system that covers 4.12 acres. Wastewater flows by gravity through an 18-inch diameter interceptor to an inlet structure located at the plant. The inlet structure contains a screw filtering system to remove debris and a Siemens sonic flow meter. The flow meter is calibrated annually. The influent sample is collected from the flume discharge. From the inlet structure, the wastewater enters the first lagoon then flows through a control structure to the second lagoon.

Aeration for BOD removal in the lagoons is provided by coarse bubble diffusers to add oxygen to the system. Lagoon No. 2 contains a quiescent zone and a rock filter for suspended solids removal. Lagoons No. 1 and No. 2 have volumes of 7.0 and 8.75 million gallons, respectively, when operated at a normal liquid depth of 12 feet. The volume of Lagoon No. 2 includes the rock filter. In 2022, the average rate influent flow rate of 0.37 mgd and the average effluent flow rate was 0.39 mgd. Maximum monthly influent and effluent flow rates in 2022 were 0.67 and 0.71 mgd respectively. The maximum flow rates exceed the plant's average design flow (i.e. treatment process capacity) of 0.4 mgd.

Aside from the treatment process capacity, the WWTP was also designed and built with specific hydraulic capacity, which refers to the maximum flow rate that can be contained and passed through the WWTP without detrimental impacts to the treatment process and without causing sewage overflows. The WWTP's maximum design flow of 0.98 mgd has been exceeded several times over the last five years, including 2022 with peak daily influent flows of 1.03 mgd. Specific unit processes within the WWTP do have higher hydraulic capacities, such as the effluent pumping station for which the current configuration with two pumps running allow for a daily peak flow capacity of 1.3 mgd. The effluent building is designed to accommodate three pumps. The addition of a third pump would increase effluent capacity while staying within the NEW Water allocated flow of 1.9 mgd in the Wequiock. Note that the lagoons are not routinely kept at maximum capacity, so there is an ability to absorb extra influent into the basin, prior to pumping to NEW Water.

Blowers and the lab are located in the original building. The effluent pumps and back-up generator are located in a separate facility that was built when the connection to NEW Water took place.

Treated effluent no longer flows in the Kewaunee River after the facility was connected to the NEW Water system. NEW Water does not limit flow per day from the village.

Wastewater Treatment Plant Performance

Since being connected to NEW WATER, the facility has been reclassified as a pre-treatment facility and no longer requires water quality testing to meet WPDES permit limits.

The comminuter was replaced with a screw filtering system.

A new pumping house and force main was completed in 1999 with effluent being transported through the New Franken line and then to Green Bay. The WWTP had two sanitary sewer overflow (SSO) events due to excessive rainfall and lack of capacity in the New Franken Line to NEW Water which allowed water to flow into the Kewaunee River. New Franken had the capability to ramp back flow from Luxemburg to prioritize their flow to NEW Water. In 2016, the village worked with NEW Water and changed the effluent flow discharge location to the Wequiock line and purchased flow capacity up to 3cfs or 1.935 mgd.

The WWTP had a third SSO occur on April 5, 2023 which discharged about 100,000 gallons after a rainfall event which dropped 0.71 inches on saturated soil. Influent wastewater flows filled the lagoons and caused an overflow from the aeration basin (i.e., modified chlorine contact chamber) prior to the pumping building. Overflow went directly into the Kewaunee River. There was no overflow directly from the lagoons to the adjacent land. Effluent pumping capped out at 1.2 to 1.3 mgd.

Any sludge removal is still the responsibility of the village, but as of yet it has not been needed.

Table 4: Village of Luxemburg Wastewater Flows

	Annual Average (mgd)	Monthly Maximum (mgd)	Peak Daily (mgd)	Peak Hourly (mgd)
Year 2020 Flow Estimates[1]	0.38	0.67	1.05	1.35
Year 2040 Flow Projections[2]	0.44	0.76	1.20	>1.54
Design Flows[3]	0.4	--	0.98 (maximum flow, WWTP) 0.58 (comminutor)[4] 2.01 mgd (influent screw pumps) 1.30 mgd (two effluent pumps)	

Notes:
1. 2020 Estimates are based on observed flows from 2020 thru Sept 2023
2. 2040 Projections are based on a population increase of 545 persons (WDOA 2040 Projection of 3,230 minus 2020 Census Population 2,685). The added future flows also assume 100 gpcd for annual average flows, historical peaking factors for monthly max and peak daily flows, and a peaking factor of 3.5 for peak hourly flows.
3. Design data based on Table 2-1, Engineering Report - Wastewater Modifications, Robert E. Lee Associates, Inc., August 23, 2016 and input from Kathy Garfinkel (WWTF operator)
4. WWTP's current Operations and Maintenance (O&M) Manual and input from Kathy Garfinkel (WWTF operator). Note that the comminutor can be easily removed from the flow stream if needed.

Flow projections have been calculated to estimate whether existing facilities have the capacity to handle future flows. Annual average, monthly maximum, and peak daily flows in Luxemburg, estimated for 2020 and projected for 2040, are detailed in Table 4. Based on observed flows from 2017 through September 2023 (based on CMAR reporting) the estimated annual average flows in 2020 were 0.38 mgd, and peak daily flows were 1.05 mgd. Projected flows in the year 2040 are 0.44 mgd for annual average and 1.20 mgd for peak daily. The added future flows between 2020 and 2040 are assumed to be residential flows based on a 545-person population increase (difference between WDOA 2040 population projection of 3,230 and US Census 2020 population of 2,685). The added future flows also assume 100 gpcd for annual average flows, historical peaking factors for monthly max and peak daily flows, and a peaking factor of 3.5 for peak hourly flows. Historical peaking factors for the Luxemburg WWTP are 1.9 and 2.7 for max monthly and peak daily flows, respectively.

The projected annual average flows are slightly higher than those calculated in NEW Water's recently updated *Facility Plan for the Green Bay and De Pere Facilities*. The estimated 2020 annual average flows for Luxemburg using the 2020 WDOA population projection of 2,760 is 0.34 mgd and 2040 projected annual average flows is 0.37 mgd. These calculations utilize per capita flows of 122 gpcd for 2020 estimates and 75 gpcd for the projected change in population between 2020 and 2040. Historical peaking factors for the Green Bay Facility, which treats wastewater from Luxemburg, are slightly higher than those for the Luxemburg WWTP. Historical Green Bay Facility peaking factors are 3.27 and 4.52 for peak daily and peak hourly flows, respectively.

Based on the flow estimates and design flows in Table 4, projected future flows entering the WWTP are under the 1.9-mgd capacity allocated from NEW Water using the Wequiock line. The projected future flows also exceed the WWTP's maximum flow capacity Specific unit processes within the WWTP do have higher hydraulic capacities, such as the effluent pumping station for which the current configuration with two pumps running allow for a daily peak flow capacity of 1.3 mgd. The effluent building is designed to accommodate three pumps. The addition of a third pump would increase effluent capacity while staying within the allocated 1.9 mgd in the Wequiock.

Actual wastewater flow values may change depending upon growth in the community. NEW Water annually requests information concerning potential population/commercial growth or loss. Table 2 in NR 110 identifies peaking factors that are associated with sewer systems with reasonable but not excessive amounts of inflow/infiltration (I/I). Given the capacity problems exposed by the April 2023 overflow, peak hourly influent wastewater flows (and the associated peaking factors) for Luxemburg are likely higher than typical values from Table 2 in NR 110.

The village will work with the NEW Water I&I TAC (technical advisory committee) to determine best practices going forward. The village has televised all of its system over the last six years and completed upgrades to sections identified as problem areas. Current I&I issues are most likely from laterals. These will need to be identified and funding obtained to help customers with the replacement costs.

The village will also submit the final investigation report to the DNR by January 5, 2024 in response to a Notice of Non-compliance for the April 2023 overflow. Long term plans to prevent a future overflow may include continued work on the infiltration/inflow program in the Village and future work on lateral replacement. The Village does not plan to construct additional permanent overflow containment structures but rather improve on existing processes. In the case of another high water event, close monitoring of pond levels and making adjustments as needed to the control structures between Lagoon No. 1 and Lagoon No. 2, at the end of Lagoon No. 2, and in the aeration basin. There is a moveable gate which can control the water level in the aeration structure in addition to control structures at the end of each pond and which will affect the level in the ponds in high flow events. A procedure will be written on steps to prevent the overflow for village staff.

The Village should also develop a comprehensive facility plan for the WWTP to assess capacity and performance issues and identify necessary short-term and long-term action items or improvement projects. DNR's records suggest the last comprehensive Facility Plan for the Village's WWTP was developed in 1996. The Facility Plan update should also include an infiltration/inflow analysis and recommend specific action items (over and above what is currently done in CMOM program) that could reduce the Village's I/I flows.

Chapter 5: Growth and Development Trends

The purpose of this chapter is to discuss the population, housing, and economic trends occurring in the Village of Luxemburg to help predict future sewage needs.

Population Trends

The U.S. Census and the Wisconsin Department of Administration (WDOA) were utilized to create Table 5. The Census provides an accurate estimate of the total population and the WDOA provides population growth projections. The projections used in this plan are based on 2013 data with a target year of 2040. When new 2050 projections are released in 2023, the plan will be amended and updated.

The Village of Luxemburg has quickly increased from 1,935 people in 2000 to 2,685 people in 2020, that is 750 people or a 38.75% increase to the population. Population growth is projected to continue into 2040 with a slightly slower growth rate of a 20.29% increase or 545 additional people by 2040.

The surrounding Town of Luxemburg is projected to growth slightly until 2035 and then see a decline in population into 2040.

Table 5: Population Trends

Geographic Area	US Census			WDOA Forecasts				Population Change 2020 - 2040
	2000	**2010**	**2020**	**2025**	**2030**	**2035**	**2040**	
Village of Luxemburg	1,935	2,515	2,685	2,930	3,090	3,185	3,230	545
Town of Luxemburg	1,402	1,469	1,458	1,565	1,610	1,615	1,595	137

Source: U.S. Census (2000, 2010, 2020), Wisconsin Department of Administration, Minor Civil Divisions Projections, 2010 - 2040

Population Distribution by Age

The median age in Luxemburg declined slightly from 34.7 years in 2010 to 33.8 years in 2020 (see Figure 4). This is predominately due to the influx of young families moving into the village. Median age trends should be considered when planning for the community service needs of the village as the population is expected to grow and age.

Between 2010 and 2020, Luxemburg's senior population (65 years and over) increased by 3.1 percent, while Luxemburg's youth (under 18 years) and young adult (18 years and over) population declined by 1.5 and 1.6 percent. Figure 5 breaks the village into age groups and shows the percentage of the population in each group.

Figure 4: Median Age

Village of Luxemburg: 33.8
Kewaunee County: 44.2
Wisconsin: 39.6

Source: US Census, 2020

Figure 5: Age Distribution

- Under 5 years: 7.2%
- Under 18 years: 28.4%
- 18 years and over: 71.6%
- 65 years and over: 16.2%

Source: US Census, 2020

Household Size

Table 6 shows the average number of people living in each household in both the Village and Town of Luxemburg. In the Village of Luxemburg, the average persons per household in 2020 was 2.57 persons and has a decreasing trend to 2.37 persons per household by 2040. The Town of Luxemburg is also projected to have a decreasing trend from 2.84 to 2.61 persons per household in 2040.

Table 6: Average Persons Per Household

Geographic Area	Actual Year	Projection Years			
	2020	2025	2030	2035	2040
Village of Luxemburg	2.57	2.46	2.42	2.39	2.37
Town of Luxemburg	2.84	2.72	2.67	2.64	2.61

Source: U.S. Census (2020) Table H12, Wisconsin Department of Administration, Minor Civil Division Projections, 2010 - 2040

Housing Projections

Table 7 shows the housing projections for both the Village and Town of Luxemburg from 2025 to 2040. Although both the Village and Town of Luxemburg are seeing a decline in the number of persons living in a household they are both projected to see an increase in housing. The Wisconsin DOA has projected the Village of Luxemburg to see an increase of 293 houses by 2040, and 49 in the Town of Luxemburg by 2040.

Table 7: Housing Projections 2020 - 2040

Geographic Area	Actual Year	Projection Years				Housing Change 2020 - 2040
	2020	2025	2030	2035	2040	
Village of Luxemburg	1,061	1,186	1,270	1,323	1,354	293
Town of Luxemburg	561	576	603	612	610	49

Source: U.S. Census (2020) Table H12, Wisconsin Department of Administration, Minor Civil Division Projections, 2010-2040

Employment Characteristics

Table 8 shows the change in employment by industry for the Village of Luxemburg from 2000 to 2020. Overall, the Village of Luxemburg's employment has increased by 27% since 2000. The industry that saw the largest growth has been the Education, Healthcare, and Social Services. All other industries have seen growth in the number of employees, except for the Manufacturing and Construction industries that have seen slight declines in the number of employees they have.

In 2020, the industry sectors with the greatest number of employees were: Education, Healthcare, and Social services (408 employees), Manufacturing (218 employees), and Retail Trade (117 employees). These industries make up over 50 percent of the village's total employment base.

Table 8: Village of Luxemburg Employment Characteristics by Industry

Industry	Number of Employees		
	2000	2020	Change
Agriculture, Forestry, Fishing & Hunting, and Mining	19	25	6
Construction	122	102	- 20
Manufacturing	241	218	- 23
Wholesale Trade	28	51	23
Retail Trade	102	117	15
Transportation	59	70	11
Information	10	25	15
Finance and Insurance	75	105	30
Scientific, Management, Administrative, and Waste Services	45	65	20
Educational, Healthcare, and Social Services	172	408	236
Entertainment, Recreation, and Accommodation	71	73	2
Other services	40	55	15
Public Administration	12	55	43
Total	**996**	**1,369**	**373**

Source: U.S. Census American Community Survey 5-year estimates, 2022

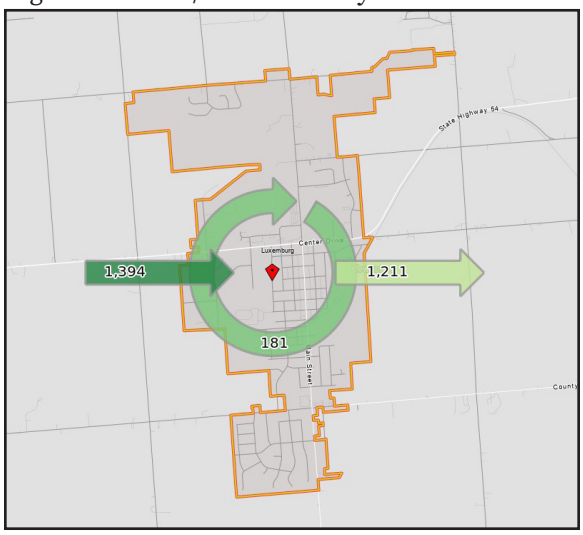
Inflow/Outflow of Workers

The U.S. Census Bureau produces a graphic on the inflow and outflow of workers in Census designated areas called OnTheMap, Figure 6.

According to U.S. Census Bureau, the Village of Luxemburg has about 1,394 people who commute into the village but live outside, 1,211 people who live in the village but commute out of the village for work, and 181 people who live and work in the village.

The direction of the arrows doesn't show the direction people are commuting.

Figure 6: Inflow/Outflow Analysis



Source: OnTheMap, U.S. Census

Future Land Use Allocations

The Wisconsin DOA housing projections and average lot size per dwelling were utilized to estimate the acreage demand for land uses for the next 20 years. Table 9 shows the land use acreages for the Future Land Use Map (Map 8). The future land use map is developed alongside community recommendations and goals, and acreages will not necessarily correspond with the projections made based on WDOA data, as listed in Table 10. The Village of Luxemburg is projected to need 164 acres of land for residential developmepnt, 39 acres for commercial, and 35 acres for industrial, as shown in Table 10.

Table 9: Future Land Use Map Acreage Percentages (2043 SSA Boundary)

Land Use Category	Acreage	Percentage
Agriculture	0.00	0.00%
Commercial	117.28	6.53%
Industrial	199.36	11.10%
Institutional/ Governmental	162.86	9.06%
Park & Recreation	185.50	10.32%
Residential	922.80	51.36%
Right-Of-Way	208.98	11.63%
Total	1,796.78	100.01%

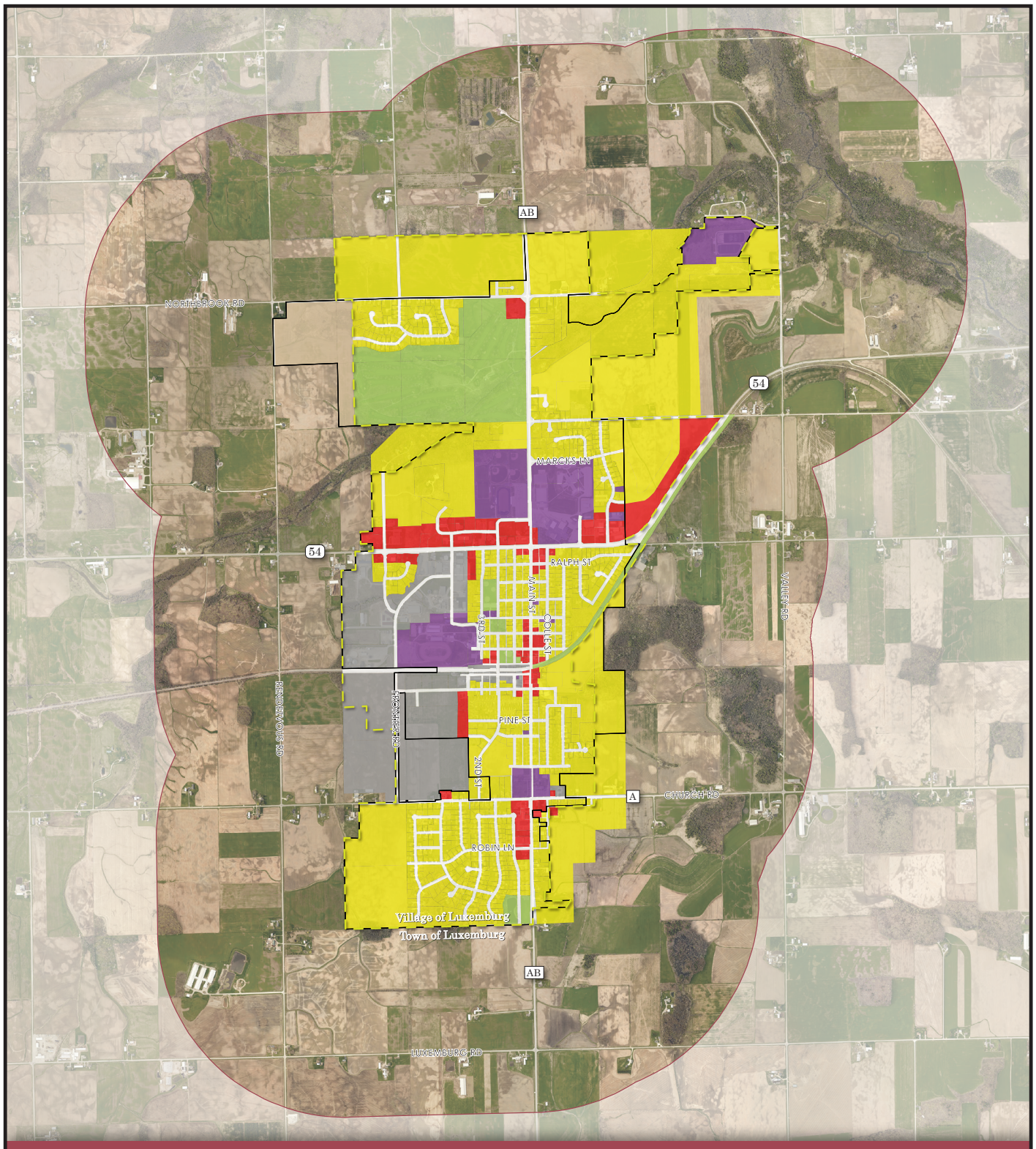
Source: Bay-Lake RPC

Table 10: Future Land Use Allocations, Village of Luxemburg

Year	Residential		Commercial		Industry	
	Acres	Total	Acres	Total	Acres	Total
2025	70.8	70.8	16.9	16.9	15.1	15.1
2030	42.0	112.8	10.0	26.9	8.9	24.0
2035	30.9	143.7	7.4	34.2	6.6	30.6
2040	20.7	164.4	4.9	39.1	4.4	35.0

Source: Bay-Lake RPC, 2022

Note: Residential projections are made based on occupied household projections from the WDOA and average lot size per dwelling unit based on housing density recommendations of the village. The household projections only include single family homes and do not account for apartments or multi-family homes. Commercial and industrial projections are made based on the ratio of residential acreage to commercial acreage based on the current land use inventory.



Map 8: Future Land Use

Village of Luxemburg Sewer Service Area Plan 2043

- Municipal Boundary
- Planning Area (.75 mile setback from Village)
- 2043 SSA Boundary

Future Land Use

- Residential
- Commercial
- Industrial
- Right-Of-Way
- Institutional/Governmental
- Agriculture
- Park and Recreation

0 0.25 0.5 Miles

Sources: FEMA, 2009; NRCS, 2021; WDNR, 2021; Kewaunee County 2019, 2022; Bay-Lake RPC, 2023.

Disclaimer: This map is neither a legally recorded map nor a survey and is not intended to be used as one. This drawing is a compilation of records, information, and data used for reference purposes only. Bay-Lake RPC is not responsible for any inaccuracies herein contained.

Chapter 6: SSA Boundary Analysis

This chapter discusses the steps and considerations used to determine the sewer service area boundary.

Sewer Service Area Boundary Determination

The TAC based the new sewer service boundary on the analysis of plan chapters, growth trends and projections, and the physical suitability of surrounding undeveloped parcels.

Future land use allocation projections in Table 9 show that the Village of Luxemburg would need about 238 acres for growth. The village has enough undeveloped acres to accommodate this growth. Although this is the case, the village is not sure in which direction future growth will occur, so the SSA boundary was expanded in several directions that are known to have greater potential for development to avoid the need for additional amendments. Areas identified on the future land use map that are not expected to be developed in the short term were not included in the new SSA boundary. In total, the new SSA boundary adds about 339 acres to the boundary for a total of 1,797 acres.

The TAC made these additions to the sewer service area:

1. Parcels to the north and the southwest of the village were included because of future residential developments.
2. Parcels located just south of the village's industrial park along the railroad were included because of the potential for new industrial and multi-family development.
3. Parcels in the east along State Highway 54 were included for the potential for new commercial, multi-family, and residential uses.
4. The sewer service boundary was also expanded, in places considered feasible, to the village's 2043 boundary.

See Map 9 for the previous and current sewer service area boundaries.

Map 9: Sewer Service Area Boundary

Village of Luxemburg Sewer Service Area Plan 2043

- Municipal Boundary
- Planning Area (.75 mile setback from Village)
- 2043 SSA Boundary
- 2019 SSA Boundary

0 0.25 0.5 Miles

Sources: FEMA, 2009; NRCS, 2021; WDNR, 2021; Kewaunee County 2019, 2022; Bay-Lake RPC, 2022.

Disclaimer: This map is neither a legally recorded map nor a survey and is not intended to be used as one. This drawing is a compilation of records, information, and data used for reference purposes only. Bay-Lake RPC is not responsible for any inaccuracies herein contained.

Chapter 7: Plan Implementation

This chapter outlines the processes that must be followed when amending and updating the plan.

Technical Advisory Committee

The Technical Advisory Committee (TAC) shall consist of the members of the Village of Luxemburg, one representative from Kewaunee County, and one representative from the Town of Luxemburg. Each member has one vote when approving amendments. The TAC's responsibility is to provide information, guidance and recommendation for proposals and future development in the Village of Luxemburg SSA Plan boundaries.

The TAC will convene, when requested, to oversee the implementation of the SSA Plan. The TAC shall hold at least one meeting a year to review sewer extensions, evaluate growth trends, and consider plan amendments.

Procedure for Sewer Extension Reviews

After the adoption of the plan, WDNR requires that applications for sewer extension in the Village of Luxemburg SSA be reviewed by the Bay-Lake RPC and NEW Water to determine if the extensions are in conformance with the sewer service plan. This local review process is shown in Figure 7 and is outlined below.

1. The Village of Luxemburg or engineering consultant forwards the developer's submitted letter and site plan map of the proposed sewer extension to Bay-Lake RPC and NEW Water (via email or mail).
2. Bay-Lake RPC will provide a conformance letter for all sewer service extension projects. The review will be completed within 15 business days of receipt of the letter.
3. If the proposed sewer extension is in conformance with the plan, the conformance letter should be attached to the sewer extension plans that are submitted to WDNR by the applicant.
4. If the proposed extension is not in conformance with the plan, the applicant will be notified within the 15 business days.

    e. If the sewer extension is still pursued, the SSA plan must be amended in order for the proposed extension to be in conformance. Information regarding plan amendments are located starting on page 44.

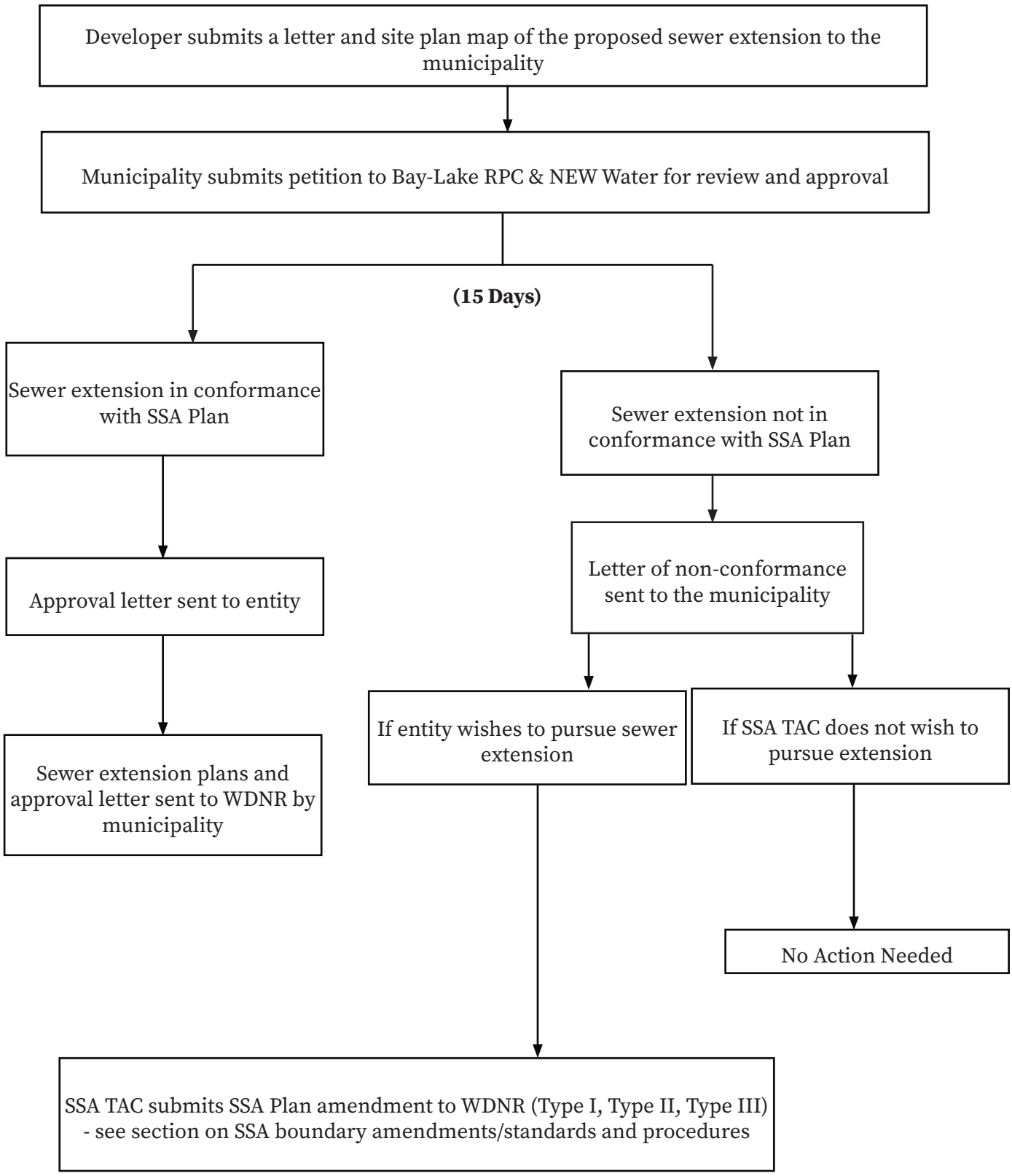
    f. Upon plan amendment, the proposed sewer extension request should be resubmitted and will follow the same process.

    g. After plan amendment the sewer service extension process starts from step 1.

Septage

Large private on-site wastewater treatment systems (POWTS) that "singly or when added together or increased by successive additions generate 3,000 gallons of septage per day or greater" will need to contract with wastewater treatment facilities. Additionally, if the large POWTS is located outside of the sewer service area the plan will require an amendment prior to approval.

Figure 7: Flow Diagram of Procedure for Sewer Extension Review



SSA Boundary Amendments: Standards and Procedures

Developments that exceed the determined acreage for the 20-year sewer service boundary will require the plan to be amended prior to approval. Amendments provide the Village of Luxemburg and developers flexibility in the case that community growth trends exceed projections.

Two types of amendments to the service area boundaries may be expected: Type I Amendments and Type II Amendments.

- Type I Amendments are required when the service area boundary changes but the total acreage is not increased. In this amendment, acreage is swapped to extend the sewer service area boundary in one area while reducing it by the same amount of developable acreage, "like for like," in another area.
- Type II Amendments would be used to add to the total acres in the sewer service area in municipalities that are experiencing population growth that is above the projections outlined in this plan.

The Bay-Lake RPC will review amendment requests and forward them to the TAC, maintain the records of boundary amendments, review requests for sewer extensions, and update the service area boundary map.

All amendments need to be reviewed by Bay-Lake RPC and the TAC, and their recommendations, along with the request for a sewer service area amendment, is forwarded to the WDNR. The WDNR in all cases has final approval of the amendments.

Amendment standards and their established procedures are outlined below.

Amendment Standards

All proposed amendments that would shift or add acreage to the service area shall meet standards one through six, and number seven when applicable.

1. There shall be minimal adverse impacts on ESAs and water quality as a result of development stimulated by the amendment.
2. Existing or planned sewage treatment facilities must have sufficient capacity to treat the projected wastewater flows generated by the added territory.
3. The SSA boundary amendment area must be in conformance with the local comprehensive plans adopted under s. 66.1001, Wis. Stats. and zoning regulations and the established goals and objectives of this plan.
4. The configuration of sewer service area boundaries may be modified provided that the amendment area has a common boundary with the current sewer service area and will not create a void within the sewer service area (i.e. no satellites or voids).
5. Modifications of the boundary can be shown to be cost-effective, orderly, and a logical extension of urban development.
6. The delivery of other services by the existing and proposed community facilities (i.e. parks, schools, fire protection, etc.) will be available and will be provided for the amended area.
7. When the projected number of acres of the Luxemburg Sewer Service Area Plan have been developed, the service area may be increased by amending the boundary when it can be demonstrated that:
    a. The current population growth rate exceeds the plan's projected population growth rate for the municipality; and
    b. The population density standard is modified by the TAC to reflect quantifiable changes in the municipality population distribution.

Annexations or detachments of territory (as defined in s. 66, Wis. Stats.) within the boundaries of the sewer service area do not constitute amendments to the SSA boundary and are therefore not subject to amendment procedures. SSA amendment decisions should not be seen as supporting or opposing annexation proceedings.

Amendment Procedures

For all amendment types, the following procedure is used (a flow diagram of this procedure is shown in Figure 8):

1. An amendment petition is submitted to the municipality that requires a sewer service area amendment.
2. The municipality refers the petition to the Bay-Lake RPC for an initial review. The Bay-Lake RPC develops a recommendation, compiles information for the TAC, and forwards the request to the TAC. The TAC reviews the request and develops a recommendation to the WDNR.
3. Within 60 days of the Bay-Lake RPC receiving a completed amendment application, the TAC holds a public meeting and public hearing on the petition following publication of a Class 1 Notice according to ch. 985, Wis. Stats. The public notice shall be published in the official paper. All costs associated with the preparation and publishing of the public notice shall be borne by the petitioner.

   A record of the public hearing proceedings and testimony shall be maintained by the Bay-Lake RPC on behalf of the TAC.
4. The TAC shall review the recommendations and take final action on the amendment request. All or any part of the petitioned land may be added to the service area along with additional safeguards or conditions deemed necessary by the TAC to carry out the intent of the sewer service area amendment standards.

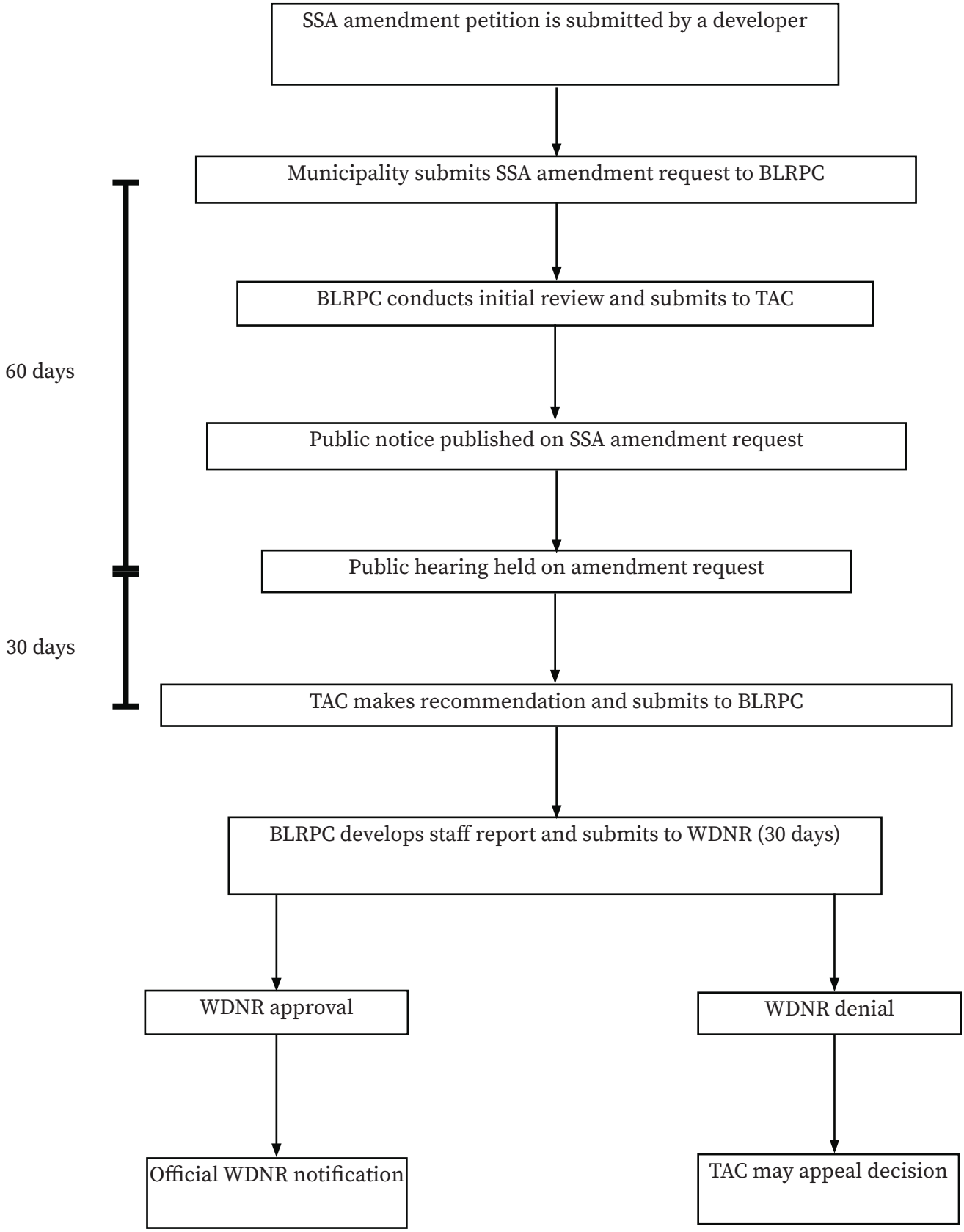
   Approved amendments by the TAC shall be transmitted to the Bay-Lake RPC within 30 days of the public hearing.

   Note: When formulating a recommendation, several considerations should be utilized such as citizen input, conformance with other community plans, development and population trends, impacts to the natural environment, and conformance with the plans adopted goals, objectives, and policies.
5. The Bay-Lake RPC shall develop a Staff Report for the amendment and submit it to the WDNR within 30 days after the TAC has transmitted their recommendation to the Bay-Lake RPC.
6. The WDNR will review the amendment and approve or deny it in writing to the municipality and the Bay-Lake RPC. WDNR decisions may be appealed in accordance with the procedures in s. 227.52 and 227.53, Wis. Stats., which allows for a party to file a petition for judicial review. In the event of an appeal, approval conflicts between the WDNR and the TAC must be resolved before sewer lines are extended into any new area.

Note: The WDNR will make best efforts to decide on the amendment within approximately 45 days unless an environmental assessment is deemed necessary in accordance with NR 150.

If an environmental assessment is required, the WDNR will prepare it and issue a public notification to allow for receipt of public comments to be considered prior to final approval. When an environmental assessment is required, the WDNR review period may extend to approximately three months or more. An environmental assessment is normally required if the amendment proposal delineates an area of over 1,000 acres that may be served with sewer, or if it may result in the sewered area increasing by more than five (5) percent per year. The WDNR may require an environmental assessment under any project circumstances if they determine the proposal has the potential to cause significant environmental effects and may involve unresolved conflicts in the use of available resources.

Figure 8: Flow Diagram of Procedure for SSA Amendment (I and II)



Amendment Types

Type I Amendment: A municipality amends the service area boundaries without increasing the land area the municipality has within its sewer service boundary. For every acre added to the municipality's service area, an area of developable land of equal size is removed.

A type I amendment petition shall include the following information:

a. A map showing the location of the properties;

b. General development plans for the area including land use proposals and a preliminary timetable for implementing the development plan;

c. An indication of the specific service needs of the site (i.e., sewer and water line size, water pressure, roadways, etc.); and

d. The cost for the review process by Bay-Lake RPC shall be determined at the time of petition receival by Bay-Lake RPC. Cost from review shall be paid by the petitioner. The check should be made out to Bay-Lake Regional Planning Commission.

e. Additionally, affected landowners will be formally notified in writing of their lands being withdrawn from the sewer service area.

Type II Amendment: A municipality amends the sewer service boundary to alter the total acreage of the service area.

6. A type II amendment petition shall include the following information

a. Comparisons of population projections of the sewer service plan with actual population increases in the municipality.

b. Comparisons of land acreage projections in the plan with the actual amount of vacant land.

c. Provide data on the current development density of the municipality.

d. Supply information on the capacity of existing sewer lines and treatment facilities to serve the area proposed for additions to the sewer service boundary.

e. The petitioner's request shall include a check for $1,500 to the Bay-Lake Regional Planning Commission to assist with costs associated with the development of the staff report prepared for the WDNR.

Type III Amendment: The development of an area designated as an ESA.

This type of amendment applies to any environmentally sensitive area boundary change (regarding setbacks only) that does not involve any wetlands or floodways, does not intrude more than halfway into any ESA buffer or to within 25 feet (for areas within the village, 75 feet in areas outside the village) of a navigable body of water, and does not result in any significant adverse water quality impact as determined by the WDNR and BLRPC.

All requests for Type III amendments will be reviewed on a case-by-case, site-specific manner. A Type III Amendment is requested by the municipality wishing to extend sewer service to an area delineated as an environmental sensitive area to allow the development of a portion of the ESA. Wetland boundaries and their corresponding setbacks should be based on accurate wetland delineations. It is not advised that the WWI be used as the only wetland boundary-setting tool. The plan recognizes the possible conflict between development and preservation of ESAs and this amendment is meant to allow both to co-exist.

The petitioner must provide justification that no reasonable alternative exists to avoid the amendment, and provide documentation that all appropriate local, state, and federal environmental permits have been or will be granted for the proposed development.

Type III Amendment submittals shall include the same materials as a Type II amendment with the addition of detailed drawings or maps of wetland delineations and the proposed modification to the ESA map, with the acreage modifications.

An approved Type III amendment is one which allows development of an ESA with minimal environmental impacts. Bay-Lake RPC may recommend and WDNR may approve the amendment with specific conditions that must be met to ensure protection of the potentially affected resources.

Other Amendments

All other portions of this SSA Plan (including text, data, and maps) may be amended by the TAC. Proposed amendments shall be submitted to Bay-Lake RPC and forwarded to the members of the TAC at least seven days prior to the meeting at which action on the amendment will be taken. Amendments approved by the TAC will be transmitted to the WDNR for review and final approval.

Plan Update

A review and update of the Luxemburg Sewer Service Area Plan should be undertaken every five years, if necessary; otherwise at halfway life of the plan, year ten. These items should be reviewed for accuracy and relevance:

1. Population trends.
2. Population and housing projections. Provided by the WDOA.
3. Population densities, household size, and urban development trends.
4. Assess the impact from major land use changes or developments.
5. Assess changes to environmentally sensitive lands.
6. Policy statements.
7. Add any amendments to the plan and service area boundaries that were made during the preceding five years.
8. Extend the sewer service area boundary to accommodate the area's population.
9. Add any changes in the institutional structure for plan review and implementation.
10. An update on citizen participation efforts.

Appendix A: TAC Meeting Agendas

Agenda

Village of Luxemburg - Sewer Service Area Plan Technical Advisor Committee

June 16, 2022
9:00 - 10:00 am
Village of Luxemburg - Village Hall

1. Purpose of the Technical Advisory Committee
2. Chapters to be updated and reviewed

Land Characteristics, Demographics, Land Use, Wastewater Treatment Facility, Plan Implementation

3. Sewer Service Planning Area Boundaries
4. Chapters to be reviewed next meeting

Land Characteristics & Growth Trends

5. Next Meeting Date

Agenda

Village of Luxemburg - Sewer Service Area Plan Technical Advisor Committee

July 21, 2022
9:00 - 10:00 am
Village of Luxemburg - Village Hall

1. Chapters to be reviewed:
   a. Introduction
   b. Growth and Development Trends
   c. Land Characteristics
2. Goals and Objectives formation
3. Chapters & Items for the next meeting
   a. Wastewater Management Systems
   b. Plan Implementation
   c. Setting the Sewer Service Area Boundary
4. Set Next Meeting Date

Agenda

Village of Luxemburg - Sewer Service Area Plan Technical Advisor Committee

August 25, 2022
10:00 - 11:00 am
Village of Luxemburg - Village Hall

1. Chapters to be reviewed:
   a. Wastewater Management Systems
   b. Plan Implementation
2. Setting the Sewer Service Area Boundary
3. Next steps
   a. Finalize SSA Boundary Maps
   b. Public Hearing
   c. Recommendations for the WDNR
   d. Adoption by the Village

Agenda

Village of Luxemburg - Sewer Service Area Plan Technical Advisory Committee

March 9, 2023
4:00 - 5:00 pm
Village of Luxemburg - Village Hall

1. Review DNR comments
2. Review and discussion of draft document
3. Preparation for open house and public hearing
4. Review timeline

Village of Luxemburg
Sewer Service Area Plan & Comprehensive Plan
Open House
March 14, 2023 - 5:00 pm @ Luxemburg Village Hall

Meeting Sign-In Sheet

	Name	Affiliation
1	Nicole Barbiaux	Village Resident
2	Jack Seidl	Village President
3	Dan Rueckl	Village Trustee
4	Bob Romuald	Village Worker
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Village of Luxemburg - Sewer Service Area Plan
Technical Advisory Committee

Meeting Sign-In Sheet March 14, 2023

	Name	Affiliation
1	Bob Romuald	Village of Lux
2	Dan Rueckl	Village Trustee
3	Lew Dvchteu	Village Plan Commission
4	Jack Seidl	Village President
5	Kathy Garfinkel	Village of Luxemburg
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Agenda

Village of Luxemburg - Sewer Service Area Plan Technical Advisory Committee

March 14, 2023
6:00 pm
Village of Luxemburg - Village Hall

1. Call to Order
   TAC Members in Attendance: Jack Seidl, Bob Romuald, Dan Rueckl, and Kathy Garfinkal
2. Acknowledgment of Public Posting Requirements
3. Public Hearing:
   - Luxemburg Sewer Service Area Plan Update

   Public hearing called at 6:15 pm.
4. Review Public Comment Re: Luxemburg Sewer Service Area Plan Update
   No public comments.
5. Recommend Sewer Service Area Plan for WDNR Formal Review
   Motion to recommend: Dan Rueckl
   Second: Bob Romuald
6. Any Other Issues
7. Adjournment
   Motion to adjourn: Bob Romuald
   Second: Dan Rueckl


Luxemburg

Village of Luxemburg
Sewer Service Area Plan 2043