



CHAPTER 8: AGRICULTURAL, NATURAL AND CULTURAL RESOURCES

INTRODUCTION

This element includes a brief summary of existing conditions, a list of issues and opportunities that were identified during the planning process, a vision statement and a series of goals, objectives and recommendations to guide future decisions in the City of Neenah.

Issues and opportunities identified in this element were determined through the public participation process, collection of background data and through a review of the following documents:

- *Neenah Comprehensive Plan 2020*, adopted in 1999;
- *City of Neenah's Sustainability Plan*, adopted September 5, 2013; and
- *City of Neenah 5-Year Capital Improvement Program*, [2016-20202023-2027](#).

SUMMARY OF EXISTING CONDITIONS

Agricultural, natural and cultural resources give definition to a community and strongly affect quality of life. Natural features have significant bearing on historic and contemporary land use and development patterns. While cultural resources define a community's unique character and heritage. Understanding the relationship between natural features and the physical suitability to accommodate specific activities, while protecting historic features is important to planning the City's future land use.

Below is a summary of the key agricultural, natural and cultural resources that impact and shape the City of Neenah. For a complete listing, please see *City of Neenah Comprehensive Plan Update 2040, Volume Two: Existing Conditions Report*.

Agricultural Resources

- Farmland in Winnebago County and the towns surrounding the City of Neenah is being lost as this land is converted to other uses.
- The City of Neenah has one community garden located on [Marathon Avenue](#) Byrd [Avenue](#) next to the Neenah Police Department.
- Neenah allows residents to keep mason bees and [a limited amount of](#) poultry within the City.

Natural Resources

Land Resources

- There are no areas of steep slopes (greater than 12%) in the City.
- Approximately 3.2 percent (198 acres) of the City has areas of high bedrock; areas of high bedrock are located in the southern part of the City.
- There is about one acre of active quarry sites in the City of Neenah and two acres of reserve. Both are located between I-41 and Tullar Road.



- There are approximately 32 acres in the northwest corner of the City of Neenah that may be suitable for sand and gravel extraction.

Water Resources

- Neenah is bordered by Lake Winnebago and Little Lake Butte des Morts. Water clarity in the lake is low.
- The Neenah Slough ([Neenah Creek](#)) is the only named waterway within in close proximity to the City of Neenah. The slough is one of the major northern pike spawning areas adjacent to Little Lake Butte des Morts. The stream is impacted by storm sewer discharges, which carries high levels of [polluted](#) sediments.
- The City of Neenah is located within the Lower Fox, Upper Fox, and Wolf River Basins.
- Overall, 13 percent (809 acres) of the City is within a floodplain. Floodplains within the City are directly associated with the Neenah Slough corridor and areas along the Lake Winnebago shoreline.
- Only 3 percent (158 acres) of the City's total acreage is classified as wetlands. Generally wetlands are found near the Neenah Slough, Lake Winnebago and Little Lake Butte des Morts.
- Practically all areas within the City fall within the high (90.5%) water recharge potential.
- Within 68 percent (4,180 acres) of the City, the depth to groundwater is less than two feet.

Wildlife Resources

- Wildlife is threatened by the negative effects of development and stormwater runoff (both from urban and rural runoff sources).
- Neenah lies within the tension zone, which has characteristics of both northern and southern Wisconsin climates, and therefore species from both areas.
- There are no planted woodlands and approximately 198 acres of general woodlands in the City.
- A review of the Wisconsin DNR Natural Heritage Inventory Township Search Tool (for the towns of Neenah, Clayton, Vinland, and Oshkosh) database revealed a number of species (fish, community, bird, butterfly) for the City and towns surrounding the City of Neenah.

Parks, Open Space and Recreational Resources

- The WDNR does not own any land within the City of Neenah.
- Important environmental corridors within the City and surrounding area are associated with the Neenah Slough corridor and the unnamed streams with natural vegetation scattered throughout the area.

Waste and Pollution

- According to the Solid and Hazardous Waste Information Management System there are 19 operating sites listed for Neenah.
- A search of the database for solid waste landfills / disposal facilities indicates that there are 5 sites in the City of Neenah.



Air Quality

- The 8-hour design values (ppb) were not exceeded at the Outagamie County site between 1997 and 2012.
- Outagamie County did not exceed the primary and secondary National Ambient Air Quality Standard for particulate matter between 2001 and 2012.

Cultural Resources

- At the present, 27 properties / districts within the City of Neenah are listed on the National Register.
- A search of the DHP's online Architecture and History Inventory (AHI) reveals a total of 1,220 sites listed for Neenah.
- There is one historical marker, located in the City of Neenah: Wisconsin Avenue Commercial Historic District – Interior Walkway.
- There are five museums in the City of Neenah: Doty Cabin, Hiram Smith Octagon House, Velte History Exhibit, Bergstrom-Mahler Museum of Glass and R Harder Gallery of Gems & Minerals.
- According to the City of Neenah, five sites are considered either a local historic site or a local historic building.
- The City of Neenah is a Certified Local Government.
- The City of Neenah has established a Neenah Landmarks Commission.
- The Neenah Historical Society was formed in 1948; its mission is to collect, preserve and share the history and stories of the City of Neenah.
- The City of Neenah was incorporated in 1873.

ISSUES AND OPPORTUNITIES

A number of issues and opportunities were identified through the public participation process, collection of background data and through a review of other documents. A list of issues and opportunities are described below:

Agricultural Resources

Agricultural lands are being lost in Winnebago County and in the towns surrounding the City as these lands are converted to other uses. Even though farmland acres are declining, farming still remains an important source of income and employment in Winnebago County. Local farming operations provide a source for locally grown produce and fruit that people are seeking. Neenah's Saturday farm market at Shattuck Park during the summer and fall months is well attended. ~~During the colder seasons, the farm market moves indoors to the Marketplace in Downtown Neenah.~~ In addition, farmland provides open space and wildlife habitat and defines our heritage and sense of place.



Community Garden



Residents are looking for opportunities to grow and raise their own food. Currently Neenah has one community garden, which provides gardening space to 96 local gardeners. Annually this garden has been full and all garden plots have been rented. In addition, the City of Neenah allows residents to keep mason bees and [a limited amount of](#) chickens within the City. While mason bees aid in pollination, they do not provide honey.

Issues and Opportunities:

- Agricultural lands are being lost in Winnebago County and in the towns surrounding the City.
- The existing community garden is well utilized and all plots are rented on an annual basis.
- Neenah's Saturday farm market at Shattuck Park [and the indoor market at Marketplace](#) provide an opportunity for residents and visitors to purchase fresh local food and produce and other items.
- Mason bees aid in pollination, but they do not provide honey.

Natural Resources

Land Resources

Approximately 3.2 percent (198 acres) of the City has areas of high bedrock; these areas are found in the southern part of the City. Areas of high bedrock are defined as areas where the bedrock is within 70 inches of the surface. There may be other areas in the City where the depth to bedrock is slightly more than 70 inches. These areas [would can](#) impact construction costs for public and private infrastructure.

Issues and opportunities:

- The City has areas of high bedrock which increases construction costs for public and private infrastructure.

Water Resources

The City of Neenah borders Lake Winnebago and Little Lake Butte des Morts. The Neenah Slough flows through the City of Neenah into Little Lake Butte des Morts. Agricultural and urban runoff affects water quality of surface water resources. Nutrient loads raise water temperature, contributing to the growth of excessive aquatic vegetation including invasive species. This could impact opportunities for water based recreation (boating, swimming and fishing). Residential development threats to surface water resources include lawn applied chemicals, siltation and petroleum based substances and salts from local road runoff.



Marina



Neenah Slough

Lake Winnebago suffers from low water quality and blue-green algae blooms. Blue-green algae may cause a toxin that is dangerous to health. The Neenah Slough is one of the major northern pike spawning areas adjacent to Little Lake Butte des Morts. Both summer and winter fish kills have occurred in the slough. The stream is negatively impacted by stormwater discharges which carries high levels of ~~polluted~~ sediments.

Most of the City falls within a high water recharge area. Protecting infiltration areas from impermeable development will help

maintain the drinking water supply for the surrounding areas and will benefit the quality and quantity of Lake Winnebago surface water. New development within these areas should be designed to utilize best management practices that will encourage or enhance groundwater infiltration.

Wetlands provide important benefits in maintaining water quality, minimizing potential flooding, and providing habitat for a variety of native wildlife species. Generally wetlands are associated with the Neenah Slough, Lake Winnebago and Little Lake Butte des Morts. Wetlands buffers should be enacted that protect wetlands based on the function of the wetland.

High groundwater can impact building foundations, utility and street construction and other factors. High groundwater of less than two feet is found in about 68 percent of the City.

Issues and Opportunities:

- Water clarity in Lake Winnebago is low and the lake suffers from blue-green algae blooms in summer months.
- The Neenah Slough is impacted by storm sewer discharges, which carries high levels of ~~polluted~~ sediments.
- The depth to groundwater is less than two feet within 68 percent of the City.
- Encourage or enhance groundwater infiltration in high water recharge areas of the City.
- Adopt a wetland buffer to further protect wetlands.

Wildlife Resources

Woodlands are fragmented or limited in the City and surrounding areas. Care must be taken in the selection of trees for use in the City, including those used in landscaping, parks and open spaces and along the street. Street trees are subject to stress from soil compaction, heat, drought, lack of root space, salt and road pollutants and air quality. As a result, the life of a street tree is only a fraction of its potential life span. City trees should be diverse to guard against large scale devastation by both native and introduced pests.



Impacts of climate change are being felt within the City of Neenah. Average temperatures are already warmer; this is especially true for both winter and nighttime temperatures. Neenah lies within the tension zone and is at the juncture of two different plant communities. As temperatures continue to rise, the tension zone may shift north. This may cause plant ranges to also shift north, impacting the species of trees and plants native to the Neenah area.



Wilderness Park

Non-native aquatic and terrestrial plants and animals, or exotic species are a major threat to native habitats and the species that utilize those habitats. These species displace native species, disrupt ecosystems and affect peoples' livelihood and quality of life.

Issues and Opportunities:

- Wildlife is threatened by the negative effects of development and stormwater runoff (both from urban and rural runoff sources).
- City trees are negatively impacted by urban and environmental factors, and native and introduced pests.
- Climate change may impact the species of trees native to the Neenah area.
- Non-native species are a major threat to native habitats and the species that utilize these habitats.

Parks, Open Space and Recreational Resources

Environmental corridors are continuous systems of open space created by natural linkages of environmentally sensitive areas. They provide protective routes of travel for a variety of wildlife and bird species. Important environmental corridors within the City and surrounding area are associated with the Neenah Slough corridor and the unnamed streams with natural vegetation scattered throughout the area.

Issues and Opportunities:

- Protect important environmental corridors within the City.

Cultural Resources

Cultural resources such as historic buildings, sites, structures, objects, archeological sites and districts define the City unique character and heritage. There are 27 properties / districts within the City of Neenah that are listed on the National Register of Historic Places. However this directory is not static and therefore there may be other properties in Neenah that may be eligible or become eligible over time.

There are many different types of museums, some preserve valuable historic artifacts and local history, while others showcase collections of fine arts, glass, gems and minerals. Most museums provide learning opportunities and community enjoyment. Within the City of Neenah, there are five museums.



Issues and Opportunities:

- The National Register is not a static inventory and properties currently not listed in the City of Neenah may become eligible.

VISION, GOALS, OBJECTIVES AND RECOMMENDATIONS

Vision Statement: *Neenah values its natural, cultural and historical resources and promotes preservation of these resources in collaboration with development and redevelopment of the City.*

Agricultural Resources

Goal AG 1: Recognize the economic viability of the area's agricultural community.

Objective AG 1.1: Identify the most productive farmland for continued agricultural activities within the City's extraterritorial area.

- Recommendation AG 1.1.1: Promote infill and redevelopment within the City. (See recommendation LU 1.7.10)
- Recommendation AG 1.1.2: Work with local economic development groups to encourage the establishment of businesses in the City that would support the agricultural economy.

Goal AG 2: Encourage urban farming activities within the City limits.

Objective AG 2.1: Provide access to locally grown products.

- Recommendation AG 2.1.1: Support Future Neenah, Inc. efforts to provide an outdoor and indoor farm market.
- Recommendation AG 2.1.2: Support current ~~and future~~ community gardens in the City.
- Recommendation AG 2.1.3: Partner with churches, schools, businesses, non-profits and others to sponsor community and neighborhood garden plots.
- ~~Recommendation AG 2.1.4: Adopt an ordinance to allow residents and businesses within the City to keep honey bees.~~
- Recommendation AG 2.1.54: Encourage Neenah Joint School District to utilize local food in their school hot lunch program.
- Recommendation AG 2.1.65: Review the zoning ordinance to determine limitations that might affect the siting of community gardens and other urban gardening uses. Identify regulations that would support community gardens throughout the City. (See recommendation LU 1.9.1)

Formatted: Strikethrough

Commented [BS1]: Completed

Formatted: Strikethrough



- Recommendation AG 2.1.~~76~~⁷⁷: Identify City owned properties that may be viable sites for community and / or neighborhood gardens.
- Recommendation AG 2.1.~~87~~⁸⁸: Consider expanded urban farming practices.

Natural Resources

Goal NR 1: Protect and preserve the natural resources of the City and surrounding areas.

Objective NR 1.1: Protect environmentally sensitive areas.

- Recommendation NR 1.1.1: Continue on-going regulatory control over wetlands and floodplain areas, shoreland protection areas, and other environmentally sensitive areas. (See recommendation IO 1.3.2)
- Recommendation NR 1.1.2: Update the source (reference) in Chapter 22 Environmental Control, Sec. 22-216 – Shoreland-wetland zoning maps. The most recent version of the Wisconsin Wetland Inventory as depicted on the Department of Natural Resources Surface Water Data Viewer should be referenced. Review references to other maps, for example the effective date for most recent version FEMA map for the City of Neenah is 03/17/2003.
- Recommendation NR 1.1.3: Encourage the protection of existing woodland and wetland areas in the west and south side growth areas. (See recommendation LU 1.10.1)
- Recommendation NR 1.1.4: Create a wetland mitigation bank.

Objective NR 1.2: Maintain a diverse and quality urban forest.

- Recommendation NR 1.2.1: Remain actively involved with the Arbor Day Foundation, promoting activities that educate the public about the benefits of trees in an urban setting.
- Recommendation NR 1.2.2: Continue to encourage a tree planting policy along major road corridors, recognizing appropriate species and placement. Consider expanding this policy to include the planting of trees along all public streets and public areas, where appropriate. (See recommendation IO 1.2.5)
- Recommendation NR 1.2.3: Continue to actively participate in the Northeast Wisconsin Urban Forestry Work Group.
- Recommendation NR 1.2.4: Work with and support the WDNR to control the spread of diseases and insects that threaten the resource.
- Recommendation NR 1.2.5: Develop construction recommendations that can provide tree protection during construction projects.



- Recommendation NR 1.2.6: Develop the structure for the formation of a Tree Board to oversee the management direction and budget decisions of the Community Forestry Program.
- Recommendation NR 1.2.7: Add a requirement that developers work with the City to provide diversity in the selection of trees.

Objective NR 1.3: Control invasive species in area lakes, streams, wetlands, wooded areas, parks and other natural areas.

- Recommendation NR 1.3.1: Encourage local youth and civic groups to work with the City to identify and control invasive species in public parks and open areas.
- Recommendation NR 1.3.2: Increase public awareness of its role/responsibility in introducing/containing invasive species.
- Recommendation NR 1.3.3: Support a countywide coordinated approach to deal with specific problem species on the land and the water.

Objective NR 1.4: Protect air quality.

- Recommendation NR 1.4.1: Increase opportunities for biking and walking. (See recommendations LU 1.6.1, CF 4.2.1, T 2.5.3, T 1.5.3)
- Recommendation NR 1.4.2: Increase the City's tree canopy.

Objective NR 1.5: Create recreational opportunities in and around employment centers.

- Recommendation NR 1.5.1: Encourage developers to incorporate common open space and pedestrian trails in the design and development of business and light industrial properties / parks to increase amenities and attract a quality workforce and business partners. (See recommendation LU 1.8.6)

Goal NR 2: Improve surface water quality and protect area groundwater supplies.

Objective NR 2.1: Reduce non-point nutrient runoff into the Neenah Slough, Lake Winnebago and Little Lake Butte des Morts.

- Recommendation NR 2.1.1: Encourage the use of natural surface water storage and detention facilities to control storm water runoff.
- Recommendation NR 2.1.2: The City should implement the recommendations contained in its stormwater management plan.
- Recommendation NR 2.1.3: Develop and adopt policies that require "low impact design" (LID), particularly to assist with stormwater management. (See recommendation H 3.1.2)



- Recommendation NR 2.1.4: Continue to control stormwater runoff from construction site activities and impervious surfaces.
- Recommendation NR 2.1.5: Continue to work with the Northeastern Wisconsin Stormwater Consortium (NEWSC) and the Fox-Wolf Watershed Alliance to address stormwater runoff and water quality issues.
- Recommendation NR 2.1.6: Continue to work with the WDNR to comply with the requirements of the City's MS4 permit.
- Recommendation NR 2.1.7: The Upper Fox and Wolf River Total Maximum Daily Load (TMDL) is currently being developed for phosphorus and total suspended solids. The City should comply with the requirements of the plan. (See recommendation CF 1.4.2)
- Recommendation NR 2.1.8: Support efforts to improve water quality of Lake Winnebago through management of upstream agricultural runoff.
- Recommendation NR 2.1.9: Educate Neenah residents on non-point pollution issues.
- Recommendation NR 2.1.10: Review development standards in terms of reducing impervious areas. (See recommendation LU 1.10.4)

Cultural Resources

Goal CR 1: Preserve the City's cultural and historical resources.

Objective CR 1.1: Consider opportunities for historic preservation in all future planning, zoning and development decisions.

- Recommendation CR 1.1.1: The City should continue to regard preservation and promotion of historically and architecturally significant buildings and sites as an important component in maintaining the image and character of Neenah.
- Recommendation CR 1.1.2: Recognize and support efforts of the Neenah Landmarks Commission and other local preservation groups. (See recommendation IO 1.6.1)
- Recommendation CR 1.1.3: Develop a comprehensive preservation strategy to better define common goals, roles and responsibilities of all interested groups, individuals, and property owners. (See recommendation IO 1.6.2)
- Recommendation CR 1.1.4: Consider cultural resources and historic preservation in future land use planning and development decisions.
- Recommendation CR 1.1.5: Seek input from the Landmarks Commission, the Neenah Historical Society and others when making decisions that involve existing historical sites, structures and areas.



Objective CR 1.2: Promote and celebrate Neenah's history and the importance of historic preservation.

- Recommendation CR 1.2.1: Continue to work with the Neenah Historical Society, Future Neenah, the Neenah Public Library, the Neenah Joint School District and others on educational programs for adults and children that provide an appreciation of local history.
- Recommendation CR 1.2.2: Encourage the development of a program that will provide an opportunity for seniors to share stories of local history with school children and others.
- Recommendation CR 1.2.3: Update the 2004 list of eligible properties and districts for inclusion in the National Register of Historic Places. Encourage property owners of newly identified properties to prepare an application to be added to the National Register of Historic Places. (See recommendation IO 1.6.3)
- Recommendation CR 1.2.4: Develop ~~a promotional pamphlets and other material~~ documenting Neenah's rich history.

Formatted: Strikethrough

Goal CR 2: Encourage cultural, artistic and entertainment opportunities.

Objective CR 2.1: Support and expand opportunities to bring entertainment, cultural events and art to the City.

- Recommendation CR 2.1.1: Work with the Neenah Historical Society to increase awareness of local history and the museum by providing a pedestrian connection between the Hiram Smith Octagon House and the downtown area. This could include the construction of a walking /biking trail between the museum, downtown and Loop the Little Lake Trail. (See recommendation LU 1.6.1)
- Recommendation CR 2.1.2: Investigate opportunities to expand art in the City.
- Recommendation CR 2.1.3: Continue to support and encourage Neenah organizations to provide concerts, social and historical events.
- Recommendation CR 2.1.4: Consider expanding cultural, artistic and entertainment opportunities in the downtown.
- Recommendation CR 2.1.5: Work with local non-profits to encourage heritage tourism and the promotion of the Fox River.
- Recommendation CR 2.1.6: Support the Riverside Players, the Neenah Community Band and others.



Page intentionally left blank.