

# COMMUNITY PROFILE

## **VILLAGE OF WINNEBAGO**

Papio-Missouri River NRD  
Multi-Jurisdictional Hazard Mitigation Plan Update

2021

## Local Planning Team

**Table WIN.1: Winnebago Local Planning Team**

NAME	TITLE	JURISDICTION
<b>MATT MAY</b>	Emergency Manager	Village of Winnebago
<b>AUDRIENNA LIVERING</b>	Revenue Clerk	Village of Winnebago
<b>RON WHITE BEAR</b>	Board Member	Village of Winnebago

## Location and Geography

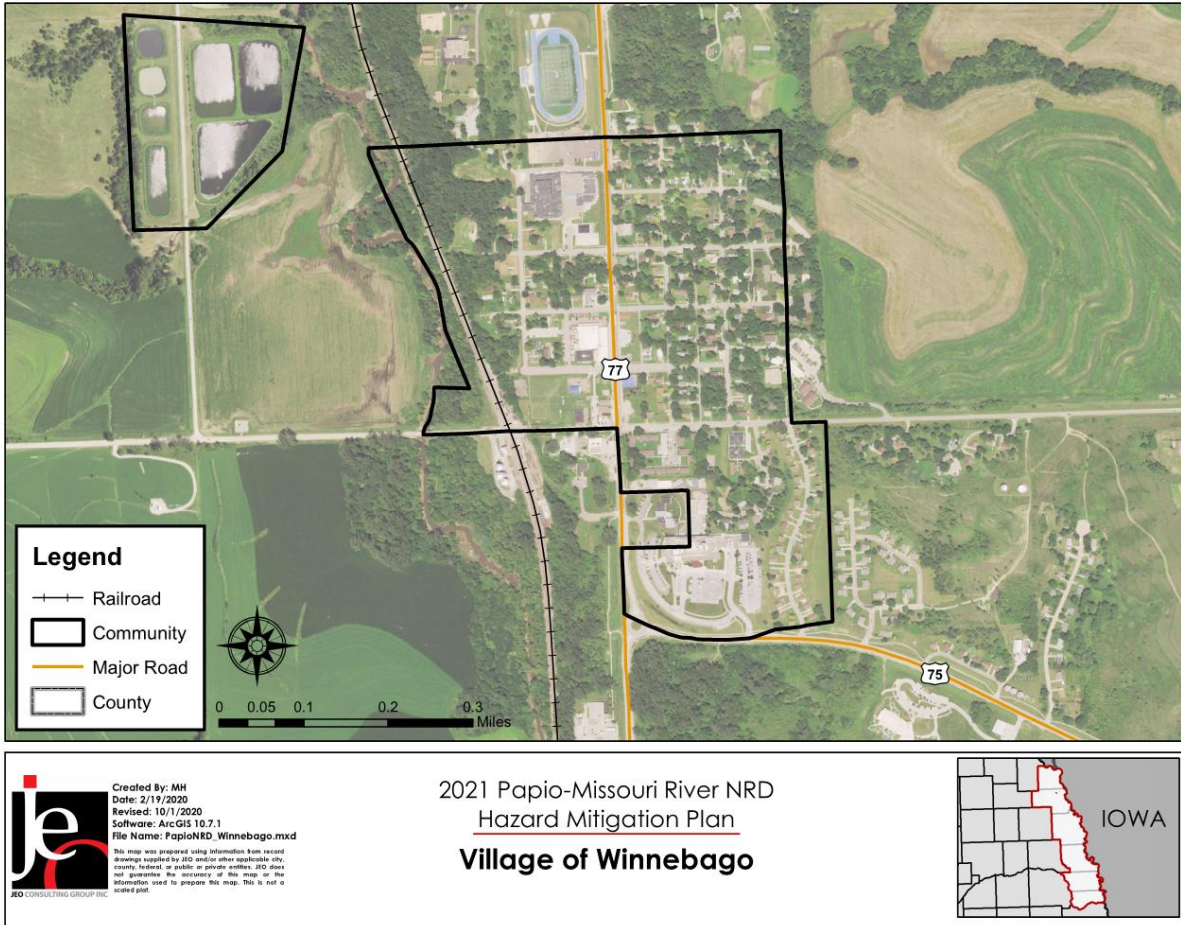
The Village of Winnebago is located in the north-central portion of Thurston County and covers an area of 0.20 square miles. The village is located entirely within the Winnebago Indian Reservation. The major waterway in Winnebago is the Omaha Creek.

## Transportation

Winnebago's major transportation corridors include U.S. Highways 77 and 75, which merge south of town. Highway 77 has 6,770 vehicles on average per day with 845 of them being heavy commercial vehicles. County D Avenue is the primary route used to travel east/west through the village but is unpaved.

The Burlington Northern Santa Fe also has a rail line that travels north and south on the west side of the village. The local planning team noted hazardous chemicals are regularly transported along these routes, but it is not known which chemicals and the quantity being transported daily. At least one derailment from the rail line has occurred outside of the village. Primary concerns stem from the proximity of major routes and creeks near the village due to potential contamination. Transportation information is important to hazard mitigation plans because it suggests possible evacuation corridors in the community, as well as areas more at risk to transportation incidents.

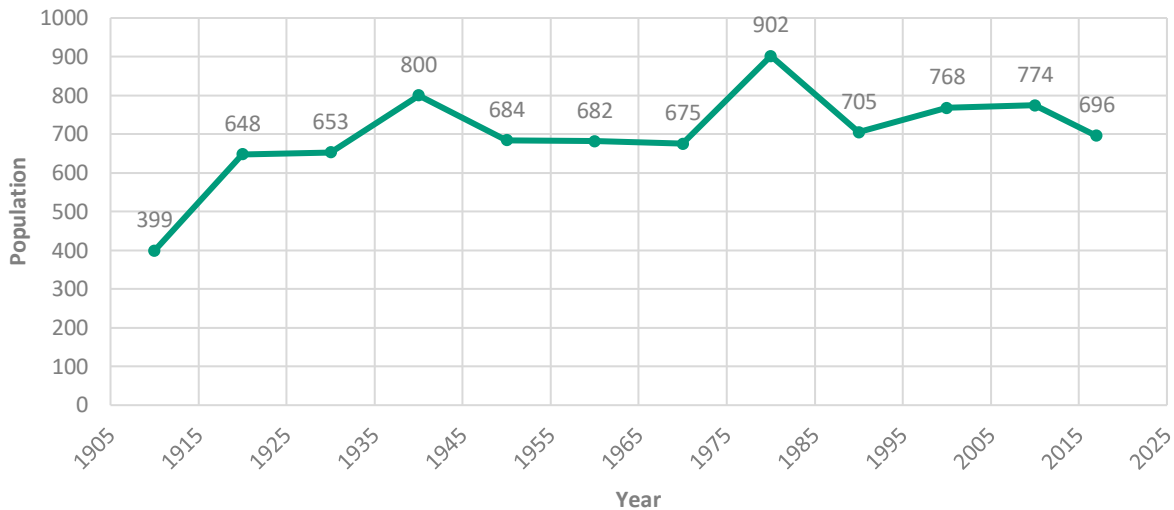
**Figure WIN.1: Village of Winnebago**



## Demographics

The population of Winnebago has remained relatively stable since the early 1900s. According to the U.S. Census Bureau the current estimated population in 2017 was 696. However, the local planning team indicated the Village’s population is closer to 1,000 residents and potential errors in the census are due to the proportion of tribal members that live within the village. The population of Winnebago increased from 2010 to 2015 due to an annexation of the Ho Chunk Village on the north side of Winnebago. Winnebago’s population accounted for approximately 10% percent of Thurston County’s population in 2017.<sup>1</sup>

<sup>1</sup> United States Census Bureau. “2017 American Fact Finder: S0101: Age and Sex.” [database file]. <https://factfinder.census.gov/>.

**Figure WIN.2: Estimated Population 1910 – 2017**

Source: U.S. Census Bureau<sup>2</sup>

The young, elderly, minorities, and poor may be more vulnerable to certain hazards than other groups. In comparison to the County, Winnebago's population was:

- **Younger.** The median age of Winnebago was 24.3 years old in 2017, compared with the County average of 28.1 years. Winnebago's population has grown older since 2010, when the median age was 17.8 years old. Winnebago had a smaller proportion of people under 20 years old (32.7%) than the County (38.5%).<sup>3</sup>
- **More ethnically diverse.** Winnebago is a predominately American Indian community. In 2010 97% of the population was American Indian and Alaskan Native, 1% was White, and 1% was two or more races. By 2017 the estimated population was 88% American Indian, 5% White, and 6% two or more races. In comparison, Thurston County's population went from 55% to 57% American Indian, 1% Asian, and 4% to 2% two or more races from 2010 to 2017 respectively.<sup>4</sup>
- **More likely to be at the federal poverty line.** The poverty rate in Winnebago (38.2% of all persons living below the federal poverty line) is higher than the County's poverty rate (30.5%) in 2017.<sup>5</sup>

## Employment and Economics

The Village's economic base is a mixture of industries. In comparison to Thurston County, Winnebago's economy had:

- **Different mix of industries.** Employment sectors accounting for 10% or more of employment in Winnebago included Educational Services, Arts and Entertainment, and Public Administration; while Thurston County's employment sectors included Educational Services and Public Administration in 2017.<sup>6</sup>

<sup>2</sup> United States Census Bureau. "2017 American Fact Finder: S0101: Age and Sex." [database file]. <https://factfinder.census.gov>.

<sup>3</sup> United States Census Bureau. "2017 American Fact Finder: S0101: Age and Sex." [database file]. <https://factfinder.census.gov>.

<sup>4</sup> United States Census Bureau. "2017 American Fact Finder: DP05: ACS Demographic and Housing Estimates." [database file]. <https://factfinder.census.gov/>.

<sup>5</sup> United States Census Bureau. "2017 American Fact Finder: DP03: Selected Economic Characteristics." [database file]. <https://factfinder.census.gov/>.

<sup>6</sup> United States Census Bureau. "2017 American Fact Finder: DP03: Selected Economic Characteristics." [database file]. <https://factfinder.census.gov/>.

- **Lower household income.** Winnebago's median household income in 2017 (\$19,803) was about \$24,900 lower than the County (\$44,701).<sup>7</sup>
- **Fewer long-distance commuters.** About 77.0% percent of workers in Winnebago commuted for fewer than 15 minutes, compared with about 56.9% of workers in Thurston County. About 14.9% of workers in Winnebago commute 30 minutes or more to work, compared to about 18.1% of the County workers.<sup>8</sup>

### Major Employers

Major employers for the Village include: HIS Winnebago Hospital, Winnebago Village, Winnebago Tribe, Ho Chunk Incorporated, Winnebago Schools, and the WinnaVegas Casino. Some residents commute to Dakota City or other areas within the reservation for employment as well.

## Housing

In comparison to Thurston County, Winnebago's housing stock was:

- **Less owner occupied.** About 29.3% of occupied housing units in Winnebago are owner occupied compared with 59.9% of occupied housing in Thurston County in 2017.<sup>9</sup>
- **Smaller share of aged housing stock.** Winnebago has a lower share of housing built prior to 1970 than the county (31.6% compared to 41.0%).<sup>10</sup>
- **More multi-family homes.** The predominant housing type in the Village is single family detached and Winnebago contains more multifamily housing with five or more units per structure than the County (13.2% compared to 7.8%). About 60.4% of housing in Winnebago was single-family detached, compared with 79.3% of the County's housing. Winnebago has a larger share of mobile and manufactured housing (7.6%) compared to the County (5.7%).<sup>11</sup> There are approximately five to six mobile homes located throughout the Village. Current zoning ordinances do not allow additional mobile homes to be built or placed in the village.

Ho Chunk Incorporated has added a large share of available housing for the Village and surrounding tribal residents; however, additional affordable housing is still needed. Home ownership is a major concern for the local planning team. This housing information is relevant to hazard mitigation insofar as the age of housing may indicate which housing units were built prior to state building codes being developed. Further, unoccupied housing may suggest that future development may be less likely to occur. Finally, communities with a substantial number of mobile homes may be more vulnerable to the impacts of high winds, tornadoes, and severe winter storms.

## Future Development Trends

The village has seen several changes in the past five years. Developments from Ho Chunk have improved available housing in the past five years and the hospital ownership was transferred to the Winnebago Indian Tribe. New businesses include a quilt shop and the Hey Hey Girl business (local crafts). The local planning team noted an increase in overall village population which they attributed to growing family sizes and more available housing for residents.

<sup>7</sup> United States Census Bureau. "2017 American Fact Finder: DP03: Selected Economic Characteristics." [database file]. <https://factfinder.census.gov/>.

<sup>8</sup> United States Census Bureau. "2017 American Fact Finder: S0802: Means of Transportation to Work by Selected Characteristics." [database file]. <https://factfinder.census.gov/>.

<sup>9</sup> United States Census Bureau. "2017 American Fact Finder: DP04: Selected Housing Characteristics." [database file]. <https://factfinder.census.gov/>.

<sup>10</sup> United States Census Bureau. "2017 American Fact Finder: DP04: Selected Housing Characteristics." [database file]. <https://factfinder.census.gov/>.

<sup>11</sup> United States Census Bureau. "2017 American Fact Finder: DP04: Selected Housing Characteristics." [database file]. <https://factfinder.census.gov/>.

In the next five years the village anticipates additional housing to be built by White Water and increased permitting for businesses including agriculture and transient vendors for the local farmers market.

## Structural Inventory and Valuation

The planning team requested GIS parcel data from the County Assessor as of December 2019. This data allowed the planning team to analyze the location, number, and value of property improvements at the parcel level. The data did not contain the number of structures on each parcel. A summary of the results of this analysis is provided in the following table. Structures in Winnebago have been removed from the floodplain via LOMA. A summary of LOMAs identified for Winnebago can be found in the table below.

**Table WIN.2: Winnebago Parcel Valuation**

NUMBER OF PARCELS	NUMBER OF IMPROVEMENTS	TOTAL IMPROVEMENT VALUE	NUMBER OF IMPROVEMENTS IN FLOODPLAIN	VALUE OF IMPROVEMENTS IN FLOODPLAIN	PERCENT OF IMPROVEMENTS IN FLOODPLAIN
202	68	\$1,583,145	5	\$69,035	7%

Source: County Assessor

**Table WIN.4: Jackson Flood Map Products**

TYPE OF PRODUCT	PRODUCT ID	EFFECTIVE DATE	DETAILS
LOMA	16-07-1623A-310223	7/28/2016	Structure removed from the SFHA
LOMA	16-07-1109A-310223	5/13/2016	Property removed from the SFHA

Source: FEMA Flood Map Service Center

## Critical Infrastructure/Key Resources

### Chemical Storage Fixed Sites

According to the Tier II System reports submitted to the Nebraska Department of Environment and Energy, there are two chemical storage sites in Winnebago that contain hazardous chemicals.

**Table WIN.5: Chemical Storage Fixed Sites**

FACILITY NAME	ADDRESS	LOCATED IN FLOODPLAIN?
WINNEBAGO ROADS SHOP	BIA Rd 3	Y
MCI	200 W Beck St	N

Source: Nebraska Department of Environment and Energy<sup>12</sup>

While no chemical spills events have been reported, local concerns exist due to the proximity of chemical fixed sites and local water ways. Other critical facilities including the drinking water treatment plant, school and hospital are also located near fixed sites and are at risk in case of significant events.

<sup>12</sup> Nebraska Department of Environment and Energy. "Search Tier II Data." Accessed November 2018. <https://deq-iis.ne.gov/tier2/search.faces>.



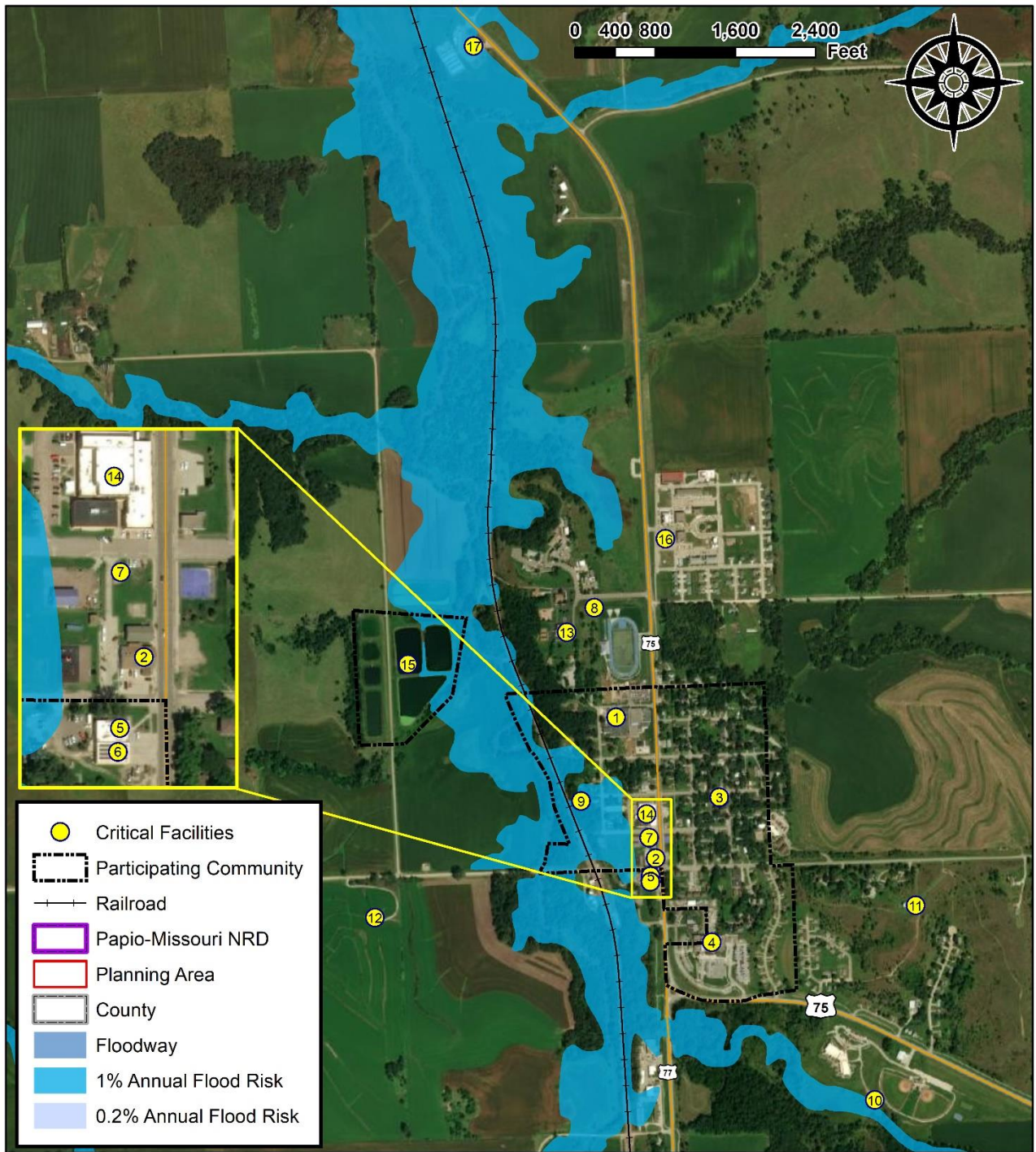
### Critical Facilities

Each participating jurisdiction identified critical facilities vital for disaster response, providing shelter to the public, and essential for returning the jurisdiction's functions to normal during and after a disaster. Critical facilities were identified during the original planning process and updated by the local planning team as a part of this plan update. The following table and figure provide a summary of the critical facilities for the jurisdiction.

**Table WIN.5: Critical Facilities**

CF NUMBER	TYPE	NAME	SHORT-TERM SHELTER (Y/N)	GENERATOR (Y/N)	FLOODPLAIN (Y/N)
1	Food, Water, Shelter	Winnebago Elementary and High School	Y	Y	N
2	Health and Medical	Winnebago Senior Citizen Center	Y	N	N
3	Safety and Security	Winnebago Village Offices/EOC	N	N	N
4	Health and Medical	Twelve Clans Winnebago Hospital	N	Y	N
5	Safety and Security	Winnebago Police Department	N	N	N
6	Safety and Security	Winnebago Fire Department	N	N	N
7	Food, Water, Shelter	Water Treatment Plant	N	Y	N
8	Food, Water, Shelter	Lift Station 1	N	N	N
9	Food, Water, Shelter	Lift Station 2	N	N	Y
10	Food, Water, Shelter	Lift Station 3	N	N	N
11	Food, Water, Shelter	Water Well and Storage Tanks	N	N	N
12	Communications	Communication Tower	N	Y	N
13	Food, Water, Shelter	St. Augustine Indian Mission School	N	N	N
14	Safety and Security	Blackhawk Community Center	N	N	N
15	Food, Water, Shelter	Lagoons	N	N	Y
16	Other	Dollar General	N	N	N
17	Food, Water, Shelter	Pony Express Grocery Market	N	N	Y

Figure WIN.3: Critical Facilities



Created By: MW  
 Date: 11/13/2020  
 Software: ArcGIS 10.7.1  
 File Name: PapioNRD\_WinnebagoCF.mxd  
 This map was prepared using information from record drawings supplied by JEO and/or other applicable city, county, federal, or public or private entities. JEO does not guarantee the accuracy of this map or the information used to prepare this map. This is not a scaled plot.

2021 Papio-Missouri River NRD  
 Hazard Mitigation Plan  
**Village of Winnebago  
 Critical Facilities**





## Historical Occurrences

See the Thurston County community profile for historical hazard events.

## Hazard Prioritization

For an in-depth discussion regarding area wide hazards, please see Section Four: Risk Assessment. The hazards discussed in detail below were either identified in the previous HMP and determined to still be of top concern or were added by the local planning team based on the identification of hazards of greatest concern, hazard history, and the jurisdiction's capabilities.

### Chemical Transportation

The local planning team identified chemical transportation spills as a top concern for the community. Although there are no reported of chemical spills according to PHMSA, the local planning team remembered a diesel leak on Beck Avenue in 2015 when a train hit a tractor. The train was carrying diesel at the time and the train car was punctured in the crash. It is a concern that the senior center is located on Highway 77 and is also close to the railroad tracks. If a spill were to occur, vulnerable populations including the elderly and school age children are of particular concern. The community participated in a large crude oil spill and explosion exercise in August 2015 which was hosted by NEMA. The local fire department is trained in the response of chemical spills. There is no local HazMat team and teams would come from either Norfolk or Omaha to assist. The local planning team indicated additional equipment and training is needed for local responders.

### Flooding

Flooding is a concern due to the delineated floodplain and localized drainage issues throughout the village. The downtown area has been identified as needing reconstruction to improve drainage from the highway, which includes Bluff Avenue, Beck Avenue, and Highway 77. In June 2010, flash flooding occurred when an inch of rain fell in under an hour, which caused streets to flood in the community. Flooding in August of 2011 was caused by the Missouri River flooding east of the community as well as some heavy rains caused Highway 77 to flood in parts between Winnebago and Walthill. These events have caused residents to evacuate or take shelter; however, no additional assistance was needed. The March 2019 flood event did not cause significant impacts to the Village. Local fire departments assisted in some evacuations for residents in reservation area but not within the village. Omaha Creek overtopped its banks approximately one mile south of the Village of Homer to the north. Waters reached the parking lots of the water plant and baseball parks, but no damages were reported. Many residents experienced damages and water intrusion in basements due to the high water table and saturated soils. Heavy rain events produce localized flash flooding throughout the village. At this time, the sewer lagoons are elevated out of the floodplain but are currently under grant negotiations for additional improvements through IHS.

The village participates in the NFIP. According to NeDNR, there are no repetitive flood loss properties in the Village of Winnebago. Thurston County does have a Flood Insurance Study dated January 6, 2010 which includes Emerson, Omaha Tribe, Pender, Rosalie, Thurston Village, Walthill, Winnebago Village, and Winnebago Tribe. The study identifies principal flood problems as from snowmelt and heavy precipitation. Sudden intense thunderstorms may produce flooding on smaller streams. Middle Creek originates in Dixon County in northeastern Nebraska. The Creek generally flows in a south-southeasterly direction until the confluence with Logan Creek approximately six miles downstream from the Village of Emerson. Unnamed Tributary originates in the high ground approximately 1 mile northeast of the Village of Emerson. Unnamed Tributary flows south-southwest through the central portion of the town along the alignment of the former

Chicago and Northwestern Railroad (C&NW). Logan Creek flows in a southeasterly direction along the northwest boundary of Pender's city limits. An Unnamed Tributary meets the creek just north State Highway 16. Low-lying areas of The Village of Pender are subject to periodic flooding caused by the overflow of Logan Creek and its tributary. The FIS notes there are no flood control works on Middle Creek or Unnamed Tributary near Emerson. Other flood protection measures present in the vicinity of the Village of Pender were completed September 9, 1999 by the USACE. This project included levee embankment and flood wall along the west bank of Logan Creek. The levee is located directly north and east of the Village of Pender. The Village of Pender is provided some flood protection from Logan Creek and the Unnamed Tributary by State Highways 9 and 16 roadway embankments. Some flood protection is also provided in the Pender area by the channel straightening project of 1918 on Logan Creek.

### **High Winds and Tornadoes**

The local planning team identified tornadoes as a concern for the community do to the close calls that the village has experienced in recent years. In the last three years, three significant tornadic storms came very close to the village, but they impacted the communities of Wayne, Macy, Walthill, and Pilger. The loss of power, property damages, and public safety are the primary concerns if a tornado was to impact the community. If many of the businesses are damaged, there could be lasting economic impacts as well. About 75% of the residents in town have access to a basement for shelter, but there are no community safe room available. Few powerlines throughout the village are buried; however, the village office and water plant have buried lines. Other lines are buried as funding allows and repairs are required. Currently the village is working on digitizing records but is in need of a formal backup system.

### **Public Health Emergency**

Public health emergency is a new hazard evaluated in the 2021 HMP update. The development of the novel corona virus in Nebraska and across the reservation has impacted the tribe locally. Positive cases of COVID-19 have occurred in Winnebago and across the Winnebago Indian Reservation, leading to illness, quarantines, and closed businesses. The Twelve Clans Hospital serves both the Village of Winnebago, Winnebago Indian Tribe, and other surrounding areas. The local planning team noted that as of September 2020, 105 cases and three fatalities had occurred from COVID-19 in the village. The village and tribe utilize the same communication protocols to share resources and spread information. A community survey and weekly Facebook live meetings have been shared and used as the primary communication tools about COVID-19 response actions and updates. Social media has been used to share information about prevention methods including wearing face masks, using hand sanitizer, wearing gloves, social distancing, and quarantine procedures.

Public health and disease outbreaks are of top concern for the village and tribe due to at risk populations and historical context. Major disease outbreaks have occurred on tribal lands in the past which have significantly impacted the health and wellbeing of members. Resources and support for adequate disease prevention and treatment is lacking.

### **Severe Thunderstorms**

Severe thunderstorms are a common occurrence in the region and is a top concern for the community. The combination of heavy rain, lightning, hail, and high winds can cause a number of issues for the village. In 2014, high winds from a severe thunderstorm caused a fireworks tent to collapse and trap people inside. There were no major injuries from the event. The community on average experiences one to two straight line wind events each year. Heavy rains from thunderstorms do flood local roads. Lightning has caused damage to water tanks and a communications tower. The water tower has lightning rods in place but experiences dozens of

strikes annually which can damage communication equipment and sensors. Roofs and gutters have been damaged by hail in the past and were replaced. The village has had several improvements to the local alert and warning siren system. One siren was replaced, and sirens are no managed by the tribe. Additional sirens are needed at Ho Chunk and Thunderhead.

The village indicated interest in exploring alternative energy resources to power critical facilities, including sirens, such as wind power. The tribe has a solar farm located on the north end of Winnebago used for tribal properties. Additionally, the tribe needs to add several critical facilities, including the water tower and radio tower, to local insurance policies.

### **Severe Winter Storms**

Winter storms are a top concern for the community. Heavy snow and blowing and drifting snow causes road closures. The local planning team noted that the village has one small grocery and fuel store and in the event of a prolonged winter storm with closed roads, residents will not have access to food. The local fire department does a check on community members when temperatures become very cold and the risk of pipes bursting is a risk. Brief power outages during winter storms do occur during severe events. There have not been structural damages to critical facilities from severe winter storms in the past. Snow removal is primarily done by the Winnebago Indian Tribe, while the Village only clears snow from village properties. Trees throughout the village are trimmed or removed as needed. The village has not experienced any major power outages. NPPD and Burt County Power districts provide power to the village.

### **Social Media Engagement**

The Papio-Missouri River NRD launched a “Would You Rather” themed social media campaign during the 2021 HMP update to garner local input on hazard priorities, residential capabilities, and action items residents would like to see the community take in the future to reduce potential impacts from hazard events.

The Village of Winnebago had no reported respondents in the campaign (based upon general zip code analysis).

## **Governance**

A community’s governance indicates the number of boards or offices that may be available to help implement hazard mitigation actions. Winnebago has a number of offices or departments that may be involved in implementing hazard mitigation initiatives. The Village is governed by a five member village board and the following offices.

- Clerk/Treasurer
- Emergency Manager
- Board Members
- Deputy Clerk
- Revenue Clerk and Assistant Revenue Clerk
- Office Associates
- Sewer/Water Manager
- Streets Manager
- Water Operator Apprentice
- Police Department
- Fire Department

**Capability Assessment**

The capability assessment consisted of a Capability Assessment Survey completed by the jurisdiction and a review of local existing policies, regulations, plans, and the programs. The survey is used to gather information regarding the jurisdiction’s planning and regulatory capability; administrative and technical capability; fiscal capability; and educational and outreach capability.

**Table WIN.6: Capability Assessment**

SURVEY COMPONENTS/SUBCOMPONENTS		YES/NO
<b>PLANNING &amp; REGULATORY CAPABILITY</b>	Comprehensive Plan	Yes
	Capital Improvements Plan	Yes
	Economic Development Plan	No
	Emergency Operational Plan	Yes (County)
	Floodplain Management Plan	No
	Storm Water Management Plan	No
	Zoning Ordinance	Yes
	Subdivision Regulation/Ordinance	No
	Floodplain Ordinance	Yes
	Building Codes	Yes
	National Flood Insurance Program	Yes
	Community Rating System	No
	Other (if any)	
	<b>ADMINISTRATIVE &amp; TECHNICAL CAPABILITY</b>	Planning Commission
Floodplain Administration		No
GIS Capabilities		Yes
Chief Building Official		No
Civil Engineering		Yes (Contracted)
Local Staff Who Can Assess Community's Vulnerability to Hazards		Yes
Grant Manager		No
Mutual Aid Agreement		Yes
Other (if any)		
<b>FISCAL CAPABILITY</b>	Capital Improvement Plan/ 1 & 6 Year plan	Yes
	Applied for grants in the past	Yes
	Awarded a grant in the past	No
	Authority to Levy Taxes for Specific Purposes such as Mitigation Projects	Yes
	Gas/Electric Service Fees	Yes
	Storm Water Service Fees	No
	Water/Sewer Service Fees	Yes
	Development Impact Fees	No
	General Obligation Revenue or Special Tax Bonds	No
	Other (if any)	



SURVEY COMPONENTS/SUBCOMPONENTS		Yes/No
<b>EDUCATION &amp; OUTREACH CAPABILITY</b>	Local citizen groups or non-profit organizations focused on environmental protection, emergency preparedness, access and functional needs populations, etc. Ex. CERT Teams, Red Cross, etc.	Yes
	Ongoing public education or information program (e.g., responsible water use, fire safety, household preparedness, environmental education)	Yes
	Natural Disaster or Safety related school programs	No
	StormReady Certification	No
	Firewise Communities Certification	No
	Tree Village USA	No
	Other (if any)	

OVERALL CAPABILITY	LIMITED/MODERATE/HIGH
<b>FINANCIAL RESOURCES NEED TO IMPLEMENT MITIGATION PROJECTS</b>	Limited
<b>STAFF/EXPERTISE TO IMPLEMENT PROJECTS</b>	Moderate
<b>COMMUNITY SUPPORT TO IMPLEMENT PROJECTS</b>	Moderate
<b>TIME TO DEVOTE TO HAZARD MITIGATION</b>	Limited

### Plan Integration

The Local Emergency Operations Plan (LEOP) for Winnebago, which was last updated in 2016 and will be updated again in 2021, is an annex of Thurston County's LEOP. The plan is an all-hazards plan and provides clear assignment of responsibility in case of an emergency, communication channels and contacts lists, and shelter locations.

The village's comprehensive plan does not address natural hazards; however, the village falls within the Winnebago Indian Reservation which is currently updating a reservation wide Comprehensive Plan which will be completed by fall of 2021. The floodplain ordinance has established requirements for limited development in the floodplain and the village uses the International Building Codes. The village currently has no other plans which incorporate hazard mitigation principles.

### Plan Maintenance

Hazard Mitigation Plans should be living documents and updated regularly to reflect changes in hazard events, priorities, and mitigation actions. These updates are encouraged to occur after every major disaster event, alongside community planning documents (i.e. annual budgets and Capital Improvement Plans), during the fall before the HMA grant cycle begins, and/or prior to other funding opportunity cycles begin including CDBG, Water Sustainability Fund, Revolving State Fund, or other identified funding mechanisms.

The local planning team is responsible for reviewing and updating this community profile as changes occur or after a major event. Specifically, the local planning team will review the plan no less than annually and will include the public in the review and revision process by: holding public meetings, virtual meetings (as needed), social media outreach, newspapers, and bulletin board postings. All public outreach is sent through the Winnebago Tribe's communications department which in turn disperses information to the public.

## Mitigation Strategy

### Completed Mitigation Actions

MITIGATION ACTION		ALERT/WARNING SIRENS
DESCRIPTION	Perform an evaluation of existing alert sirens in order to determine sirens which should be replaced or upgraded. Install new sirens where lacking and remote activation.	
HAZARD(S)	All hazards	
STATUS	One siren previously owned by the Village was fully updated and is now managed by the Winnebago Indian Tribe.	

### New Mitigation Actions

MITIGATION ACTION		ALERT SIRENS
DESCRIPTION	Install new sirens with redundant power (solar) at Ho Chunk and Thunderway housing divisions	
HAZARD(S)	All hazards	
ESTIMATED COST	\$50,000-\$75,000	
FUNDING	General Fund, HMA	
TIMELINE	2-5 years	
PRIORITY	High	
LEAD AGENCY	Emergency Management	
STATUS	This is a new mitigation action. This would be a joint project with the Winnebago Indian Tribe.	

MITIGATION ACTION		DISPLAY SIGNAGE
DESCRIPTION	Purchase signage equipment to inform residents of hazardous conditions, road closures, or other information as needed	
HAZARD(S)	All hazards	
ESTIMATED COST	\$15,000+	
FUNDING	General Fund, HMA	
TIMELINE	1-2 years	
PRIORITY	High	
LEAD AGENCY	Clerk, Emergency Manager	
STATUS	This is a new mitigation action.	

**Continued Mitigation Actions**

<b>MITIGATION ACTION</b>		<b>BACK-UP POWER GENERATOR</b>
<b>DESCRIPTION</b>	Provide a portable or stationary source of backup power to redundant power supplies, municipal wells, lift stations, and other critical facilities and shelters.	
<b>HAZARD(S)</b>	All hazards	
<b>ESTIMATED COST</b>	\$50,000+	
<b>FUNDING</b>	General funds, HMGP, BRIC	
<b>TIMELINE</b>	2-5 years	
<b>PRIORITY</b>	Medium	
<b>LEAD AGENCY</b>	Emergency Management	
<b>STATUS</b>	This project has not yet been started. A generator is needed at the village office.	

<b>MITIGATION ACTION</b>		<b>CURFEW SIREN</b>
<b>DESCRIPTION</b>	Install a curfew siren for use by the police department during civil disorder or other emergencies. Update existing siren tones to include a curfew signal.	
<b>HAZARD(S)</b>	All hazards (specifically to address civil disorder)	
<b>ESTIMATED COST</b>	\$20,000 each	
<b>FUNDING</b>	General funds	
<b>TIMELINE</b>	1-2 years	
<b>PRIORITY</b>	Low	
<b>LEAD AGENCY</b>	Police Department	
<b>STATUS</b>	This project has not yet been started.	

<b>MITIGATION ACTION</b>		<b>INSTALL RAILROAD CROSSING ARMS</b>
<b>DESCRIPTION</b>	Install crossing arms at all railroad crossing to reduce transportation accidents	
<b>HAZARD(S)</b>	Chemical Spills	
<b>ESTIMATED COST</b>	Unknown	
<b>FUNDING</b>	General funds, Railroad company	
<b>TIMELINE</b>	1-3 years	
<b>PRIORITY</b>	High	
<b>LEAD AGENCY</b>	Emergency Management, County Roads Department	
<b>STATUS</b>	One crossing owned by the tribe on E Avenue has been installed. Additional arms are needed at B Avenue (tribal land) and on D Avenue (Village land).	

MITIGATION ACTION		STORM SHELTERS/SAFE ROOMS
DESCRIPTION	Design and construct storm shelters and safe rooms in highly vulnerable areas.	
HAZARD(S)	Tornados, Severe Thunderstorms, High Winds	
ESTIMATED COST	\$200-\$300/sf stand alone; \$150-200/sf addition/retrofit	
FUNDING	General funds, HMGP, BRIC	
TIMELINE	3-5 years	
PRIORITY	Medium	
LEAD AGENCY	Emergency Management	
STATUS	This project has not yet been started due to lack of adequate funding. The Village will evaluate local codes for new construction to include shelter locations.	

### Removed Mitigation Actions

MITIGATION ACTION		MAINTAIN GOOD STANDING WITH NFIP
DESCRIPTION	Maintain good standing with National Flood Insurance Program (NFIP) including floodplain management practices/ requirements and regulation enforcements and updates.	
HAZARD(S)	Flooding	
REASON FOR REMOVAL	While the community will continue to participate in the NFIP, this project can be removed as it is considered an ongoing effort.	