

HENNEPIN COUNTY
MINNESOTA

**2024 HENNEPIN COUNTY
MULTI-JURISDICTIONAL
HAZARD MITIGATION PLAN**

**VOLUME 1
Background and County Profile**

01 February 2024

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HENNEPIN COUNTY EMERGENCY MANAGEMENT

1600 Prairie Drive, Medina, Minnesota 55304

February 1, 2024

On behalf of Hennepin County Emergency Management (HCEM), we are pleased to present the 2024 Hennepin County Multi-Jurisdictional Hazard Mitigation Plan.

The purpose of this plan is to identify the Counties major hazards, assess the vulnerability, and to reduce risk using a variety of data and best practice measures to implement mitigation projects. This plan identifies goals, objectives, recommended actions, and costs by reviewing and working on initiatives with each county jurisdiction or partner to reduce and/prevent injury and damage from hazardous events. The intent of the Plan is to provide unified guidance for coordinating mitigation efforts prior to or following a major emergency/disaster by implementing an on-going comprehensive county hazard mitigation strategy intended to reduce the impact of loss of life and property due to effects of natural hazards.

Through continued collaboration with each jurisdiction by providing staff expertise, support, training and education opportunities, Hennepin County Emergency Management will continue to increase its resiliency to minimize the effects of natural hazards.

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TABLE OF CONTENTS - VOLUME 1

| | |
|--|-----------|
| TABLE OF CONTENTS | 5 |
| SECTION 1: INTRODUCTION | 9 |
| 1.1. PLAN DESCRIPTION AND REQUIREMENTS | 9 |
| SECTION 2: PLAN PURPOSE, AUTHORITY AND ADOPTION | 11 |
| 2.1. AUTHORITY..... | 11 |
| 2.2. SCOPE | 11 |
| 2.3. PURPOSE..... | 11 |
| 2.4. ADOPTION | 11 |
| SECTION 3: PLANNING PROCESS | 13 |
| 3.1. WHY PREPARE THIS PLAN- THE BIG PICTURE..... | 13 |
| 3.2. HENNEPIN COUNTIES RESPONSE TO THE DMA | 14 |
| 3.3. PURPOSE FOR PLANNING | 14 |
| 3.4. WHO WILL BENEFIT FROM THIS PLAN | 14 |
| 3.5. PLAN UPDATE - THE PLANNING PROCESS..... | 15 |
| 3.6. PLAN ORGANIZATIONAL CHANGES | 17 |
| 3.7. WHY PLAN | 18 |
| 3.8. THE UPDATED PLAN- WHAT IS DIFFERENT..... | 18 |
| 3.9. SUMMARY OF PREVIOUS PLANNING EFFORTS..... | 18 |
| 3.10. ORGANIZATION OF THE PLAN | 19 |
| 3.11. PLANNING OBJECTIVES..... | 20 |
| 3.12. ESTABLISH A REGIONAL REVIEW WORKING GROUP | 20 |
| 3.13. FORMING A MITIGATION PLANNING TEAM | 21 |
| 3.14. COORDINATE WITH OTHER AGENCIES..... | 22 |
| 3.15. REVIEW OF EXISTING PROGRAMS..... | 22 |
| 3.16. PLAN DEVELOPMENT CHRONOLOGY/MILESTONES | 23 |
| 3.17. DEVELOP A RISK ASSESSMENT..... | 25 |
| 3.18. HCEM REGIONAL EMERGENCY MANAGEMENT PLANNING REFERENCE COLLECTION | 25 |
| 3.19. PUBLIC INVOLVEMENT-ENGAGING THE PUBLIC..... | 27 |
| 3.20. STRATEGIES TO INFORM THE PUBLIC..... | 27 |
| 3.21. SOCIAL MEDIA AND DIGITAL MEDIA PRESS RELEASE | 29 |

| | |
|--|-----------|
| 3.22. SURVEY QUESTIONNAIRE | 31 |
| 3.23. PUBLIC INVOLVEMENT RESULTS | 31 |
| 3.24. STAKEHOLDER AND PUBLIC INVOLVEMENT PLAN | 31 |
| 3.25. GOALS FOR STAKEHOLDER AND PUBLIC INVOLVEMENT | 31 |
| 3.26. OUTREACH ACTIVITIES AND PARTICIPATION | 32 |
| SECTION 4: COUNTY PROFILE | 33 |
| 4.1. HENNEPIN COUNTY GENERAL INFORMATION..... | 33 |
| 4.2. PHYSICAL FEATURES..... | 34 |
| 4.3. DIVERSITY | 35 |
| 4.4. INCOME | 35 |
| 4.5. EMPLOYMENT | 36 |
| 4.6. INFRASTRUCTURE | 37 |
| 4.7. LANDCOVER..... | 37 |
| 4.8. WATERSHEDS | 38 |
| 4.9. SCHOOL DISTRICTS..... | 38 |
| 4.10. FUTURE COMMUNITY TRENDS FOR 2040..... | 39 |
| SECTION 5: COMMUNITY CAPABILITY ASSESSMENT | 43 |
| 5.1. COMMUNITY PLANNING TOOL ASSESSMENT | 43 |
| 5.2. PARTICIPATION IN THE NATIONAL FLOOD INSURANCE PROGRAM..... | 49 |
| 5.3. NATIONAL FLOOD INSURANCE PROGRAM IN MINNESOTA..... | 49 |
| 5.4. REPETITIVE LOSS PROPERTIES..... | 53 |
| 5.5. COMMUNITY RATING SYSTEM (CRS)..... | 54 |
| SECTION 6: HAZARD MITIGATION PLAN MAINTENANCE..... | 57 |
| 6.1. MONITORING, EVALUATING AND UPDATING PLAN..... | 57 |
| 6.2. FIVE YEAR REVISION PROCEDURE | 59 |
| 6.3. PUBLIC INVOLVEMENT..... | 59 |
| 6.4. IMPLEMENTATION OF THE HMP THROUGH EXISTING PROGRAMS AND PLANS | 60 |
| SECTION 7: APPENDICES | 63 |
| APPENDIX A: REGIONAL REVIEW WORKING GROUP MEETING MINUTES | 63 |
| APPENDIX B: SOCIAL MEDIA AND DIGITAL MEDIA PRESS RELEASE | 67 |
| APPENDIX C: SURVEY QUESTIONNAIRE | 73 |

| | |
|--|-----|
| APPENDIX D: COMMUNITY MAP SERIES..... | 93 |
| 1. BODIES OF WATER | |
| DAM LOCATIONS | 93 |
| FLOOD HAZARD AREAS | 94 |
| PUBLIC WATER AND WATERCOURSE INVENTORY | 95 |
| WATERSHED DELINEATION PROJECT..... | 96 |
| WATERSHED MANAGEMENT ORG AND WATERSHED DISTRICT ... | 97 |
| 2. GEOGRAPHY | |
| LANDCOVER CLASSIFICATION SYSTEM (MLCCS)..... | 98 |
| DIGITAL ELEVATION MODEL | 99 |
| KARST LANDFORM | 100 |
| LANDSLIDES | 101 |
| 3. INCOME AND POVERTY | |
| INCOME BELOW FEDERAL POVERTY LEVEL | 102 |
| MEDIAN INCOME HOUSEHOLD | 103 |
| CHILD POPULATION UNDER 18 LIVING BELOW POVERTY LEVEL.. | 104 |
| 4. POPULATION | |
| BLACK OR AFRICAN-AMERICAN POPULATION | 105 |
| AMERICAN INDIAN AND ALASKA NATIVE POPULATION..... | 106 |
| ASIAN POPULATION..... | 107 |
| WHITE POPULATION | 108 |
| NATIVE HAWAIIAN AND PACIFIC ISLANDER POPULATION | 109 |
| HISPANIC OR LATINO POPULATION..... | 110 |
| SOME OTHER RACE POPULATION | 111 |
| TWO OR MORE RACE POPULATION | 112 |
| LANGUAGE- (AGE +5) TWO OR MORE LANGUAGES AT HOME | 113 |
| MN DEPT OF EDUCATION- SCHOOL DISTRICTS..... | 114 |
| APPENDIX E: GROWTH TREND SUMMARIES | 115 |

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| SECTION 1 | INTRODUCTION |
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Across the United States, natural and manmade disasters have led to increasing levels of death, injury, property damage, and interruption of business and government services. The impact on families and individuals can be immense and damages to businesses can result in regional economic consequences. The time, money, and effort to respond to and recover from these disasters divert public resources and attention from other important programs and problems.

Hennepin County is vulnerable to a variety of potential hazards. With seven Presidential Disaster Declarations since 2010, Hennepin County recognizes the consequences of disasters and the need to reduce the impacts of natural and manmade hazards. This HMP focuses primarily on natural hazard.

The elected and appointed officials of the County also know that with careful selection, mitigation actions in the form of projects and programs can become long-term, cost-effective means for reducing the impact of natural and manmade hazards.

The 2024 *Hennepin County Multi-Jurisdictional Hazard Mitigation Plan* (HMP or the Plan) for Hennepin County, Minnesota, was prepared with input from the Mitigation Planning Regional Review Committee, the Hennepin County Emergency Management (HCEM) Planning cell, county residents, responsible officials, other HCEM department members, the state hazard mitigation officer, and in accordance with Federal Emergency Management Agency (FEMA).

The process to develop the HMP included a year of coordination and collaboration with representatives from all the jurisdictions in Hennepin County. The HMP will guide the County toward paying down risk, greater disaster resistance in harmony with the character, and needs of the community.

This section of the HMP includes an overview of the Plan, a discussion of the Plan’s purpose and authority, and a description of the 45 incorporated cities, the Minneapolis/St. Paul Airport, and the Fort Snelling unincorporated portion of the County.

1.1.1. PLAN DESCRIPTION AND REQUIREMENTS

Federal legislation has historically provided funding for disaster relief, recovery, and some hazard mitigation planning. The Disaster Mitigation Act of 2000 (DMA 2000) is the latest legislation to improve this planning process (Public Law 106-390). The new legislation reinforces the importance of mitigation planning and emphasizes planning for disasters before they occur. As such, DMA 2000 establishes a pre-disaster hazard mitigation program and requirements for the national post-disaster Hazard Mitigation Grant Program (HMGP).

Section 322 of DMA 2000 specifically addresses mitigation planning at the state and local levels. It identifies requirements that allow HMGP funds to be used for planning activities and increases the amount of HMGP funds available to states that have developed a comprehensive, enhanced mitigation plan prior to a disaster. States and communities must have an approved mitigation plan in place prior to receiving post-disaster HMGP funds. Local and tribal mitigation plans must demonstrate that their proposed mitigation measures are based on a sound planning process that accounts for the risk to and the capabilities of the individual communities. State governments have certain responsibilities for

2024 Hennepin County All-Jurisdiction Hazard Mitigation Plan
Volume 1- Background and County Profile

implementing Section 322, including:

- Preparing and submitting a standard or enhanced state mitigation plan.
- Reviewing and updating the state mitigation plan every three years.
- Providing technical assistance and training to local governments to assist them in applying for HMGP grants and in developing local mitigation plans; and
- Reviewing and approving local plans if the state is designated a managing state and has an approved enhanced plan.

DMA 2000 is intended to facilitate cooperation between state and local authorities, prompting them to work together. It encourages and rewards local and state pre-disaster planning and promotes sustainability as a strategy for disaster resistance. This enhanced planning network is intended to enable local and state governments to articulate accurate needs for mitigation, resulting in faster allocation of funding and more effective risk reduction projects.

FEMA prepared an Interim Final Rule (IFR), published in the Federal Register on February 26, 2002 (44 CFR Parts 201 and 206), which establishes planning and funding criteria for states and local communities. The Plan has been prepared to meet Homeland Security Emergency Management (HSEM) and FEMA requirements thus making the County eligible for funding and technical assistance from state and federal hazard mitigation programs.

FEMA also requires that this plan meet the Local Mitigation Planning Policy Guide FP 206-21-0002, released April 19, 2022, and went into effect on April 19, 2023. This policy provides 8 planning elements that address 51 standards/requirements that must be addressed for FEMA Hazard Mitigation Plan approval.

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| SECTION 2 | PLAN PURPOSE, AUTHORITY AND ADOPTION |
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2.1. AUTHORITY C1

This updated HMP complies with all requirements set forth by HSEM and the Robert T. Stafford Disaster Relief and Emergency Assistance Act, Section 104 of the Disaster Mitigation of 2000. In addition, it complies with all of FEMA’s Final Rule 44 CFR 201.6 (c)(3), which outlines criteria for approval of mitigation plans.

2.2. SCOPE

The HMP identifies 19 natural hazards that pose a threat to this county, including both incorporated and unincorporated areas, and provides goals, objectives, and a plan of action for mitigating these hazards. This plan addresses and addresses natural hazards affecting Hennepin County as determined by frequency of event, economic impact, deaths, and injuries. The plan addresses hazard risk, reviews current state and local hazard mitigation capabilities, develops mitigation strategies and identifies partner agency and other interagency working group’s actions to address mitigation needs. The plan, as agreed upon by all participating jurisdictions, assists in collaborating local mitigation plans or projects. Mitigation recommendations are provided through various federal, state, and local agency discussion and research. The HMP identifies a variety of existing literature and resources that will be used to assist participants in this plan, to succeed in their mitigation project application efforts. This is accomplished by establishing countywide mitigation strategies, providing technical resources through state, county and local agency staff expertise and support, to include, providing financial assistance through various grant programs, declarations, training and education and other jurisdiction initiatives for example partnering within community capital improvement.

2.3. PURPOSE

FEMA defines Hazard Mitigation as any sustained action taken to reduce or eliminate long-term risk to people and property from natural hazards for example, but not all-inclusive, flooding, storms, high winds, wildfires, earthquakes, etc. Mitigation efforts undertaken by communities will help reduce or eliminate damages to buildings and infrastructure, such as water supplies, sewers, and utility transmission lines, as well as natural, cultural, and historic resources.

The objective of the HMP is to rationalize the process of determining appropriate mitigation actions in protecting citizens, critical facilities, infrastructure, private property, and the surrounding environment from natural hazards. This objective can be achieved by identifying potential hazards in the jurisdiction, share information, discuss options, determine funding availability, and submit applications for qualified projects that would mitigate the effects of those hazards identified. This plan provides a framework for planning against all natural hazards in the county. The HMP can be used as a foundation beyond local mitigation plans in identifying additional collaborative partnerships in the county who wish to participate in paying down risk within their communities.

2.4. ADOPTION F1a, F2a

In 2010, the incorporated cities and Hennepin County formed an agreement which established the unification in the development of writing this plan. The Hennepin County Board of Commissioners and City Councils from each participating municipality were required to adopt the plan prior to its submittal to HSEM and FEMA for final adoption.

The Plan is intended to serve many purposes, including:

- *Enhance Public Awareness and Understanding* – to help residents of the County better understand the natural and manmade hazards that threaten public health, safety, and welfare; economic vitality; and the operational capability of important institutions.
- *Create a Decision Tool for Leadership, supervisors, or management* – to provide information that key decision makers of local government, business and industry, community associations, and other key institutions and organizations that need to take steps or actions by addressing vulnerabilities in reducing loss of life, prevent injury, and critical infrastructure damage with unforeseen future disasters.
- *Promote compliance with State and Federal Program Requirements*- to ensure that Hennepin County and its incorporated cities can take full advantage of state and federal grant programs, policies, and regulations that encourage or mandate that local governments develop comprehensive hazard mitigation plans.
- *Enhance Local Policies for Hazard Mitigation Capability*- to provide the policy basis for mitigation actions that should be promulgated by participating jurisdictions to create a more disaster resistant future.
- *Provide Inter-Jurisdictional Coordination of Mitigation-Related Programming*- to ensure that proposals for mitigation initiatives are reviewed and coordinated among participating jurisdictions within the county; and
- *Achieve Regulatory Compliance* - To qualify for certain forms of federal aid for pre and post disaster funding, local jurisdictions must comply with the federal DMA 2000 and its implementing regulations (44CFR Section 201.6). DMA 2000 intends for hazard mitigation plans to remain relevant and current. Therefore, it requires that state hazard mitigation plans are updated every three years and local plans, including Hennepin County's every five years. This means that the HMP for Hennepin County uses a "five-year planning horizon". It is designed to carry the County through a five-year term, after which its goals, objectives, and actions will be reviewed with revisions being submitted to the County Board for adoption and approval.

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| SECTION 3 | PLANNING PROCESS A |
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This section provides an overview of the planning process used to update the 2023 Hennepin County HMP. It includes who was involved in preparing the plan, how the public and stakeholders were involved, and the review and incorporation of existing plans and studies.

3.1. Why Prepare This Plan – The Big Picture

Hazard mitigation can be defined as, “to reduce or alleviate the loss of life, personal injury, and property damage that can result from a disaster through both long and short-term strategies”. It involves strategies such as planning, policy changes, programs, projects, and other activities that can mitigate the impacts of hazards. The responsibility for hazard mitigation lies with many, including private property owners; business and industry; and local, state, and federal government.

Types of hazard mitigation measures include the following (not all-inclusive):

- Structural hazard control or protection projects
- Retrofitting of facilities
- Acquisition and relocation of structures
- Development of mitigation standards, regulations, policies, and programs
- Public awareness and education programs
- Development or improvement of warning systems

The benefits of hazard mitigation include the following (not all-inclusive):

- Saving lives, protecting the health of the public, and reducing injuries
- Preventing or reducing property damage
- Reducing economic losses
- Minimizing social dislocation and stress
- Reducing agricultural losses
- Maintaining critical facilities in functioning order
- Protecting infrastructure from damage
- Protecting mental health
- Reducing legal liability of government and public officials

The Disaster Mitigation Act (DMA) of 2000 (Public Law 106-390) required state and local governments to develop hazard mitigation plans as a condition for federal disaster grant assistance. Prior to 2000, Federal disaster funding focused on disaster relief and recovery with limited funding for hazard mitigation planning. The DMA increased the emphasis on planning for disasters before they occur.

The DMA encourages state and local authorities to work together on pre-disaster planning, and it promote sustainability for disaster resistance. “Sustainable hazard mitigation” includes the sound management of natural resources and the recognition that hazards, and mitigation must be understood in the largest possible social and economic context. The enhanced planning network called for by the DMA helps local government’s articulate accurate needs for mitigation, resulting in faster allocation of funding and more cost-effective risk reduction projects.

3.2.1. Hennepin County's Response to the DMA

In 2005, Hennepin County Emergency Management (HCEM) and municipalities agreed to work together to establish a framework for hazard mitigation planning that would meet the local mitigation planning requirements of Title 44 of the Code of Federal Regulations (CFR 44). The result was a HMP that included Hennepin County Departments, municipalities, and special jurisdictions. The plan provided local governments with the tools to complete individual mitigation objectives and actions, as well as completing a vulnerability assessment to meet their needs, while pooling resources and eliminating redundant planning activities.

3.2.2. Purpose for Planning

HCEM and its planning partners have a long-standing history of collaboration, proactive planning, and program implementation by developing and adopting a multi-jurisdiction all hazard mitigation plan. Strategies in this plan were selected because they meet element requirements, provide eligibility for project funding, and because they meet the needs of the planning partners for their residents. This HMP will identify strategies, goals, objectives, projects, costs, and safety information, to reduce risk from natural hazards. This HMP will help guide and coordinate mitigation activities throughout Hennepin County. The plan has been developed to meet the following objectives:

- Meet or exceed requirements of the DMA.
- Enable all HMP participating partners to apply for federal grant funding to reduce risk through mitigation.
- Meet the needs of each planning partner as well as state and federal requirements.
- Create a risk assessment that focuses on Hennepin County's nineteen (19) identified hazards.
- Create a single planning document that integrates all planning partners into a framework that supports partnerships within the County and puts all partners on the same planning cycle for future updates.
- Create opportunity for local governments in the County not included in the previous plan to gain DMA compliance.
- Meet the planning requirements of FEMA's Community Rating System (CRS), allowing planning partners that participate in the CRS program to maintain or enhance their CRS classifications.
- Coordinate existing plans and programs so that high-priority initiatives and projects to mitigate possible disaster impacts have an opportunity to be funded and implemented.

3.2.3. Who Will Benefit from this Plan?

All communities, businesses, and residents of Hennepin County are the ultimate beneficiaries of this HMP. The plan reduces risk for those who live in, work in, and visit Hennepin County. It provides a viable planning framework for all natural hazards that may impact the County. Participation in development of the plan by key stakeholders in the County help reduce risk and ensure that outcomes will be mutually beneficial. The resources and background information in the plan are applicable countywide, and the plan's goals and recommendations can lay the groundwork for the development and implementation of local mitigation projects, open discussions or share information across multiple jurisdictions wanting to participate in the same mitigation project and develop or build relationships.

3.2.4. Plan Update – The Planning Process A1A A1B

Hennepin County Emergency Management assumes the position of lead agency in preparing the HMP for the county and participating jurisdictions. The HMP revision process took one year and six months to complete, beginning in August 2022 with plan adoption in February 2024. Forty-two municipalities, three cities that share boundaries with adjacent counties, Fort Snelling, and MSP Airport were considered in this plan. County Departments are also covered under the 2023 Hennepin County HMP. The planning process used to develop this Plan is as follows:

- A. A Regional Review Working Group (RRWG) was created to assess the plan. The RRWG consisted of one Hennepin County Emergency Management staff member and the regional chair of each of the four planning groups. The RRWG reviewed this plan mitigation goals and objectives, determined that using the existing 2018 plan was reasonable to follow the framework for revision, reviewed various county plans, and used the Local Mitigation Planning Policy Guide, FP 206-21-0002, Released April 19, 2022, Effective April 19, 2023, OMB Collection #1660-0062.
- B. The RRWG met five times throughout 2022-2023. (See TABLE 3.16A for schedule)
- C. The plan established and carried over many of the FEMA elements from 2018 but placed an emphasis primarily on those FEMA elements that were added in 2022 to include, critical infrastructure, underserved populations, and climate change.
- D. Hennepin County continued with the Hazard Mitigation Plan “Combination Model” for their planning and review process. Using this model, Hennepin County’s four Area Planning Groups: Minneapolis Group (5), Lake Minnetonka Regional Planning Group (21), North Suburban Regional Planning Group (14) and South Planning Group (7) appointed one representative to serve on the Hennepin County Mitigation Planning and Review Team to act on behalf of their regional group. This model assisted several smaller municipalities that had limited resources to participate in the overall early planning stages but were able to meet regionally or specifically with HCEM to work through their supporting documentation for local plan adoption. (See section 3.13)
- E. Public Participation was established using a community survey using a similar template from 2018 but made changes to meet the FEMA elemental requirements as recommended in 2022. The survey was created by HCEM and disseminated through the county social media sites and several city websites. See Section 7: appendix C)

TABLE 3.5A below is a summary of the 2024 HMP Update Process:

| Task | Date | Action |
|---|---------------------------|---|
| Task 1: <i>Notification and FEMA guidelines review</i> | August 2022 | State notification was received in preparation to resubmit the next 5-year plan. A review of the 2018 Hennepin County HMP was conducted by HCEM. It was determined that the plan needed some revision so that it was consistent with the new 2022 FEMA Local Mitigation Planning Policy Guide. All meetings were documented and included in this revision (see TABLE 3.16A) |
| Task 2: <i>Building working groups and planning teams</i> | August 2022- June 2023 | A Regional Review Working Group and Mitigation Planning Teams were formed to reflect county, local jurisdiction, and partner organization interests. Only |

2024 Hennepin County All-Jurisdiction Hazard Mitigation Plan
 Volume 1- Background and County Profile

| Task | Date | Action |
|--|----------------------------|---|
| | | one member of the former 2018 steering committee was involved in this update. Each participating jurisdiction had at least one representative as a member of a planning team |
| Task 3: <i>Create an Outreach Strategy</i> | May 2023- November 2023 | The county engaged the public and its participating jurisdictions through surveys, regional, and quarterly meetings. Stakeholder meetings were also conducted by meeting independently with all 42 cities. Public and stakeholder involvement is described below. |
| Task 4: <i>Review Community Capabilities</i> | May 2023- January 2024 | Capabilities were assessed by each jurisdiction’s emergency manager with additional support from HCEM, from open-source information, local agency updates and resource list compiling |
| Task 5: <i>Risk Assessment</i> | 2010-2024 | The current overall hazard risk assessment was reviewed. All 7 federal declarations with natural hazard implication in Hennepin County since 2010, were considered. Each participant also reviewed risk against their priority 1- critical infrastructure. Hennepin County’s Regional Emergency Management Reference Collection was also available as a reference to assess risk. |
| Task 6: <i>Mitigation Strategies</i> | May 2023- November 2023 | Ten goals were used to make decisions for paying down risk. Participants built strategies by assessing gaps and vulnerabilities within their jurisdictional boundaries against those goals. Each participating jurisdiction reviewed past projects that were completed or yet to be completed and were carried over to this HMP. Participants also submitted new mitigation projects for future projects. |
| Task 7: <i>Plan Maintenance Procedure</i> | 2024-2029 | Covid-19 limited a normal review cycle during this revision period. The 2018 base plan, nineteen natural hazards, and all community qualifying documentation products were reviewed, updated, crossed over, or deleted for this 2024 plan. A cyclic review schedule will occur routinely with a local mitigation strategies (LMS) group. |
| Task 8: <i>Review and Adopt the Plan</i> | January 2024 | A draft of the plan was reviewed by HCEM, participating jurisdictions of the plan, Hennepin County Board of Commissioners, the HSEM state hazard mitigation officer, and the Regional Review Working Group. The adopted plan (with some redaction) will be made available to the public via the county website and for participating agencies who wish to upload a redacted version to their city websites. The plan will be sent to HSEM/FEMA for approval February 2024. Each participating jurisdiction will also adopt this plan through resolution in QTR 1 2024 |

| Task | Date | Action |
|--|---------------|--|
| Task 9: <i>Final Plan Delivery</i> | February 2024 | Hennepin County Emergency Management will upload a redacted and unredacted version for State, County, local jurisdictions, and partner organization receipt. |

3.2.5. Plan Organizational Changes E1

TABLE 3.6A below highlights key changes. Organizational changes were minimal to this HMP document.

| 2018 Plan | 2024 Plan |
|---|--|
| <p><u>Volume 1- Background and County Profile</u></p> <p>Section 1: Introduction Section 2: Plan Purpose, Authority and Adoption Section 3: Planning Process Section 4: County Profile Section 5: Community Capability Assessment Section 6: Hazard Mitigation Plan Maintenance Section 7: Appendices</p> | <p>All 7 sections remain as in 2018. Removed outdated information where appropriate. Removed redundant information and rearranged subsections for easier transitions. Updated where appropriate</p> |
| <p><u>Volume 2- Hazard Inventory</u></p> <p>Section 1: Hazard Categories and Inclusions Section 2: Disaster Declaration History and Recent Trends Section 3: Climate Adaptation Considerations Section 4: Comprehensive Natural Hazard Assessment Profiles Section 5: Vulnerability Assessment Section 6: Cultural Resource Inventory Section 7: Critical Infrastructure Key Resources (CIKR)</p> | <p>The 2018 plan had 10 sections. Sections 5, 6, and 7 were removed due to their focus on human caused incidents. The CIKR inventory was expanded to include more facilities and assess hazard vulnerability</p> |
| <p><u>Volume 3- Community and Mitigation Strategies</u></p> <p>Section 1: Mitigation Strategy, Goals and Objectives Section 2: Mitigation Action Plan Section 3: Mitigation Actions and Projects Section 4: Minnesota Mitigation Crosswalk Section 5: Acronyms and Abbreviations Section 6: Glossary Section 7: Appendices</p> | <p>Section 3 was revised to further detail the progress of projects from 2018 and reformatted to condense its size. The appendices also received updates to the regulatory crosswalk and jurisdiction participation sheet.</p> |

3.2.6. Why Update

44 CFR stipulates that hazard mitigation plans must present a schedule for monitoring, evaluating, and updating project status of the plan. Updates provide an opportunity to reevaluate goals and objectives and assess if impacts of those determined actions are currently being or have been accomplished. If the intent is not being met the mitigation strategy may need to be reviewed or modified. Should this plan reach its expiration date, participants will not be able to pursue elements of federal funding under the Robert T. Stafford Act for which this adopted hazard mitigation plan is a prerequisite.

3.2.7. The Updated Plan – What is Different E2a

There are only a few changes to this 2024 plan which includes a change in the overall number of participating agencies involved in the plan update process. So, while this plan is an update for several participants, it is also the initial plan for new emergency managers who have been hired, selected, or appointed since 2018. Therefore, it was important to establish a planning process that was consistent for returning or new participants. The updated plan differs from the 2018 plan as described below:

- The current risk assessment (VOL 1) continues to reflect the nineteen natural hazards identified in this HMP. The updates cover the period between 2018-2023 and will providing new information regarding significant events within this new 5-year timeline.
- The update (VOL 3) creates an opportunity for the County and participants to review the plan in whole and engage citizens directly through community outreach involvement, social media, and surveys in a coordinated approach to gage their perception of risk and support of the concept of risk reduction through mitigation.
- The plan (VOL 3) identifies new mitigation strategies, goals, ideas, or recommendations for all participants to review and consider.
- The critical infrastructure risk assessment (VOL 3) was prepared to be informative to local emergency managers and what facilities were critical in continuity and their daily operations. Identifying infrastructure with risk assessment should better support future grant applications by providing risk and vulnerability information that will directly support the measurement of “cost-effectiveness” required under FEMA mitigation grant programs.
- An additional capability accountability tool (VOL 1) was created to identify ordinance and regulation.
- The dashboards (VOL 3) were modified to reflect references, social media, city websites, and any updates as described by the jurisdiction’s emergency manager.

Given the extent of changes in this update, readers should consider this to be a simple revised or modified plan. Previous or prior plan versions are used as references in identifying where relevant change and correlations are required through discussion and cyclic review. Federal or state data or information becomes relevant where new content is required to add to the next iteration in hazard mitigation planning.

3.3. Summary of Previous Planning Efforts

HCEM developed its first HMP in 2005, which was led by then named Hennepin County Emergency Preparedness. A Local Mitigation Planning Team was created and served as the planning team. The plan included three generalized goals:

Protect life and Property.

- Execute activities that assist in protecting lives by making homes, businesses, infrastructure, critical facilities, and other property more resistant to losses from hazards.
- Improve hazard assessment information to make recommendations for new and for existing developments in areas vulnerable to hazards.

Public Awareness

- Increase public awareness of the risks associated with hazards in the county.
- Provide information on tools, partnerships, opportunities, and funding resources to assist in implementing mitigation activities.

Partnerships and Implementation

- Strengthen communication and coordinate participation among and within public agencies, citizens, nonprofit organizations, business, and industry to gain a vested interest in implementation.
- Encourage leadership within public and private sector organizations to prioritize and implement local, county, and regional hazard mitigation activities.

In 2010, HCEM re-wrote the plan for the update due to several changes in the County’s risk assessment as well as new technology (HAZUS-MH) to estimate losses to critical infrastructure. A Steering Committee was made up of HCEM personnel as well as the City of Minneapolis’s then Emergency Preparedness Department.

In 2015, the HMP expired. Between 2015-2018, HCEM took an additional 26 months to do a complete review and overhaul to meet the FEMA elemental requirements. The steering committee provided seven goals and each participating community was deeply involved in the planning process. The final adoption of the plan took place in 2018.

The 2018 HMP expired in August 2023.

3.10 Organization of the Plan

The 2024 update to the HMP has undergone small changes from the 2018 version. Updates were made using FEMA policy guidance, mitigation planning teams, federal hazard mitigation strategies, and Hennepin County Emergency Management Director directive. The plan was organized to reflect current practice and recommended guidance. However, content from the previous versions will continue to be included. The HMP consists of and maintains three components, each are broken down in the following volumes:

Volume 1: Background and County Profile (103 pages)

- Section 1:** Introduction
- Section 2:** Plan Purpose, Authority and Adoption
- Section 3:** Planning Process
- Section 4:** County Profile
- Section 5:** Community Capability Assessment

Section 6: Hazard Mitigation Plan Maintenance

Section 7: Appendices

Volume 2: Hazard Inventory (359 pages)

Section 1: Hazard Categories and Inclusions

Section 2: Disaster Declaration History and Recent Trends

Section 3: Climate Adaptation Considerations

Section 4: Comprehensive Natural Hazard Assessment Profiles

Section 5: Vulnerability Assessment

Section 6: Cultural Resource Inventory

Section 7: Critical Infrastructure Key Resources (CIKR)

Volume 3: Community and Mitigation Strategies (291 Pages)

Section 1: Mitigation Strategy, Goals and Objectives

Section 2: Mitigation Action Plan

Section 3: Mitigation Actions and Projects

Section 4: Minnesota Mitigation Crosswalk

Section 5: Acronyms and Abbreviations

Section 6: Glossary

Section 7: Appendices

3.11 Planning Objectives

To develop the Hennepin County HMP update, the County followed a process that had the following primary objectives:

- Establish a Regional Review Working Group.
- Form a mitigation planning teams by jurisdiction.
- Coordinate planning sessions with each participating jurisdiction (42).
- Reviewing existing goals, objectives, actions, and past projects.
- Develop a hazard risk assessment addressing critical infrastructure and the nineteen natural hazards.
- Engage the Public through social media with an opportunity to participate in a survey.
- Add ordinance and regulations capability assessment.

3.12 Establish a Regional Review Working Group

Hazard mitigation planning invites collaboration and support among participating jurisdictions whose communities can be affected by hazard losses. Participating jurisdictions can create partnerships that pool resources to achieve a common vision for the community. A Regional Review Working Group was formed to provide review, observations, and recommendations for plan updates. The members of this committee included the four chairs of the regional planning groups and a staff member from Hennepin County Emergency Management. Several meetings took place in 2022- 2023. Regional Review Working Group meeting minutes are provided in **Section 7: Appendix A (page 59-62)**

3.13 Forming a Mitigation Planning Team A2a

To assist with the development and implantation of this HMP update, the Regional Review Working Group agreed that the Mitigation Planning Team (MPT) would consist of at least one lead representative from each jurisdiction. HCEM’s Plans & Systems Integration Coordinator assumed the role as lead administrator for review and training, scheduling a 2-hour block of instruction for each jurisdiction. Each jurisdiction could have as many representatives attend their mitigation document development training session. Additional meetings were available should a jurisdiction need additional support. A PowerPoint tutorial was created, and a SharePoint password was created to give and allow jurisdictions additional support to review guidance and document updates, if needed. The MPT leads are listed for each jurisdiction and their primary affiliation:

Lakes Region

- Corcoran Matt Gottschalk Police
- Deephaven Cory Johnson Police
- Excelsior Brian Tholen Police
- Greenfield Margaret Webb City Admin
- Greenwood Brian Tholen Police
- Independence Gary Kroells Police
- Long Lake Marc Schultz Police
- Loretto Jason Nelson Police
- Maple Plain Gary Kroells Police
- Medina Jason Nelson Police
- Minnetonka Beach Corey Farniok Police
- Minnetrista Paul Falls Police
- Mound Greg Pederson Fire
- Orono Corey Farniok Police
- Rockford and Hanover Wright County
- St. Bonifacious Paul Falls Police
- Shorewood Brian Tholen Police
- Spring Park Corey Farniok Police
- Tonka Bay Brian Tholen Police
- Wayzata Marc Schultz Police
- Woodland Cory Johnson Police

North Region

- Brooklyn Center Todd Berg Fire
- Brooklyn Park Shawn Conway Fire
- Champlain Glen Schneider Police
- Crystal Mark Ray Public Works
- Dayton Paul Enga Police
- Golden Valley Fire
- Maple Grove Tim Bush Fire
- Medicine lake Joshua Hauble Emergency Management
- New Hope Sarah Larson Fire
- Osseo Shane Mikkelson Police
- Plymouth Erik Fadden Police
- Robbinsdale Patrick Foley Police

2024 Hennepin County All-Jurisdiction Hazard Mitigation Plan
Volume 1- Background and County Profile

- Rogers Patrick Farrens Fire
- St. Anthony Zach Lundberg Public Works

South Region

- Bloomington Ulysess Seal Fire
- Chanhassen Carver County
- Eden Prairie Scott Gerber Fire
- Edina Andrew Slama Fire
- Hopkins Dale Specken Fire
- Minnetonka Aaron Morris Fire
- Richfield Jay Henthorne Fire
- St. Louis Park Steve Koering Fire

East Region

- Minneapolis Eric Gustafson Emergency Manager

3.14 Coordinate with other Agencies A2a

44CFR requires that opportunities for involvement in the planning process be provided to neighboring communities, local and regional agencies involved in hazard mitigation, agencies with authority to regulate development, business, academia, agencies that represent socially vulnerable communities, and other private and non-profit interests. The Mitigation Planning Team Representatives invited additional agencies that fall under those classifications from within their jurisdictions, as well as watershed and school districts. This effort resulted in the steering committee described below:

- All 43 municipalities in Hennepin County (EM's, PW, School districts, Watersheds)
- Hennepin County Departments (GIS and Public Health)
- Xcel Energy
- University of Minnesota

3.15 Review of Existing Programs

44 CFR states that hazard mitigation planning must include review and incorporation, if appropriate, of existing plans, studies, reports, and technical information. In addition, the following programs can affect mitigation within the planning area:

- Hennepin County Emergency Operations Plan
- Emergency Operations Plans (Regional North, Regional Lakes, Independent South, and the City of Minneapolis)
- 2019 Minnesota State Hazard Mitigation Plan
- 2019 Anoka County Mitigation Plan
- 2019 Carver County Mitigation Plan
- 2022 Dakota County Mitigation Plan
- 2019 Ramsey County Mitigation Plan
- 2021 Scott County Mitigation Plan
- 2023 Washington County Mitigation Plan
- 2023 Wright-County Mitigation Plan

One of the Review Committee’s actions was to review the 2019 Minnesota State Hazard Mitigation Plan (SHMP). The Review Committee identified hazards listed in the state plan (pg. 56) to which the Hennepin County planning area is susceptible and to determine if there was a need to expand the scope of the current Natural Hazard Risk Assessment. The SHMP includes 15/22 natural hazards which are currently identified in this HMP, the other seven being industrial or manmade hazards, which are not included in this plan. The Committee also reviewed the 2022 FEMA Local Mitigation Planning Policy Guide determining that three additional goals were required to meet the new guidance.

3.16 Plan Development Chronology/Milestones A1a

TABLE 3.16A summarizes important milestones in the development of the plan update.

2024 Hennepin County All-Jurisdiction Hazard Mitigation Plan
Volume 1- Background and County Profile

| Plan Development Calendar of Events | | | |
|--|---------------------------------------|--|-------------------|
| Date | Event | Milestone | Attendance |
| 2022 | | | |
| 10/10/2022 10/26/2022 10/27/2022 | HCEM Mtgs for community outreach | Survey Questionnaire discussion, timeline, and buildout | 2-5 |
| 11/10/2022 | Regional Review Working Group Mtg 1 | Info sharing, establishing HMP timeline | 7 |
| 11/16/2022 | FEMA webinar Steven Green | Hazard Mitigation planning guidance | 5 |
| 12/01/2022 | Community Outreach Survey | Survey questionnaire launched | 43 |
| 12/05/2022 | Community Outreach Survey | HMP email: QRC created and disseminated to provide survey link | 42 |
| 12/07/2022 | Community Outreach Survey | HMP email: Provide update and additional survey information | 42 |
| 2023 | | | |
| 1/18/2023 | Community Outreach Survey | City Websites advertise survey opportunity and announce HMP revision | UNK |
| 1/30/2023 | HCEM Staff Mtg | Check on progress discussion, accept recommendations | 2 |
| 2/22/2023 | Community Outreach HEMC Quarterly mtg | HMP progress, documents, and timeline update | 82 |
| 4/20/2023 | Regional Review Working Group Mtg 2 | Plan completion timeline, 44 CFR element review, Natural Hazard review | 5 |
| 5/18/2023 | Regional Review Working Group Mtg 3 | Progress updates, community planning visits, product checklist, timeline update | 5 |
| 5/18/2023 | Community Outreach HEMC Quarterly mtg | HMP progress report | 65 |
| 5/25/23 | Community Outreach | Lakes Group HMP information update | 15 |
| 5/26/2023-12/15/2023 | Participating jurisdiction planning | 1 on 1 city visits commence to plan HM. Two-hour blocks are scheduled with each jurisdiction | 75 |
| 6/22/2023 | Regional Review Working Group Mtg 4 | Progress updates, community visit completions, product checklist, timeline update | 5 |
| 7/13/2023 | Community Outreach | South Group HMP information update | 20 |
| 8/03/2023 | Community Outreach | North Group HMP information update | 15 |
| 8/16/2023 | Community Outreach HEMC Quarterly mtg | HMP progress report | 65 |
| 8/24/2023 | Regional Review Working Group Mtg 5 | Progress updates, community visit completions, product checklist, timeline update | 5 |
| 9/07/23 | Community Outreach | North Group HMP information update | 15 |

| Plan Development Calendar of Events | | | |
|-------------------------------------|--|------------------------------------|------------|
| Date | Event | Milestone | Attendance |
| 10/05/23 | Community Outreach | North Group HMP information update | 15 |
| 10/12/23 | Community Outreach | South Group HMP information update | 20 |
| 11/15/23 | Community Outreach HEMC Quarterly mtg | HMP progress report | 45 |
| 2024 | | | |
| 1/16/24 | County Review | Board Action Request submitted | 4 |
| 1/19/24 | State Review | FEMA elements review | 1 |
| 1/23/24 | County Adoption | Hennepin County Board approves HMP | 10 |
| 2/01/24 | City Resolutions | Cities begin adopting plan | 42 |

3.17 Develop a New Risk Assessment

HCEM continued to use the same methodology of historic hazard data collection as it did in the 2018 plan. State, Federal, and local information sources were used to identify any new data that has occurred over the past five-year period. In addition, HCEM continues to use the Hennepin County Regional Emergency Management Reference Library and web-based historical open-source collection as a primary means in data gathering.

3.18 HCEM Regional Emergency Management Planning Reference Collection A4

The purpose of Hennepin County Emergency Managements Regional Emergency Management Planning Reference Collection (REMPRC) is intended to assist emergency managers and others involved in emergency mitigation, preparation, response, and recovery. The collection is oriented toward historical disasters, after actions, theory, emergency management strategic, operational, and tactical planning; training and exercise design; as well as education, professional development and the evolution of emergency management systems and processes. The reference material collected in the REMPRC was created in 2010 and is categorized into very specific subject matter areas as it relates to disaster.

The priority is given to references related to the doctrine, organization, and professional practice of emergency management, including theory, assessments, strategies, plans, and after-action reviews. Also collected are analysis and accounts of hazards or threats of a level that could require emergency management employment (natural, technological, and adversarial).

The second priority is to gather references that are useful for understanding the present and future environment that may have applications for strategic assessment and planning (demographics, economic forecasts, technology assessments, etc.).

Last, the REMPRC gathers materials related to emergency practices within the disciplines that make up the emergency management community (police, fire, emergency medical services, public works, public

health, etc.). Works dealing with technologies used in emergency management is assembled (communications, data management, logistics, etc.).

The types of material collected is as follows, much of which was used to assist in the overall Risk Assessment section of this plan.

A4a

- **Government documents**, including formal doctrine, frameworks and other broad federal and state level strategy and references. Also includes tactical references such as incident management handbooks and other National Incident Management System (NIMS) and Incident Command System (ICS) planning tools.
- **Mitigation plans**, including state, county, and municipal plans to mitigate the impacts of hazards.
- **Emergency operations plans**, including standing contingency plans for operations during an emergency at all levels of government as well as non-government and private entities.
- **Incident action plans**, including specific operational period plans utilized at incident sites for upcoming operational periods. Also includes incident support plans developed at an Emergency Operations Centers that focus on upcoming operational phases.
- **Continuity of operations plans**, includes reference material related to government, industry, or organizational plans to continue.
- **After action reviews**, including hot-wash notes, interviews, and other materials related to the lessons learned from emergency management responses, training, exercises, and allied activity. Such reports include, but are not limited to National Fire Academy reports, National Transportation Safety Board reports, Congressional commissions, and inquiries.
- **Training and exercise materials**, including materials related to capability assessment, training strategy, training and exercise development, scenario development and the conduct and evaluation of training and exercises.
- **Technical documents**, including but not restricted to census and demographic data, soil surveys, geological survey reports, USGS water supply papers, climate data, NOAA assessments and related materials. Also includes materials related to technical specialties and their employment in emergencies including Geographic Information Systems (GIS), Hazardous Materials (HAZMAT), radio communications, information systems, and social media/public affairs.
- **Legal reference material**, including references for the main tenants of emergency planning and management at the federal, state, and local levels, such as Public Laws, US Codes, Minnesota Statutes and County Board Resolutions.
- **Maps and atlases**, includes depictions of natural data in space and through time such as geology, soils, hydrology, topography, vegetation, and climate. Specific geological threats such as seismicity maps, flood plains, karst, and slope failure are also collected. The collection also includes human and cultural depictions such as population density, land use,

transportation, population density, critical infrastructure, income distribution, age demographics, key emergency facilities, and related information.

- **Textbooks**, including works on comparative emergency management, crisis leadership, emergency management organization, planning processes and tools, and specialized emergency planning as it relates to hospitals, public health, public works, libraries, utilities, schools, corporations, special events and other sectors. Also includes references on scientific data that is crucial for emergency management such as meteorology, hazardous materials, radiation, chemistry, microbiology, and other fields.
- **Books**, includes non-fiction case studies on specific disasters, emergencies, and critical situations. Also includes projections and forecasts of the future natural, social, economic, and security environment.
- **Historical materials**, includes resources that describe historic emergencies, disasters and crisis and their underlying threats and hazards. Also traces the evolution of emergency planning, organization, response, and recovery.
- **Photographs and imagery**, includes still and moving photography and images on various formats including film and digital media involving all aspects of emergency management.
- **Audio** includes recordings of public warning messages, news reports, and radio transmissions involving disasters and emergency response.
- **White Papers** includes academic literature or articles pertaining to professional development, current practices, new theory, or forecasting trends in emergency management. Many times, this literature is available through search engines on the web (i.e., google scholar)

3.19 Public Involvement/ Engage the Public **A3**

Broad public participation in the planning process helps ensure that diverse points of view about the planning area's needs are considered and addressed. 44CFR requires that the public have opportunities to comment on disaster mitigation and during the drafting stages and prior to plan approval.

3.20 Strategies to inform the public.

Since this planning process involved an update for some planning partners and first-time planning for others, HCEM continued to use a comprehensive outreach approach, using multiple media sources already established in participating jurisdictions and the County. The strategy for involving the public in this plan update emphasized the following elements:

- Use of social media (Facebook, X-Twitter, Instagram, Nextdoor, and city websites) to provide information and seek input on the plan.
- Use a questionnaire to determine and identify the public's perception of risk.
- Attempt to reach as many planning area residents using multiple media sources.
- Partner with Hennepin County's Communication Division for a consistent message regarding the update to the HMP.
- Identify and involve planning area stakeholders to take part in wide dissemination.

The following graphic (**GRAPHIC 3.20**) is the initial invitation that was provided to all jurisdictions after doing a one-week beta test with three communities.

HCEM Hazard Mitigation Community Survey

Who: Hennepin County Residents

What: All Hazard Multi-Jurisdictional Community Survey

When: Launched December 1st, 2022, scheduled to end January 31st, 2023, May be extended

Why: To provide a whole community option in mitigation participation through community websites and social media outlets

Currently Launched: Links posted to HCEM Social Media (Facebook, Instagram, Twitter, Nextdoor) and on the HCEM website

Responses as of Today: 64

Total Questions and Average Completion Time: 47 questions, about 23 minutes on average to complete

Top three cities with the most participants: Crystal (15), Minneapolis (12), St. Louis Park (8)

IMPORTANT: Our goal is to reach as many residents as possible in Hennepin County. To that end, we are asking cities and regional partners to push this survey out to the community. This can be done by posting the survey information to:

1. Your city webpage
2. Your EM Web pages
3. Your social media sites
4. Local Newspapers
5. Partners in areas of law enforcement, fire, EMS, public works, schools, parks and recreation, transportation, equity, and any other partners you can cast a net over
6. Attaching to utility bills

We want to get the word out about this survey as much as we can! If you are interested in helping us accomplish this, contact Bruce Kelii (bruce.kelii@hennepin.us) for information, including templates for posting on websites and social media, a hard copy of the survey, and a link and QR code for the survey to distribute.

GRAPHIC 3.20

3.21 Social Media and Digital Media Press Release

Social media was used to engage the public for input and feedback on the 2024 HMP. With Hennepin County and our communities' ability to pass this information through their city websites, both Facebook and X (Twitter) were used to direct residents of Hennepin County to take part in this update by completing the survey questionnaire described below. It was determined to provide a link and QR code options to participate. We asked residents about their experiences about past disasters and their perception of hazard risks to Hennepin County. Residents were able to respond through an open survey period beginning December 1, 2022, and closed on March 31, 2023. To keep the messages consistent, the following social media messages were provided to all participating jurisdictions of this plan to provide wide dissemination during the open period.

Digital media was the primary mechanism for the HMP release of information. A variety of press releases were provided through county and local community websites. The information provided included that an update was being conducted, that a survey was available, and links to the 2018 plan for review. For example, The University of Minnesota produced a mass e-mail to their staff and student body describing what a HMP is, and asked students and staff to consider to participation. There were a variety of cities who also placed this information on their city websites. **See Section 7: Annex B (pages 63-68)**

- **Twitter / social media:**

As we prepare for the five-year update cycle of the All-Hazard Mitigation Plan, we want to give you, the public, the opportunity to be a part of the planning process! Follow the link below to provide your input! (Link) (Add QR code image)

- **Facebook:**

It's time for mitigation planning! Hennepin County Emergency Management is preparing for the five-year update of the All-Hazards Mitigation Plan, and we want your input! Hazard Mitigation is a whole community process, and community involvement is an important part of that. We created this survey, so you and the community can participate in the planning process.

If you live and/or work in Hennepin County, follow the link below to take the survey. We are interested in your thoughts and what you have to say, so we sincerely appreciate you taking the time to do this. Please share this survey with your friends and family too. The more responses we get, the better! (Link)

What is Hazard Mitigation?

Hazard mitigation is any sustained action taken to reduce or eliminate long-term risk to people and property from natural hazards such as flooding, storms, high winds, wildfires, earthquakes, etc. (Provide QR Code) (Multiple languages if possible)

- **Website Post:**

Hennepin County is updating the All-Hazard Mitigation Plan, as required by the Robert T. Stafford Disaster Relief and Emergency Assistance Act. Local jurisdictions are required to update the plan every five years to remain eligible for pre-disaster and post-disaster mitigation grant

2024 Hennepin County All-Jurisdiction Hazard Mitigation Plan
Volume 1- Background and County Profile

programs.

Community involvement and feedback are vital to the success of the plan. The information you provide by completing the survey below will help us better understand your hazard concerns and can lead to mitigation activities to help lessen the impact of future hazard events. (Link, QR Code, embed)

The following graphic (**GRAPHIC 3.21**) was used by Hennepin County and its participating jurisdictions as part of the press release campaign during the open survey period.

Provide feedback on Hennepin County's All-Hazard Mitigation Plan

Hennepin County Emergency Management is updating the All-Hazard Mitigation Plan, as required by the Robert T. Stafford Disaster Relief and Emergency Assistance Act. Local jurisdictions are required to update the plan every five years to remain eligible for pre-disaster and post-disaster mitigation grant programs.

Community involvement and feedback are vital to the success of the plan. The information you provide by completing the survey below will help us better understand your hazard concerns and can lead to mitigation activities that can help lessen the impact of future hazard events.

[Click here to take the survey](#)

What is Hazard Mitigation?

Hazard Mitigation is any sustained action taken to reduce or eliminate long-term risk to people and property from natural hazards, such as flooding, storms, high winds, wildfires, etc. Some examples include:

- Retrofitting water supply systems
- Stabilizing erosion hazard areas
- Elevating or retrofitting structures and utilities
- Building public safe rooms

Mitigation efforts undertaken by communities help to minimize damage to buildings and infrastructure, as well as natural, cultural, and historic resources.

Why Plan?

Hazard Mitigation planning helps emergency management planners to identify the types of hazards that could affect Hennepin County. Hazard Mitigation planning also helps emergency managers and communities to identify actions that can help to reduce losses from those hazards. Ultimately, hazard mitigation planning helps to protect the residents of Hennepin County.

Planning also helps to identify vulnerabilities and develop strategies to reduce the potential impacts of hazards. Building partnerships and reducing duplication of effort among organizations with similar goals is also a benefit of mitigation planning.

In the end, Hazard Mitigation planning helps to build communities that are more resilient to disaster and increases public awareness of local hazards and disaster preparedness.

For more about Hennepin County Emergency Management or to view a public copy of the 2018 All-Hazards Mitigation Plan, click the link below:

[Emergency Management | Hennepin County](#)

More information about hazard mitigation:

[Minnesota Homeland Security and Emergency Management](#)

[Federal Emergency Management Agency](#)

[The Disaster Mitigation Act of 2000](#)

[44 CFR 201](#)

[42 U.S.C. 5165](#) (Stafford Act, Section 322)

[42 U.S.C. 4104c](#) (National Flood Insurance Act, Section 1366)

GRAPHIC 3.21

3.22 Survey Questionnaire A3a

This HMP survey questionnaire was developed by the staff at HCEM to mimic the 2018 whole community approach. It also considered the 2022 FEMA guidance in creating questions to meet that criterion. The questionnaire was used to gauge household preparedness for natural hazards and the level of knowledge that residents have of hazards affecting Hennepin County. This questionnaire was hosted on several Hennepin County municipal social media and websites as well as posted to the Hennepin County Emergency Management Facebook and Twitter pages. The QR code and Link was also presented at monthly regional meetings and quarterly meetings as a reminder to point out the survey was “live”. Mitigation Planning Team members distributed the survey within their communities, with their local partners, and with their local vulnerable populations. A summary of the questionnaire results can be found below (3.24) under Public Involvement Results. The full questionnaire and results can be found in **Section 7: Appendix C (page 69-88)**

3.23 Public involvement results

From the questionnaire and feedback on social media posts, we found that the public is not aware that the county has a hazard mitigation plan but are aware of several natural hazards that affect them and the communities in Hennepin County. Major topics include Climate change, severe weather, and hail.

3.24 Stakeholder and Public Involvement Plan

HCEM is committed to engaging stakeholders and the public in mitigation planning activities. To accomplish this, a *Stakeholder and Public Involvement Plan* was developed in 2015 which describes the approach, activities to engage stakeholders and the public in the development of the HMP.

Based on current Federal requirements, a Mitigation Plan must include adequate and reasonable notice and opportunity for comment and other input from a variety of stakeholders, including the public, local governments, and other interested parties. HCEM has sought comment and the involvement of these stakeholders and the public through planning forums and questionnaires, interviews, as well as an online survey.

Outreach activities were conducted as part of the 2024 HMP. These activities sought input and comments on the overall vision and direction for Hennepin County Emergency Management to meet the federal and state requirements, as well as consider local level development and participation in planning.

This HMP determines both short and long-range mitigation needs in community improvement and integrates within the scope of long-range planning with HSEM- State of Minnesota.

3.25 Goals for Stakeholder and Public Involvement:

The goals for stakeholder and public involvement for this HMP:

- Gain an understanding of the need, the potential impacts of and opportunities for this HMP to improve the overall efficiency and sustainability of our communities
- Solicit input relative to mitigation policies, projects, and programs to better meet the needs of communities while also making Hennepin County a more attractive location to conduct business and a better place to live; and
- Provide input for developing a strategy for making investment decisions to mitigate risk.

3.26 Outreach Activities and Participation

A. Open Houses/Regional Meetings/Quarterly Meetings

HCEM held five plan review teams meetings. At each, a short presentation was given providing community visits, completion timelines, and survey results. Following each presentation was a discussion period and a brief question and answer period.

HCEM attended all monthly regional planning group meetings (North, South, Lakes, and Minneapolis) to provide updates, instruction and receive feedback from these groups. HCEM would also meet with individual communities throughout this process.

B. Survey Questionnaire

The public through each of the 42 municipalities were given the opportunity to complete the HMP survey. Invitations were sent by email, social media, presented in county and local meetings, and available through local and the HCEM websites. Multiple reminders were sent to local emergency managers to promote wide dissemination. The survey was posted through survey monkey. The survey not only had questions about overall needs improve, but also questions about specific demographic information. Local jurisdictions ensured that this survey was available to underserved and socially vulnerable populations within their geographic area.

| | |
|------------------|-----------------------|
| SECTION 4 | COUNTY PROFILE |
|------------------|-----------------------|

4.1. Hennepin County General Information

Location:

Hennepin County is in east-central Minnesota, in the north central United States.

GEOREF: UKDA30000000
LAT-LONG: 45.0 N latitude, 93.0 W longitude
Maidenhead: NN65SA00A00
MGRS: 46TEQ3940783071
USNG: 15T WK 00000 82950
UTM: 46T 539407mE 4983071mN

Approximate magnetic declination is 3 degrees east.

Time zones:

Central Time Zone (- 6 hours from Universal Coordinated Time – UTC)
Central Standard Time (CST): UTC - 6 hours
Central Daylight Time (CDT): UTC - 5 hours
Military Time Zone: Sierra (-6 hours from Zulu (UTC))

Hennepin County is the largest of Minnesota's 87 counties. With more than 1.2 million residents, it supports almost a quarter of the state's population. Minneapolis, the county seat, is the largest of its 41 cities. Its population is projected to grow to 1,394,660 by 2030, an increase of approximately 2 percent.

Population:

The estimated population of Hennepin County is 1,260,121 (2022) +9.2% from 2010.
Housing units: 513,414 (2012), 571,408 (2022)
Households: 529,029 with an average 2.35 persons per household (2018-2022)
Median household income: \$63,559 (2012), 92,595 (2022)
Percentage of population below the poverty level: 12.6% (2012) 10.8% (2022)
Percentage of population under age 18: 22.5% (2012) 21.3% (2022)
Percentage of population over age 65: 11.9% (2012) 15.8% (2022)
Percentage of foreign-born persons: 12.7% (2012) 13.7% (2018-2022)
Non-English language spoken at home: 16.6% (2012) 18% (2022)
Households with a computer 96% (2018-2022)
Households with broadband internet subscription 91.5% (2018-2022)

Governmental units in Hennepin County:

Number of incorporated cities: 45
Number of unincorporated areas: 1 (Fort Snelling)
Special jurisdictions or districts with own police and/or fire services: 5
Fire departments or districts: 30
Law enforcement agencies and police departments: 33
School districts: 22

4.2. Physical Features

Hennepin County landforms were formed in the recent geological past by the action of glaciers that receded from the area about 10,000 years ago. The surface of the county may be classed into three broad types. Smooth plains of outwash and river terraces are found especially in the northeast. Belts of hills and gently rolling plains are interspersed throughout the rest of the county. Drainage is dominated by the Mississippi River into which all other Hennepin County streams empty, either directly or indirectly. The next major river is the Minnesota which forms the southern boundary of the County. The Crow River forms the northwest boundary of the County. Seven other important streams course through the county. The southwest portion of Hennepin County is dominated by Lake Minnetonka, a 14,528-acre (59 square kilometer) body of water.

Area:

Hennepin County has an area of 607 square miles (1,572 square kilometers)

Land area: 554 square miles (1,435 square kilometers) or 91%

Water area: 53 square miles (137 square kilometers) or 9%

Physical features:

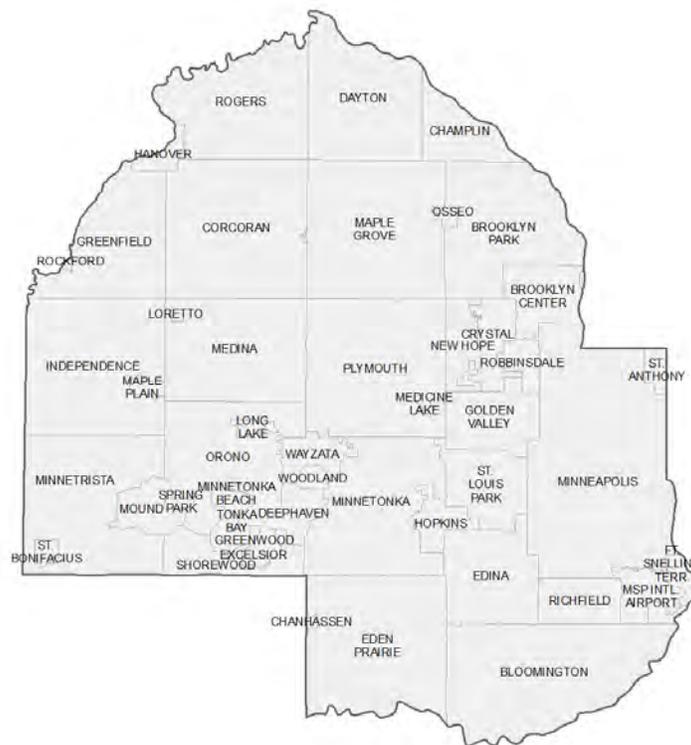
Mean elevation is 925 feet (282 meters) above sea level.

Highest elevation: 1120 feet (341 meters) above sea level Minnetonka: 44.919 N, -93.459 W

Lowest elevation: 686 feet (209 meters) above sea level Fort Snelling: 44.893 N, -93.177 W

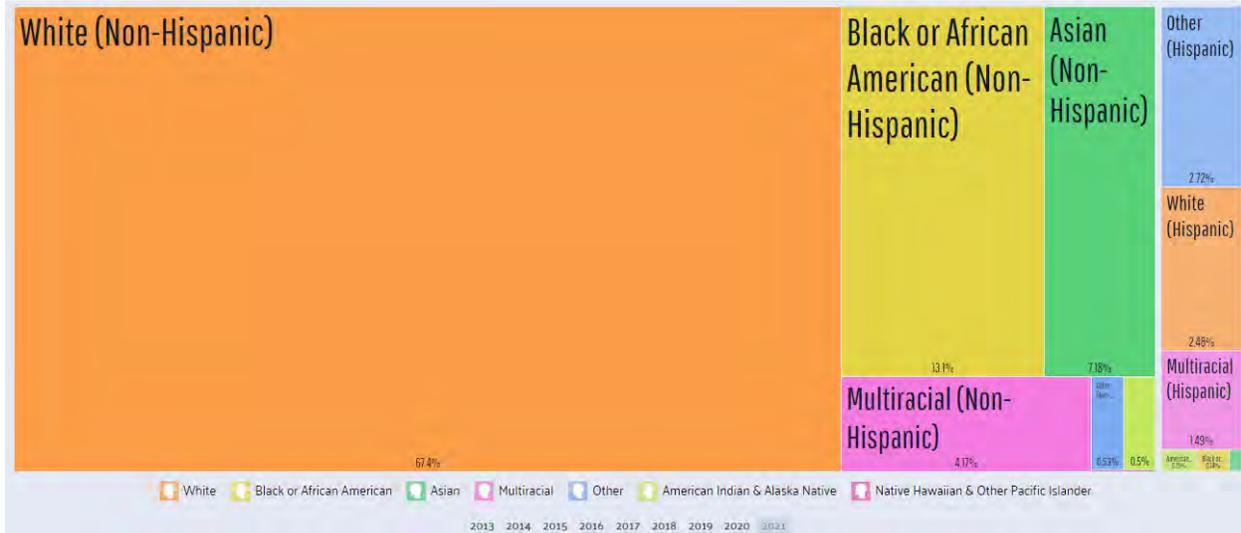
Vertical Relief: 434 feet (132 meters)

Hennepin County Geographical Space 2024



4.3. Diversity (see Section 7, Appendix 6- Community Map Series, Population)

In 2021, there were 5.14 times more White (Non-Hispanic) residents (856k people) in Hennepin County, MN than any other race or ethnicity. There were 167k Black or African American (Non-Hispanic) and 91.2k Asian (Non-Hispanic) residents, the second and third most common ethnic groups. 7.03% of the people in Hennepin County, MN are Hispanic (89.3k people).



4.4. Income (see Section 7, Appendix 6- Community Map Series, Income and Poverty)

Hennepin County remains one of the wealthiest counties in Minnesota with an average per capita income of \$55,199 and median family income of \$92,595 compared to a statewide median family income of \$84,313.

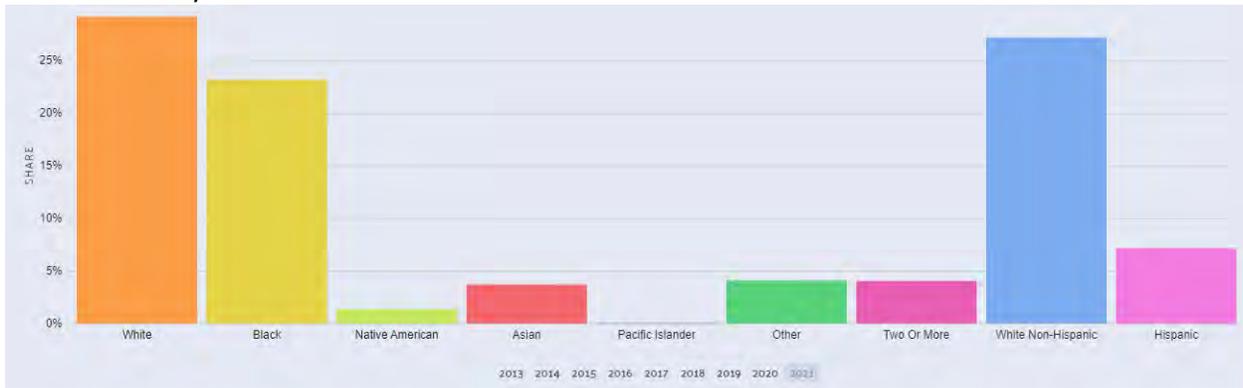
From Data USA, in 2022, 9.88% of the population for whom poverty status is determined in Hennepin County, MN (123k out of 1.25M people) live below the poverty line, a number that is lower than the national average of 12.6%. The largest demographic living in poverty are Females 18 - 24, followed by Females 25 - 34 and then Males 18 - 24.

The most common racial or ethnic group living below the poverty line in Hennepin County, MN is White, followed by Black and Hispanic. 15.7% of the population was living with severe housing problems in Hennepin County, MN. From 2014 to 2022, the indicator did decline 1.47%. The following graphics are based on 2021 demographics.

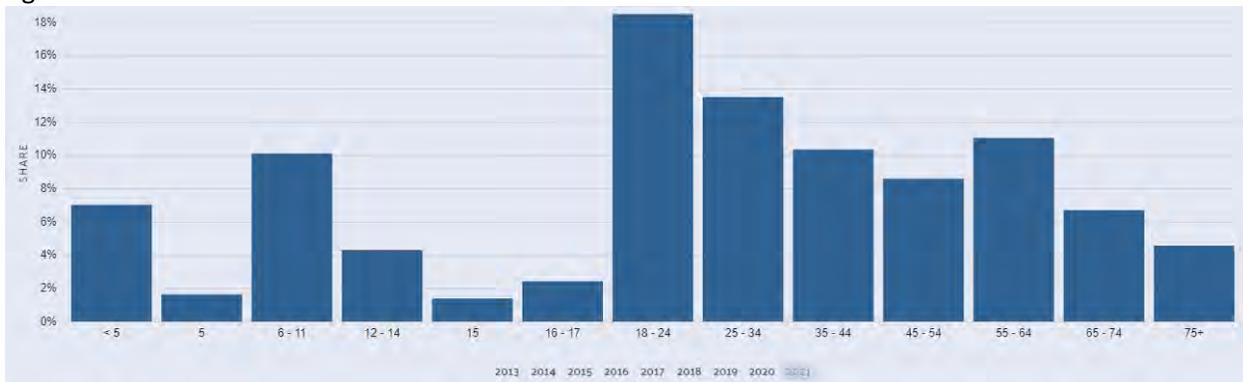
Racial disparities in poverty and per capita income can be partially explained by racial/ethnic differences with factors such as family types, income distribution, and families with more than one child. While not an exhaustive list, a recent example from Hennepin County that would affect poverty status or per capita income across racial/ethnic groups include: a higher proportion of Hennepin County’s American Indian and Black/African American families where single females are the head of household.

2024 Hennepin County All-Jurisdiction Hazard Mitigation Plan
Volume 1- Background and County Profile

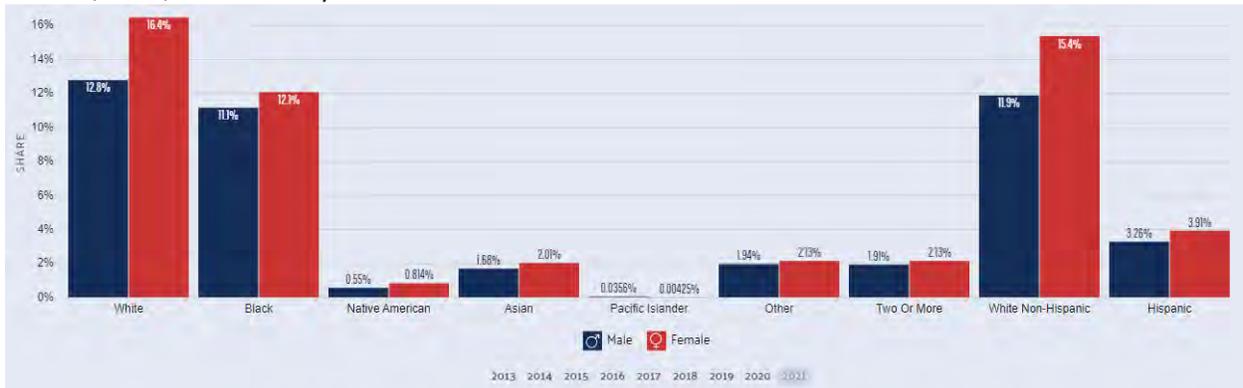
Race or Ethnicity



Age



Gender, Race, and Ethnicity



4.5. Employment

From 2020 to 2021, employment in Hennepin County, MN grew at a rate of 1.2%, from 696k employees to 705k employees.

The most common employment sectors for those who live in Hennepin County, MN, are Health Care & Social Assistance (104,452 people), Manufacturing (85,227 people), and Professional, Scientific, & Technical Services (79,671 people).



4.6. Infrastructure

Hennepin County has a well-developed highway system. The Hennepin County Highway System consists of approximately 571 miles of roadway. The Highway System is divided into two categories: County State Aid Highways and County Roads. The County Road system consists of approximately 80 miles of roadway.

Metro Transit in Minneapolis recorded more than 42 million rides across all light rail, bus, and paratransit services in 2022, up 17% compared with total ridership in 2021. Light-rail ridership increased 16% year over year with more than 12 million riders.

Xcel Energy, Wright-Hennepin Electric and Minnesota Valley Electric are public utility companies that provide natural gas and electric service to over 1 million residents in Hennepin County.

Maintaining an adequate supply of safe drinking water requires attention, investment, and responses to new and ongoing challenges. Sustainable water resources are critical to personal and public health as well as our economy. Protecting water sources, treating water, and testing water after it is treated are part of the multi-barrier approach to assuring an adequate supply of water that is safe to drink. The Minnesota Department of Health protects our drinking water.

4.7. Land Cover (see Section 7, Appendix 6- Community Map Series, Geography)

Hennepin County consist of 388,100 acres of land that is divided into the following land cover:

- Artificial Surfaces and Associated Areas
- Planted or Cultivated Vegetation
- Forests
- Woodlands
- Shrublands
- Herbaceous
- Nonvascular Vegetation
- Sparse Vegetation
- Water

4.8. Watersheds (see Section 7, Appendix 6- Community Map Series, Bodies of Water)

Watersheds are managed by either a Watershed Management Organization or a Watershed District. Both are considered a separate unit of government and are governed by a Board of Commissioners. Watershed District board members are appointed by the Hennepin County Commissioners, while Watershed Management Organization board members are appointed by individual city councils.

Metro watershed management plans address:

- protection, preservation, and use natural surface and groundwater storage and retention systems.
- minimize public capital expenditures needed to correct flooding and water quality problems.
- identify and plan for means to effectively protect and improve surface and groundwater quality.
- establish more uniform local policies and official controls for surface and groundwater management.
- prevent erosion of soil into surface water systems.
- promote groundwater recharge.
- protect and enhance fish and wildlife habitat and water recreational facilities; and
- secure the other benefits associated with the proper management of surface and groundwater.

Watershed organizations in Hennepin County are:

- Bassett Creek Watershed Management Commission
- Elm Creek Watershed Management Commission
- Lower Minnesota River Watershed District
- Minnehaha Creek Watershed District
- Mississippi Watershed Management Organization
- Nine Mile Creek Watershed District
- Pioneer-Sarah Creek Watershed Management Commission
- Richfield-Bloomington Watershed Management Organization
- Riley Purgatory Bluff Creek Watershed District
- Shingle Creek Watershed Management Commission
- West Mississippi River Watershed Management Commission

4.9. School Districts (see Section 7, Appendix 6- Community Map Series, School Districts)

There are 22 independent school districts in Hennepin County, two of which were part of the Mitigation Planning Team. The following is a table of those Districts.

| Hennepin County Independent School Districts | |
|--|---------------------------|
| Special ISD 1 - Minneapolis | ISD 279 – Osseo |
| ISD 011 - Anoka-Hennepin | ISD 280 – Richfield |
| ISD 110 – Waconia | ISD 281 – Robbinsdale |
| ISD 111 – Watertown-Mayer | ISD 282 – St. Anthony |
| ISD 270 – Hopkins | ISD 283 – St. Louis Park |
| ISD 271 – Bloomington | ISD 284 - Wayzata |
| ISD 272 – Eden Prairie | ISD 286 – Brooklyn Center |

| | |
|----------------------|---------------------|
| ISD 273 – Edina | ISD 728 – Elk River |
| ISD 276 – Minnetonka | ISD 877 – Buffalo |
| ISD 277 - Westonka | ISD 879 – Delano |
| ISD 278 - Orono | ISD 883 - Rockford |

4.10. Future Community Trends for 2040

Hennepin County is facing many changes from shifts in travel behavior, demographics, technology, and the environment. These shifts will affect how people, goods, and information move in the future. It is important that we proactively plan to address these changes to achieve our transportation vision.

In anticipation of how community comprehensive plans will be structured for business development, residential infrastructure, and improvement to transportation corridors It is expected that partnerships will provide information at to the changes that will affect future hazard mitigation planning. Those city officials and planners involved in this work tend to share or extrapolate existing community development patterns providing information required in identifying areas of concern. Generally, the short-term five-to-ten-year period has built in predictability with routine accuracy since change is often smaller and the lead-time of most large-scale projects require that planning preparations are scheduled well in advance. Longer-term projections or immediate disaster impact planning are much more difficult since land use policy, lifestyle shifts/attitudes, economic patterns and other actions affecting society are hard to foresee.

Strategic investments and partnerships that leverage geographic diversity, infrastructure, the strength of the local economy, and increasingly diverse human capital are essential to the continued success and wellbeing of Hennepin County and its residents.

Socio-economic

- Population growth will continue with an increase of 100K new residents.
- Countywide will see an increase in 50K households.

Acknowledging Disparity

People of color in Minnesota and Hennepin County are more likely to use public transportation and are also more likely to spend 30+ minutes commuting to work compared to their white counterparts.

Challenge: Provide a multimodal transportation system that is affordable and accessible to reduce the cost of transportation for cost-burdened households. We also must ensure that shared mobility and other technological advances are available to all residents regardless of economic status.

- The County will continue to grow more racially and ethnically diverse. Migration and birth rates continue to move the county toward a less homogeneous people. This will bring different expectations of the county and the region.

Aging Population

Meeting the needs of an older population will require adjusting our services and infrastructure. In 1990, 1 in 10 Hennepin County residents were aged 65 or older. By 2040, it is estimated this will increase to 1 in 3 residents.

Challenge: Create a transportation system that provides safe, accessible, and affordable transportation options to enable our growing senior population to age in place and remain healthy, active, and socially connected.

- We will experience an aging population. Meeting the needs of an older population will require adjusting our services and infrastructure. An older population may work less overall but also has more time and expertise to share.

Climate Change

Increased temperature variation, precipitation levels, and the frequency of extreme weather events are impacting design, construction, maintenance, and operations of our transportation system resulting in increased lifecycle costs.

Challenge: We will need to explore emerging technologies and employ innovative practices to reduce the impact of the transportation system on the air we breathe, the water we drink, and the natural resources we enjoy.

- Weather pattern change will force adaptation in our infrastructure, services, and society. The county will also face pressure to reduce its contribution to climate change.

Economy

Economic growth in Hennepin County depends on an efficient, reliable, and affordable transportation system to maintain competitive commute times, retain, and attract businesses, and support efficient movement of freight.

Challenge: Use technology and innovation to support economic growth and personal and freight mobility by making more efficient use of the transportation system and preserving and maintaining our aging infrastructure.

- Technology is enabling the rise of a sharing economy and is redefining what work is. No longer will we build one thing for everyone, and many products won't be physical. The workforce is becoming highly connected and mobile.

Infrastructure

More than 30% of our roads are more than 50 years old and are nearing the end of their useful life. Ongoing maintenance, rehab and replacement is estimated to cost \$2 billion.

Challenge: As we rehab and replace infrastructure, we need to explore new ways to incorporate new technologies, innovations, and adaptations.

Technology

Technology is enabling the rise of a sharing economy and is redefining how, where, and when we work, travel, and communicate. The transportation sector is relying on data to drive decisions, and on technology to reimagine how we move people and goods. Mobile access to everything from traffic data to transit schedules informs our travel choices. Technological advances are changing residents' lives and how the county does business and the services we provide.

Challenge: While technological advancements have the potential to improve safety, mobility, and efficiency, we must recognize that without proactive planning and policy interventions, the technologies could result in increasing sprawl, vehicle miles traveled (VMT), and greenhouse gas (GHG) emissions, and limiting access for disadvantaged communities. Artificial Intelligence and Generative pre-trained transformers have opened avenues with deep learning and machine learning and have positive and negative implication in its use.

Transportation

Preferences are changing. In the region, people are driving less, using a variety of transportation modes, and showing a clear preference for living in walkable, transit-accessible neighborhoods.

Challenge: Hennepin County residents expect new and diverse mobility options that are affordable and available throughout the county.

- Mobility is rapidly evolving. Options for how we travel are expanding and our preferences are changing, too. The sharing economy, transit, and autonomous vehicles have the potential to profoundly and rapidly change how people get around. What we do today might not align with future mobility needs.
- Our infrastructure is aging. Many of our systems were built in the second half of the 20th century. That infrastructure needs maintenance, but society has not budgeted for it. There are opportunities to rethink these systems as we rebuild, incorporating new goals and technologies.

Local land use development patterns E1a

The principal guide in the forecasting of future land use development is with the comprehensive plans of the individual Hennepin County municipalities. All 45 municipalities provide future land development information on what types of land uses and the intensities of development they expect over the next twenty years.

Land use planning, designations, and zoning are vested in the authority of individual municipalities. Hennepin County will continue to collaborate with these agencies during activities such as development reviews, corridor studies, and project improvements to encourage increased development densities, expanded access to transit, transit corridor and station area planning. Hennepin County actively promotes specific types of land use and development, including TOD, affordable housing, and brownfield redevelopment through the incentive-based funding programs, Transit-Oriented Development, Affordable Housing Incentive Fund, and the Environmental Response Fund, respectively.

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|------------------|--|
| SECTION 5 | COMMUNITY CAPABILITY ASSESSMENT |
|------------------|--|

5.1. Community Planning Tool Assessment C1a, C1b

Hennepin County Emergency Management (HCEM) uses a variety of hazard mitigation implements to assist local emergency managers identify additional capability that can be used to pay down risk. The capability tables are meant to be informative with an understanding to build or be aware of plan sets, programs, relationships, funding, training, and regulation. This capability assessment provides overall awareness and can leverage what a community could draw from in making decisions about mitigation actions or significant events. With respect to each community- each community determines their capability and should consider closing any gaps if they come across an area not identified as a capability. The capability listings in this section enables emergency managers a program to improve community resilience through actions taken before, during and after a significant event that is within local capabilities. For example, building codes, land use, development ordinances, and regulations are commonly used which control rate of growth and limit development into flood prone areas.

This 2024 Plan update includes Hennepin County’s second HMP capability assessment. This assessment was conducted using responses to the City Capabilities Questionnaire that was distributed to all Hennepin County municipalities. Local emergency managers from each participating jurisdiction were directed to update the City Capabilities matrix. Capabilities were categorized into planning (**TABLE 5.1A**), administrative and technical (**TABLE 5.1B**), fiscal (**TABLE 5.1C**) and education and training (**TABLE 5.1D**). In addition, a new, Ordinance and Regulation section (**TABLE 5.1E**) was developed and added to this HMP revision.

2024 Hennepin County All-Jurisdiction Hazard Mitigation Plan
Volume 1- Background and County Profile

The results of the capability assessment are presented in the following tables.

TABLE 5.1A Planning Capability

| Planning Tools | | | | | | | | | | |
|------------------|------------------------------|-------------------------------|-------------------------------|-----------------------------|--------------------------|---------------------------|---------------------|-----------------------|--------------------|---------|
| City | State Hazard Mitigation Plan | City Emergency Operation Plan | Continuity of Operations Plan | Post Disaster Recovery Plan | Capital Improvement Plan | Economic Development Plan | Transportation Plan | Flood Management Plan | Comprehensive Plan | Other |
| Bloomington | X | X | X | | X | X | X | X | X | |
| Brooklyn Center | X | X | | | X | X | X | | X | CCRP |
| Brooklyn Park | X | X | X | | X | X | X | | | |
| Champlin | X | X | X | | X | X | X | X | X | |
| Corcoran | | X | | | X | X | X | | | |
| Crystal | | X | | | X | | | | X | |
| Dayton | X | | | | X | X | X | | X | |
| Deephaven | X | X | | | X | | | | X | |
| Eden Prairie | X | X | X | X | X | X | X | X | X | |
| Edina | | X | | | X | X | X | X | X | |
| Excelsior | | | | | X | X | X | | X | |
| Golden Valley | | | | | | | | | | |
| Greenfield | | X | | | | | | | X | WMP |
| Greenwood | X | X | | | X | | | | X | |
| Hopkins | | X | X | | X | X | | | X | |
| Independence | X | X | X | | X | X | | X | X | |
| Long Lake | X | X | X | | X | X | | | X | |
| Loretto | X | X | X | | X | | X | X | X | |
| Maple Grove | X | X | | | X | X | X | X | X | |
| Maple Plain | X | X | X | | X | X | | X | X | |
| Medicine Lake | | X | X | | X | | | | X | |
| Medina | X | X | X | | X | | X | | X | CWS ERP |
| Minneapolis | X | X | X | | X | X | X | | X | |
| Minnetonka | | | | | | | | | | |
| Minnetonka Beach | | X | X | | X | | | | X | |
| Minnetrissa | | X | | | X | X | | X | X | |
| Mound | X | X | | | X | X | | X | X | |
| New Hope | | X | | | | | | | X | |
| Orono | | X | | | X | | | X | X | |
| Osseo | | X | | | X | X | | | X | |
| Plymouth | | | | | | | | | | |
| Richfield | X | X | X | X | X | X | X | X | X | |
| Robbinsdale | | X | | | X | X | | | X | |
| Rockford | | | | | | | | | | |
| Rogers | X | X | X | | X | | X | | X | |
| Shorewood | | X | | | X | X | X | | X | |
| Spring Park | | X | | | X | | | X | X | |
| St. Anthony | X | X | IP | | X | X | X | | X | |
| St. Bonifacius | | X | | | X | X | | X | X | |
| St. Louis Park | | | | | | | | | | |
| Tonka Bay | X | X | | X | X | | | | X | |
| Wayzata | X | X | X | X | X | X | | | X | |
| Woodland | X | X | | | X | | | X | X | |

CCRP: Community Crisis Response Plan

CWS ERP: Community Water System Emergency Response Plan

IP: In Progress

WMP: Water Management Plan

2024 Hennepin County All-Jurisdiction Hazard Mitigation Plan
Volume 1- Background and County Profile

TABLE 5.1B Administrative and Technical Capability

| Administrative and Technical Capabilities | | | | | | | | | | |
|---|---------------------|---------------------|-----------------------|--------------------------------|-------------------|-------------------|----------------|----------------|--------------------|-------|
| City | Planning Commission | Maintenance Program | Mutual Aid Agreements | Community Rating System Member | Emergency Manager | Community Planner | Civil Engineer | GIS Specialist | Building Inspector | Other |
| Bloomington | X | X | X | X | X | X | X | X | X | |
| Brooklyn Center | X | X | X | | X | X | X | X | X | |
| Brooklyn Park | X | X | X | X | X | X | X | X | X | |
| Champlin | X | X | X | X | X | X | X | X | X | |
| Corcoran | X | | X | | X | X | X | X | X | |
| Crystal | X | | X | | X | X | X | X | X | |
| Dayton | X | X | X | | X | X | X-C | | | |
| Deephaven | X | X | X | | X | | X | | X | |
| Eden Prairie | X | X | X | X | X | X | X | X | X | |
| Edina | X | X | X | | X | X | X | X | X | |
| Excelsior | X | X | X | | X | X | X | X | X | |
| Golden Valley | | | | | | | | | | |
| Greenfield | X | X | X | | X | X-C | X-C | X-C | X-C | |
| Greenwood | X | X | X | | X | X | X | X | X | |
| Hopkins | X | X | X | | X | X | X | X | X | |
| Independence | X | X | X | | X | X | X | | X | |
| Long Lake | X | X-C | X-C | | X | X-C | X-C | X-C | X-C | |
| Loretto | X | X | X | | X | | X | | | |
| Maple Grove | X | X | X | X | X | X | X | X | X | |
| Maple Plain | X | X | X | | X | X | | | X | |
| Medicine Lake | X | X | X | | X | X | X | X | X | |
| Medina | X | X | X | | X | X | X | | X | |
| Minneapolis | X | X | X | X | X | X | X | X | X | |
| Minnetonka | | | | | | | | | | |
| Minnetonka Beach | X | | X | | X | | X | X | X | |
| Minnetrissa | X | X | X | | X | X | X | X | X | |
| Mound | X | X | X | | X | X | X | X | X | |
| New Hope | X | X | X | | X | X | X | | X | |
| Orono | X | | X | | X | | X | | X | |
| Osseo | X | | X | | X | X | | X | X | |
| Plymouth | | | | | | | | | | |
| Richfield | X | X | X | | X | X | X | X | X | |
| Robbinsdale | X | X | X | | X | X | X | X | X | |
| Rockford | | | | | | | | | | |
| Rogers | X | X | X | | X | X | X | X | X-C | |
| Shorewood | X | X | X | | X | X | X | X | X | |
| Spring Park | X | | X | | X | | X | | X | |
| St. Anthony | X | X | X | | X | X | X | X | | |
| St. Bonifacius | | X | X | | X | | X | | X | |
| St. Louis Park | | | | | | | | | | |
| Tonka Bay | | X | X | | X | X | X | | X | |
| Wayzata | X | X | X | | X | X | X | | X | |
| Woodland | | | X | | X | | | | X | |

X-C: Contracted

2024 Hennepin County All-Jurisdiction Hazard Mitigation Plan
Volume 1- Background and County Profile

TABLE 5.1C Fiscal Capability

| Fiscal Capabilities | | | | | | | | |
|---------------------|-------------------------------------|--|--|-------------------------|--------------------------------------|-----------------------|---------------------------------|-------|
| City | Capital Improvement Project Funding | Authority to Level Taxes for Specific Purposes | Utility Fees- Water, Storm, Sewer, Gas, Electric | Development Impact Fees | Community Developmental Block Grants | Federal/State Funding | Tax Incremental Financing (TIF) | Other |
| Bloomington | X | X | X | X | X | X | X | |
| Brooklyn Center | X | X | X | X | X | X | X | |
| Brooklyn Park | X | X | X | X | X | X | X | |
| Champlin | X | X | X | X | X | X | X | |
| Corcoran | X | X | X | X | | X | | |
| Crystal | X | X | X | | X | X | X | |
| Dayton | X | X | X | X | | X | X | |
| Deephaven | X | X | X | | | X | | |
| Eden Prairie | X | X | X | X | X | X | X | |
| Edina | X | X | X | | X | X | X | |
| Excelsior | X | X | X | X | X | X | X | |
| Golden Valley | | | | | | | | |
| Greenfield | X | X | X | X | | X | | |
| Greenwood | X | X | X | | | X | | |
| Hopkins | X | X | X | X | X | X | X | |
| Independence | X | X | X | | X | X | | |
| Long Lake | X | X | X | X | | X | X | |
| Loretto | X | X | X | | X | X | X | |
| Maple Grove | X | X | X | X | X | X | X | |
| Maple Plain | X | X | X | | X | X | | |
| Medicine Lake | X | X | | X | | X | | |
| Medina | X | X | X | | X | X | | |
| Minneapolis | X | X | X | | X | X | X | |
| Minnetonka | | | | | | | | |
| Minnetonka Beach | X | | X | | | | | |
| Minnetrissa | X | | X | X | | X | | |
| Mound | X | X | X | | X | X | X | COPF |
| New Hope | | | X | | | | X | |
| Orono | X | | X | | | | | |
| Osseo | X | X | X | | X | X | X | |
| Plymouth | | | | | | | | |
| Richfield | X | X | X | X | X | X | X | |
| Robbinsdale | X | X | X | | X | X | X | |
| Rockford | | | | | | | | |
| Rogers | X | X | X | X | | X | X | |
| Shorewood | X | X | X | X | X | X | X | |
| Spring Park | X | | X | | | | | |
| St. Anthony | X | X | X | X | X | X | X | |
| St. Bonifacius | X | | X | | | | | |
| St. Louis Park | | | | | | | | |
| Tonka Bay | X | X | X | X | X | X | X | |
| Wayzata | X | X | X | X | | X | X | |
| Woodland | X | X | X | | | X | | |

COPF: Co-Operative Fire

2024 Hennepin County All-Jurisdiction Hazard Mitigation Plan
Volume 1- Background and County Profile

TABLE 5.1D Education and Training Capability

| Education and Training | | | | | | | | | | |
|------------------------|-----------|------------------|------------------------------------|-----------------------------|--|-----------------------------|-------------|-----------|--------|-------|
| City | CERT Team | Regular Training | Exercises (Tabletop to Full-Scale) | Hazard Education in Schools | Citizens Group or Non-Profit Focused on EM | Public/Private Partnerships | Storm Ready | Fire Wise | WebEOC | Other |
| Bloomington | | X | | X | | | | | X | |
| Brooklyn Center | | X | | | | | | | X | HSC |
| Brooklyn Park | | X | | X | | X | | | | |
| Champlin | | X | X | | | X | | | X | |
| Corcoran | | X | X | | | X | | | X | |
| Crystal | | X | X | | | X | | | X | |
| Dayton | | X | | | | | | | X | |
| Deephaven | | X | | | | | | | X | |
| Eden Prairie | X | X | X | X | X | X | X | | X | HSEM |
| Edina | | | X | X | | X | | | X | |
| Excelsior | | | | | | X | | | | |
| Golden Valley | | | | | | | | | | |
| Greenfield | | X | X | | | | | | X | |
| Greenwood | | X | | | | | | | | |
| Hopkins | X | X | X | X | | X | X | | X | |
| Independence | | X | X | | | X | | X | X | |
| Long Lake | X | X | N/A | | | | | | X | |
| Loretto | | X | X | | X | X | | X | X | |
| Maple Grove | | X | X | | | X | | | X | |
| Maple Plain | | X | X | | | X | | X | X | |
| Medicine Lake | X | | | | | X | | | X | |
| Medina | | X | X | | | X | | X | X | |
| Minneapolis | | X | X | | X | X | | | X | |
| Minnetonka | | | | | | | | | | |
| Minnetonka Beach | | X | X | | | | | | X | |
| Minnetrissa | | X | X | X | | | | | X | |
| Mound | | X | X | X | | X | X | | X | RAVE |
| New Hope | | X | X | | | X | | | X | |
| Orono | | X | X | | | | | | X | |
| Osseo | | | | | | | | | X | |
| Plymouth | | | | | | | | | | |
| Richfield | X | X | X | X | X | X | X | | X | |
| Robbinsdale | | | | | | | | | X | |
| Rockford | | | | | | | | | | |
| Rogers | | X | X | X | | X | | | X | |
| Shorewood | | X | X | | | X | | | | |
| Spring Park | | X | X | | | | | | X | |
| St. Anthony | | X | X | X | | | | | X | |
| St. Bonifacius | | X | X | X | | | | | X | |
| St. Louis Park | | | | | | | | | | |
| Tonka Bay | | X | X | | | X | | | X | |
| Wayzata | | X | X | | | X | | | X | |
| Woodland | | X | | | | | | | X | |

HSC: Heart Safe City

HSEM: Homeland Security and Emergency Management

RAVE: RAVE Mass Notification System

2024 Hennepin County All-Jurisdiction Hazard Mitigation Plan
 Volume 1- Background and County Profile

TABLE 5.1E Regulations and Ordinances Capability

| Regulations and Ordinances | | | | | | | | | | |
|----------------------------|----------------|--------------------------|----------------------------|--------------------|--------------------|---------------------|--------------------|------------------|------------------------|-------|
| City | Building Codes | Growth Control Ordinance | Hazard Setback Regulations | Hillside Ordinance | Historic Ordinance | Shoreline Ordinance | Wildfire Ordinance | Zoning Ordinance | Floodplain Regulations | Other |
| Bloomington | X | | X | | | | | X | X | |
| Brooklyn Center | X | | X | | | X | | X | X | |
| Brooklyn Park | X | X | X | | | | | X | X | |
| Champlin | X | X | X | | | | | X | X | BLF |
| Corcoran | X | X | | | | X | | X | X | |
| Crystal | X | | | | | X | | X | X | |
| Dayton | X | | | | X | X | | X | X | |
| Deephaven | X | X | X | | | X | X | X | X | |
| Eden Prairie | X | X | X | X | X | X | X | X | X | |
| Edina | X | | X | X | X | X | | X | X | |
| Excelsior | X | | | | X | X | | X | X | |
| Golden Valley | | | | | | | | | | |
| Greenfield | X | X | X | | | X | | X | X | BLF |
| Greenwood | X | | X | X | | X | | X | X | |
| Hopkins | X | | X | | | | | X | | |
| Independence | X | X | X | | | X | | X | X | |
| Long Lake | X | | X | | X | X | | X | | |
| Loretto | X | | | | | | | X | X | |
| Maple Grove | X | X | X | X | X | X | X | X | X | |
| Maple Plain | X | X | X | | | X | | X | X | |
| Medicine Lake | X | X | X | X | | X | X | X | X | |
| Medina | X | X | X | | | X | | X | X | |
| Minneapolis | X | | X | | X | X | | X | X | |
| Minnetonka | | | | | | | | | | |
| Minnetonka Beach | X | | | X | X | X | | X | X | |
| Minnetrista | X | | | | | X | | X | X | |
| Mound | X | | X | X | | X | | X | X | |
| New Hope | X | | | | X | X | | X | X | |
| Orono | X | | X | | | X | | X | X | |
| Osseo | X | | | | | | | X | | |
| Plymouth | | | | | | | | | | |
| Richfield | X | X | X | | | | | X | X | |
| Robbinsdale | X | | | | | | | X | X | |
| Rockford | | | | | | | | | | |
| Rogers | X-C | X | | | | X | | X | X | |
| Shorewood | X | | | | | X | | X | X | |
| Spring Park | X | | X | | | X | | X | X | |
| St. Anthony | X | X | X | | | X | | X | | |
| St. Bonifacius | X | | | | | | | X | X | |
| St. Louis Park | | | | | | | | | | |
| Tonka Bay | X | | X | X | | X | | X | X | |
| Wayzata | X | | X | | X | X | | X | | |
| Woodland | | | | | | | | | | |

BLF: Bluff Regulation

5.2. Participation in the National Flood Insurance Program C2a

Flooding is the most common natural hazard. In 1968, Congress created the National Flood Insurance Program (NFIP) in response to the rising cost of taxpayer funded disaster relief for flood victims and the increasing amount of damage caused by floods. The Federal Emergency Management Agency (FEMA) manages the NFIP and oversees the floodplain management and mapping components of the Program.

Nearly 20,000 communities across the United States and its territories participate in the NFIP by adopting and enforcing floodplain management ordinances to reduce future flood damage. In exchange, the NFIP makes federally backed flood insurance available to homeowners, renters, and business owners in these communities.

The National Flood Insurance Program aims to reduce the impact of flooding on private and public structures. It does so by providing affordable insurance to property owners and by encouraging communities to adopt and enforce floodplain management regulations. These efforts help mitigate the effects of flooding on new and improved structures. Overall, the program reduces the socio-economic impact of disasters by promoting the purchase and retention of general risk insurance, but also of flood insurance, specifically.

5.3 National Flood Insurance Program in Minnesota C2a

The Minnesota Department of Natural Resources (DNR) is the state administration agent for the NFIP in Minnesota. The HSEM Hazard Mitigation branch works with the DNR, FEMA other agencies to help communities develop effective local flood hazard mitigation plans and projects which includes adopting required ordinances and mitigation plans necessary for the community to be eligible to participate in the NFIP.

TABLE 5.3: Hennepin County community’s participation in the National Flood Program (as of 2-01-2024)
[Community status book report for state MN \(fema.gov\)](#)

| Community Name | CID | Current Eff Map Date |
|-------------------------------|---------|----------------------|
| Bloomington | 274230B | 11/04/16 |
| Brooklyn Center | 270151B | 11/04/16 |
| Brooklyn Park | 270152B | 11/04/16 |
| Champlin | 270153B | 11/04/16 |
| Chanhassen (Hennepin, Carver) | 270051B | 12/21/18 |
| Corcoran | 270155B | 11/04/16 |
| Crystal | 270156B | 11/04/16 |
| Dayton | 270157B | 11/04/16 |
| Deephaven | 270158B | 11/04/16 |
| Eden Prairie | 270159B | 11/04/16 |
| Edina | 270160B | 11/04/16 |
| Excelsior | 270161B | 11/04/16 |
| Golden Valley | 270162B | 11/04/16 |
| Greenfield | 270673B | 11/04/16 |
| Greenwood | 270164B | 11/04/16 |
| Hanover (Hennepin, Wright) | 270540B | 11/04/16 |
| Hopkins | 270166B | 11/04/16 |

2024 Hennepin County All-Jurisdiction Hazard Mitigation Plan
 Volume 1- Background and County Profile

| Community Name | CID | Current Eff Map Date |
|--------------------------------|---------|----------------------|
| Independence | 270167B | 11/04/16 |
| Long Lake | 270168B | 11/04/16 |
| Loretto | 270659B | 11/04/16 |
| Maple Grove | 270169B | 11/04/16 |
| Maple Plain | 270170B | 11/04/16 |
| Medicine Lake | 270690B | 11/04/16 |
| Medina | 270171B | 11/04/16 |
| Minneapolis | 270172B | 11/04/16 |
| Minnetonka | 270173B | 11/04/16 |
| Minnetonka Beach | 270174B | 11/04/16 |
| Minnetrista | 270175B | 11/04/16 |
| Mound | 270176B | 11/04/16 |
| New Hope | 270177B | 11/04/16 |
| Orono | 270178B | 11/04/16 |
| Osseo | 270658B | NSFHA |
| Plymouth | 270179B | 11/04/16 |
| Richfield | 270180B | 11/04/16 |
| Robbinsdale | 270181B | 11/04/16 |
| Rockford (Wright, Hennepin) | 270182B | 11/04/16 |
| Rogers | 270775B | 11/04/16 |
| Shorewood | 270185B | 11/04/16 |
| Spring Park | 270168B | 11/04/16 |
| St. Anthony (Ramsey, Hennepin) | 270716# | 02/16/12 |
| St. Bonifacius | 270183B | 11/04/16 |
| St. Louis Park | 270184B | 11/04/16 |
| Tonka Bay | 270187B | 11/04/16 |
| Wayzata | 270188B | 11/04/16 |
| Woodland | 270189B | 11/04/16 |

NSFHA- No special flood hazard area- All Zone C

TABLE 5.3

TABLE 5.4: Local Implementation of National Flood Insurance Program requirements as of March, 2024.

C2a

| Local Implementation of National Flood Insurance Program Requirements | | | | | |
|--|---|---|--|--|---|
| Municipality | Has adopted NFIP minimum floodplain management criteria via Local Regulation. | Has implemented and enforce Local Floodplain Management Regulations for Special Flood Hazard Areas. | Has partnered with another agency to enforce Local Floodplain Management Regulations for Special Flood Hazard Areas. | Has appointed a local zoning department or building official to implement NFIP requirements. | Damaged structures are required to be repaired to current floodplain regulations. |
| Bloomington | Chapter 19, 21 | Y | N | Y | Y |
| Brooklyn Center | Chapter 152, section 224 | Y | N | Y | Y |
| Brooklyn Park | Section 152 | Y | N | Y | Y |
| Champlin | Chapter 114 | Y | N | Y | Y |
| Corcoran | Chapter 10 | Y | N | Y | Y |
| Crystal | Section 515 | Y | N | Y | Y |
| Dayton | Chapter 1000, 1001.09 | Y | N | Y | Y |
| Deephaven | Section 1360 | Y | N | Y | Y |
| Eden Prairie | Chapter 11, Section 11 | Y | N | Y | Y |
| Edina | Chapter 36, Article 10 | Y | N | Y | Y |
| Excelsior | Appendix E, Article 61 | Y | N | Y | Y |
| Golden Valley | Chapter 11 | Y | N | Y | Y |
| Greenfield | 152.075 | Y | N | Y | Y |
| Hanover | Chapter 10 | Y | N | Y | Y |
| Hopkins | Article 12 | Y | N | Y | Y |
| Independence | Chapter 5, Section 506 | Y | N | Y | Y |
| Long Lake | Section 17B | Y | N | Y | Y |
| Loretto | Section 413:05 | Y | N | Y | Y |
| Maple Grove | Article 7, Division 4 | Y | N | Y | Y |
| Maple Plain | Chapter 10, Article 2 | Y | N | Y | Y |
| Medicine Lake | Ordinance 86 | Y | Y* | Y | Y |
| Medina | Section 826.74 | Y | N | Y | Y |
| Minneapolis | Article 7 | Y | N | Y | Y |
| Minnnetonka | Section 300.24 | Y | N | Y | Y |
| Minnnetonka Beach | Section 512 | Y | N | Y | Y |
| Minnetrستا | Section 510.05 | Y | N | Y | Y |
| Mound | Chapter 113 | Y | N | Y | Y |

2024 Hennepin County All-Jurisdiction Hazard Mitigation Plan
 Volume 1- Background and County Profile

| Local Implementation of National Flood Insurance Program Requirements | | | | | |
|--|---|---|--|--|---|
| Municipality | Has adopted NFIP minimum floodplain management criteria via Local Regulation. | Has implemented and enforce Local Floodplain Management Regulations for Special Flood Hazard Areas. | Has partnered with another agency to enforce Local Floodplain Management Regulations for Special Flood Hazard Areas. | Has appointed a local zoning department or building official to implement NFIP requirements. | Damaged structures are required to be repaired to current floodplain regulations. |
| New Hope | Appendix D | Y | N | Y | Y |
| Orono | Article 8 | Y | N | Y | Y |
| Osseo | Chapter 154 | Y | N | Y | Y |
| Plymouth | Section 21660 | Y | N | Y | Y |
| Richfield | Section 550 | Y | N | Y | Y |
| Robbinsdale | Section 530 | Y | N | Y | Y |
| Rockford | 1001.22 | Y | N | Y | Y |
| Rogers | Article 125-VI | Y | N | Y | Y |
| Saint Anthony Village | Chapter 154 | Y | N | Y | Y |
| Saint Bonifacius | Chapter 154 | Y | N | Y | Y |
| Saint Louis Park | Article 4, Div 11 | Y | N | Y | Y |
| Shorewood | Chapter 1101 | Y | N | Y | Y |
| Spring Park | Article 6 | Y | N | Y | Y |
| Tonka Bay | Chapter 1040 | Y | N | Y | Y |
| Wayzata | Chapter 806 | Y | N | Y | Y |
| Woodland | Chapter 10 | Y | N | Y | Y |

5.4 Repetitive Loss Properties B2c

A Repetitive Loss property is any insurance building for which two or more claims of more than \$1,000 were paid by the National Flood Insurance Program (NFIP) within any rolling ten-year period, since 1978. A Repetitive loss property may or may not be currently insurance by the NFIP.

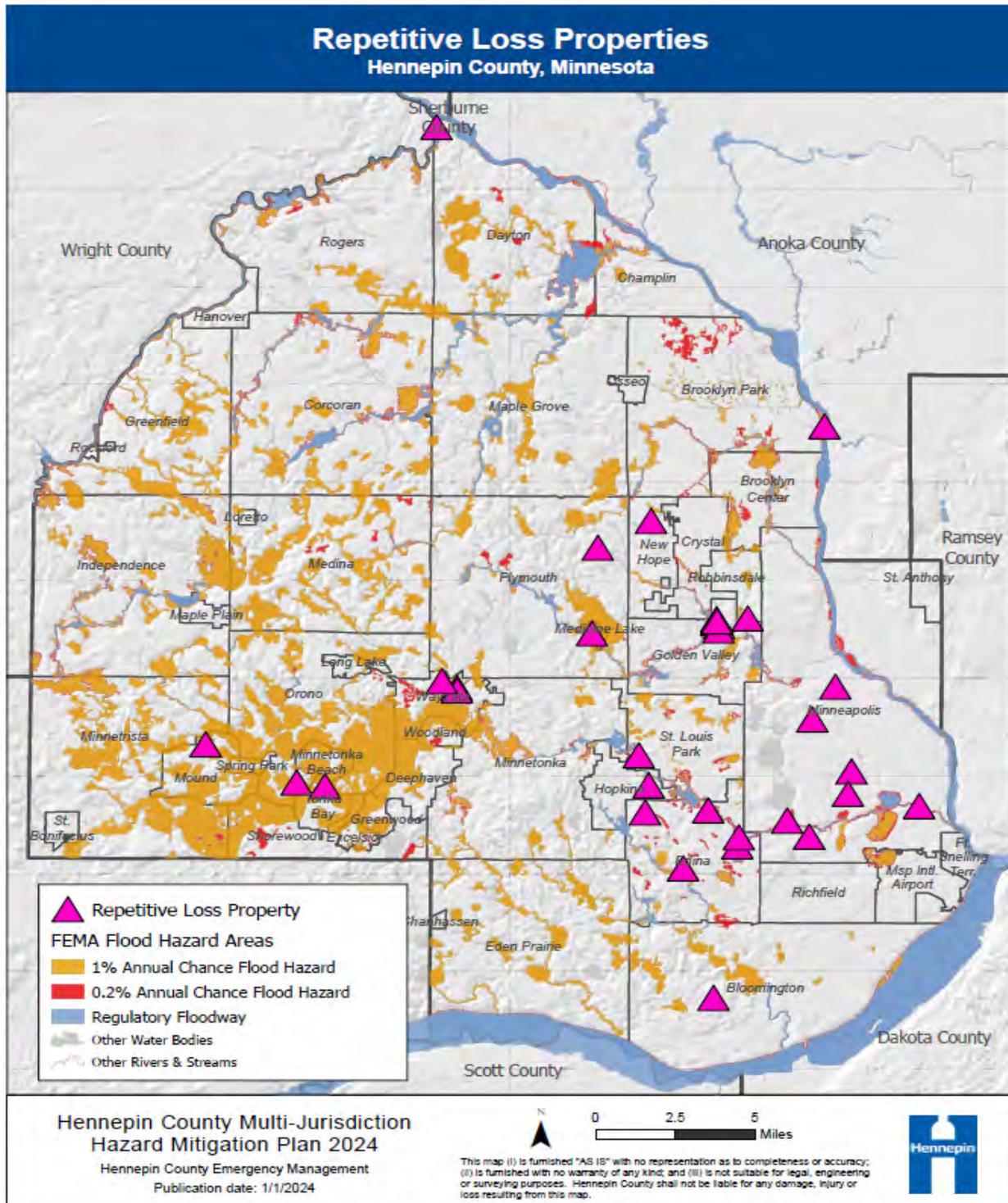


TABLE 5.4: Hennepin County Repetitive Loss Properties by Jurisdiction

| Jurisdiction | Number of Repetitive Loss Properties | Type of Property |
|------------------|--------------------------------------|------------------|
| Bloomington | 1 | Residential |
| Brooklyn Park | 1 | Residential |
| Dayton | 1 | Residential |
| Edina | 5 | Residential |
| Golden Valley | 2 | Residential |
| Hopkins | 1 | Residential |
| Medicine Lake | 1 | Residential |
| Minneapolis | 7 | Residential |
| Mound | 1 | Residential |
| New Hope | 1 | Residential |
| Orono | 1 | Residential |
| Plymouth | 1 | Residential |
| Robbinsdale | 1 | Residential |
| Saint Louis Park | 1 | Residential |
| Tonka Bay | 1 | Residential |
| Wayzata | 2 | Residential |

5.5 Community Rating System (CRS)

There are currently 0 Hennepin County municipalities that participate in the Community Rating System (CRS).

The Community Rating System (CRS) recognizes and encourages community floodplain management activities that exceed the minimum NFIP standards. Depending upon the level of participation, flood insurance premium rates for policyholders can be reduced up to 45%. Besides the benefit of reduced insurance rates, CRS floodplain management activities enhance public safety, reduce damages to property and public infrastructure, avoid economic disruption and losses, reduce human suffering, and protect the environment. Technical assistance on designing and implementing some activities is available at no charge. Participating in the CRS provides an incentive to maintaining and improving a community's floodplain management program over the years. Implementing some CRS activities can help projects qualify for certain other Federal assistance programs.

In exchange for a community's proactive efforts to reduce flood risk, policyholders can receive reduced flood insurance premiums for buildings in the community. These reduced premiums reflect the reduced flood risk resulting from community efforts toward achieving the three CRS goals:

1. Reduce flood damage to insurable property.
2. Strengthen and support the insurance aspects of the NFIP.
3. Encourage a comprehensive approach to floodplain management.

Participation in the Community Rating System (CRS) is voluntary. By participating, communities earn credit points that determine classifications. There are 10 CRS Classes: Class 1 requires the most credit points and provides the largest flood insurance premium reduction (45 percent), while Class 10 means the community does not participate in the CRS or has not earned the minimum required credit points, and

2024 Hennepin County All-Jurisdiction Hazard Mitigation Plan
Volume 1- Background and County Profile

residents receive no premium reduction. The CRS Classes are based on completion of 19 creditable activities organized into 4 categories:

1. Public Information
2. Mapping and Regulations
3. Flood Damage Reduction
4. Warning and Response

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|------------------|---|
| SECTION 6 | HAZARD MITIGATION PLAN MAINTENANCE D |
|------------------|---|

This section describes the system that Hennepin County and participating jurisdictions have established to monitor, evaluate, and update the HMP; implement the mitigation plan through existing programs; and solicit continued public involvement with plan maintenance.

6.1. Monitoring, Evaluating, and Updating the Plan D1, D2

This section of the plan describes the ongoing methods to keep the plan current. It describes how the plan will be reviewed annually, how the public will be kept involved, and how the plan will be integrated into other planning mechanisms. It details the formal process that will ensure that this HMP remains an active and relevant document. The plan maintenance process includes a schedule for monitoring and evaluating the plan annually, as well as revising it every five years. This section also describes how the county will integrate public participation throughout the plan maintenance process.

Minimum changes have been made to these processes since the 2018 plan adoption. However, COVID-19 did change the way meetings were conducted. Many meetings were put on hold. Remote and hybrid work were eventually developed which still delayed much of the maintenance work as minimal representation attended these annual review meetings. Additional information will be presented at the Hennepin Emergency Managers Community quarterly meeting.

6.1.1. Monitoring D2a, D2b

HCEM is tasked with the overall responsibility of monitoring this HMP. HCEM will develop a Local Mitigation Strategy Working Group (LMS). The HMP project will continually be under review as FEMA guidance is always evolving. This guidance will inform participants of funding sources, current project considerations for application, and assist in prioritizing funding availability for participating jurisdictions. By monitoring the implementation of the plan, HCEM and the LMS will be able to assess which projects are moving forward, which projects we be delayed, which have been completed, and which are no longer feasible or require additional planning as they no longer meet federal or state criteria. Finally, the LMS will periodically inform the public about the progress and success of its efforts through various community website or social media platforms.

The LMS will continue to meet regularly and communicate via email. As part of the monitoring, evaluation and enhancement process, a participating jurisdiction meeting will be held in the 3rd Quarter (Jul, Aug, Sept) annually, to create a best practice program. The LMS will be able to address the following: FEMA updates, State updates, grant updates, and the application process. Attendance and minutes must be kept supporting this HMP update in future revisions.

6.1.2. Evaluation D2b

Plan recommendations will be reviewed at the annual LMS meeting. The meeting will be used to determine the effectiveness of mitigation plan programs and make changes that may affect mitigation projects, priorities, or funding sources. As part of the evaluation process, responsible agencies will be invited to share any updates on their mitigation projects at the meeting.

In addition, the following questions will be asked:

- Are there any new hazards developed not addressed in the plan?

- Have any communities experienced natural disasters that will need to be added in the plan?
- Have any unanticipated developments occurred that is vulnerable to hazards (CIKR, zoning, land use)?
- Are there any additional mitigation ideas that need to be incorporated?
- What projects are being considered, been initiated, and or completed?
- What are the barriers to completing projects identified in the plan?
- Are our HMP goals still reflective of community priorities to reduce hazard vulnerabilities?
- Is there an open Presidential Disaster Declaration that has made mitigation monies available?

The purpose of these questions is to gauge community partners goals, objectives, and actions and if they are still current and what changes need to be made in the plan. An update will be required at the annual meeting and can be submitted any time to HCEM. The discussion will be documented so that when the plan is revised, findings can be considered or incorporated in the next five-year plan revision.

Finally, the LMS will also evaluate how overall strategies and policies that drive augmentation, revision, or implementation. Programs and policies for review may include but not limited to:

- Sustainability
- Critical Infrastructure
- Climate initiatives
- Underserved populations
- Economic Growth
- Growth Management
- Environmental Preservation
- Historic Preservation
- Redevelopment
- Health and/or safety
- Recreation
- Land use/zoning
- Public Education and Outreach
- Transportation
- Technology

6.1.3. Updating the Plan D2c

HCEM receives a one-year notification from Minnesota’s Homeland Security Emergency Management- State Hazard Mitigation Officer. This notification indicates that the current adopted plan will expire in approximately one year. This is the official notice to begin modifying the HMP.

Any of the following situations could trigger a review and update of the plan:

- Occurrence of a major natural disaster in Hennepin County
- Five-year plan expiration
- Change in state of federal regulations which direct or guide compliance.

The HMP will be periodically reviewed and updated by HCEM every five years unless it has undergone a more recent revision (with associated FEMA approval). At the five-year mark, several

questions will be asked:

- Do the goals address current and expected conditions?
- Meet the FEMA guidance elements list.
- Has risk changed for participating jurisdictions?
- What additional hazard events have occurred or have been tracked between the five-year planning period?
- Have the community capabilities changed with planning, administrative and technical, fiscal, training and education, and regulation and ordinance?
- What progress has been made to complete mitigation actions?
- How has the public remained involved over the past five years?
- Have a participating jurisdictions critical infrastructure prioritization changed (CFI 1-5)

6.2. Five Year Revision Procedure

When a major natural disaster occurs in Hennepin County, the staff from HCEM and the LMS working group will meet following the recovery effort to review and determine if changes will be required to the HMP. In the absence of a major natural disaster, the five-year review will take place during the 12-month period preceding the State of Minnesota HSEM plan expiration notification letter. Following proper notification for record, the Hennepin County Emergency Management Plans & Systems Integration Coordinator will convene a review committee, and with their assistance, carry out the following tasks:

- Create a timeline for completion.
- Determine if current goals are still valid?
- Meet one on one with each jurisdiction.
- Review community capability data.
- Compare historical hazards against local critical infrastructure.
- Prioritize continuity by identifying priority 1 critical facilities.
- Develop a mitigation projects list that would bring value and pay down risk for participating jurisdictions.
- Prepare a final draft. Submit to HSEM for FEMA element crosswalk compliance.
- Present to County Board for Adoption and submit adoption to State and FEMA
- Complete the participating jurisdiction plan adoption/resolution process and submit those by city resolutions to State and FEMA
- Receive FEMA approval letters for all participating jurisdictions.

6.3. Public Involvement D1a

The public is encouraged to be involved in the continual updates of the HMP. The following methods of public involvement are options to ensure they are successful in having access. As technology or accessibility matures, additional methods of public involvement will be implemented. For the previous 2018 plan, a redacted plan was available on Hennepin County's website for the past 5 years. An unredacted copy was provided to participating jurisdictions, departments, elected officials, and partner agencies. HCEM will continue to be the lead agency to ensure the public remains involved over the next five years via the following methods:

- HCEM will use social media via Facebook and Twitter to inform the public as to the availability of information and draft plan documents for review. This platform will be used extensively going

forward in engaging the public in ongoing hazard mitigation planning for public awareness.

- Each jurisdiction having a dedicated website can post a redacted HMP as received from the Plans & Systems Integration Coordinator for public consumption. The HC link can also be shared on their city web page, or a redacted copy can be imported into a city web site.
- HCEM and LMS working group will lead efforts to prepare and disseminate an annual fact sheet on status of hazard mitigation planning and implementation to all stakeholders. These materials will be passed out at various community engagement activities, regional planning working group meetings, and at Hennepin Emergency Management Community quarterly meetings.
- HCEM will continue to create a survey for the public that asks for feedback regarding their understanding of hazard mitigation and various hazards in their communities. These survey forms will be shared with participating jurisdictions for their use as well. These surveys will be distributed at various community engagement activities.

6.4. Implementation of the HMP through Existing Programs and Plans A4a, D3

All participating jurisdictions will need to integrate this HMP into relevant government decision-making processes or mechanisms, where feasible. This includes integrating the recommendations or actions of this HMP into other local planning strategies, processes, or by using local comprehensive or capital improvement plans, as a project bridge, where funding may be allocated from multi sources. All jurisdictions must be cognizant of their objectives and actions in that they do not increase hazard vulnerability in Hennepin County.

Although it is recognized that there are many possible benefits to integrating components of this Plan into other local planning strategy, the development and maintenance of this stand-alone HMP is very effective and an appropriate method ensuring successful implementation of local hazard mitigation projects.

TABLE 6-4A below includes existing processes and programs through which the HMP could be implemented. These processes and programs can also integrate this plan into their planning mechanisms. **E2c**

TABLE 6.4A Integration of Plans D3a, D3b, D3c

| Process | Action | Implementation of Plan |
|----------------|--|--|
| Administrative | Departmental or organizational work plans, policies, and procedural changes. | <ul style="list-style-type: none"> • 2019 State Hazard Mitigation Plan • HC Solid Waste Management Master Plan • HC Transportation Mobility 2040 Plan • HC 2021 Climate Action Plan • HC Natural Resources Strategic Plan 2015-2020 • HC 2040 Comprehensive Plan |
| Administrative | Other Organizations' Plans | <ul style="list-style-type: none"> • Three-Rivers Park District 2040 system Plan • Met Council's 2023-2028 Metro HRA and Regional Parks CIP • Minneapolis Parks and Recreation Board (MPRB) Land Policy • Minneapolis Resource Management Plan • 2017-2027 Nine Mile Creek Watershed District Water Management Plan |

2024 Hennepin County All-Jurisdiction Hazard Mitigation Plan
 Volume 1- Background and County Profile

| Process | Action | Implementation of Plan |
|----------------|---------------------------------|---|
| | | <ul style="list-style-type: none"> • 2015-2025 Bassett Creek Watershed Management Plan • 2018-2027 Lower Minnesota Watershed District Management Plan • 2018-2027 Richfield-Bloomington Watershed Management Plan • Three Rivers Park Sustainability Plan • Elm Creek Watershed Management Plan • Pioneer-Sarah Creek Watershed Third Generation Watershed Management Plan • West Mississippi Watershed Third Generation Water Management Plan • Shingle Creek Watershed – Third Generation Water Management Plan • Minnehaha Creek Watershed District Comprehensive Water Resources Management Plan and individual sub-water shed plans. • Municipality Surface Water Management Plans • Xcel Energy Upper Midwest Resources Plan 2016-2030 • Metropolitan Council 2040 Transportation Policy Plan • Metropolitan Council 2040 Water Resources Policy Plan • Metropolitan Council 2040 Regional Parks Policy Plan • Include reference to this plan in Area Planning Group Emergency Plans. • 2030 Regional Parks Capital Improvement Program • Municipality Comprehensive Plans • Municipality Storm Water Management Plans • Municipality Stream Bank Restoration/Stabilization Plans/Projects • Municipality Well Head Protection Plans • Include references in creation of ordinances/resolutions or public education campaigns. • Include reference in watershed district plans. • Include reference in County storm water management plan. • HC Emergency Operations Plan |
| Administrative | Job Descriptions | Unpaid internships/and or Paid On call staff to assist in HMP maintenance. |
| Budgetary | Capital and operational budgets | Review county and jurisdictional budgets to include line-item mitigation actions |

| Process | Action | Implementation of Plan |
|--------------|---|---|
| Regulatory | Ordinances and other directives | <ul style="list-style-type: none"> • Comprehensive planning - institutionalize hazards mitigation for new construction and land use. • Comprehensive Planning – institutionalize hazard mitigation techniques for new home construction (Windstorm Mitigation Manual) • Zoning and Ordinances • Building Codes - enforcement of codes or higher standard in hazard areas. • National Flood Insurance Program - Continue to participate in this program and increase participation throughout the county in the Community Rating System Program. • Continue to implement storm water management plans. • Municipality shoreline ordinances |
| Funding | Secure traditional sources of financing | <ul style="list-style-type: none"> • Apply for grants from federal or state government, nonprofit organizations, foundations, and private sources including Pre-Disaster Mitigation Program (PDM-DMA 2000), Flood Mitigation Assistance Program (FMA), and the Hazard Mitigation Grant Program (HMGP-Stafford Act, Section 404). • Research grant opportunities through U.S. Department of Housing and Urban Development’s Community Development Block Grant (CDBG). • Other potential federal funding sources include: <ul style="list-style-type: none"> - Stafford Act, Section 406 – Public Assistance Program Mitigation Grants - Federal Highway Administration - Catalog of Federal Domestic Assistance - United States Fire Administration - United States Small Business Administration Pre and Post Disaster Mitigation Loans - United States Department of Economic Development Administration Grants - United States Army Corps of Engineers - United States Department of Interior, Bureau of Land Management - Other sources yet to be defined |
| Partnerships | Develop creative partnerships, funding, and incentives. | <ul style="list-style-type: none"> • Public-Private Partnerships • Community Emergency Response Team (CERT) • Community Volunteers • State Cooperation • Hennepin County Natural Resources Partnership • In-Kind resources |

| | |
|------------------|-------------------|
| SECTION 7 | APPENDICES |
|------------------|-------------------|

| | | | |
|----------------------|--|-------------|-------------------|
| Appendix A | Regional Review Working Group Meeting Minutes | | |
| Reference to: | Section 3 | 3.12 | page 20-21 |

| | |
|---|--------------------------|
| Regional Review Working Group Meeting Minutes #1 | November 10, 2022 |
|---|--------------------------|



Hennepin County Memo

Emergency Management
 1600 Prairie Drive
 Medina, MN 55340-5421

Phone: 612-596-0250
 Fax: 763-478-4001
 TDD: 763-478-4030

DATE: 11/10/22

TO: Eric Waage

FROM: Bruce Kelii

SUBJECT: 2023 HMP Regional Review Working Group, Kick off, Meeting #1

The first meeting of the HMP Regional Review Working Group took place on November 10, 2022. The Working Group members present were:

- Bruce Kelii- Deputy Director- Hennepin County Emergency Management
- Scott Gerber- South Regional Chair- Eden Prairie Fire
- Mark Ray- North Regional Chair- Crystal Public Works
- Paul Falls- Lakes Regional Chair- Minnetrista Police
- Eric Gustafson- East Regional Chair- Office of Emergency Management- Minneapolis

The main agenda item for this kick-off meeting was for the Regional Review Working Group (RRWG) to receive notification that the Hazard Mitigation Plan is due for adoption. Review the 2018 HMP and to go over the FEMA Local Mitigation Handbook and review all 44 CFR 201.6 Local Mitigation Plan requirements. The RRWG has the overall responsibility of recommending plan revisions, while the Mitigation Planning Team, once determined, will be tasked with updating their jurisdiction mitigation project strategies, objectives and actions, risk assessment, prioritizing, and plan monitoring, evaluating and maintenance.

The next Regional Review Working Group Meeting is set for April 20, 2023.

Bruce Kelii
 Deputy Director
 Hennepin County Emergency Management
 612-596-0249
 bruce.kelii@hennepin.us

| | |
|---|-----------------------|
| Regional Review Working Group Meeting Minutes #2 | April 20, 2023 |
|---|-----------------------|



Hennepin County Memo

Emergency Management
1600 Prairie Drive
Medina, MN 55340-5421

Phone: 612-596-0250
Fax: 763-478-4001
TDD: 763-478-4030

DATE: 04/20/23

TO: Eric Waage

FROM: Bruce Kelii

SUBJECT: 2023 HMP Region Review Working Group, Meeting #2

The second meeting of the HMP Regional Review Working Group took place on April 20, 2023. The Working Group members present were:

- Bruce Kelii- Deputy Director- Hennepin County Emergency Management
- Scott Gerber- South Regional Chair- Eden Prairie Fire
- Mark Ray- North Regional Chair- Crystal Public Works
- Paul Falls- Lakes Regional Chair- Minnetrista Police
- Eric Gustafson- East Regional Chair- Office of Emergency Management- Minneapolis

The agenda

- Mitigation Planning Team makeup
- 44CFR Element Review
- 2020 Funding Distribution- all applications
- Hennepin County Natural Hazards
- Plan Vision/ Timeline
- Products and Documents
- Survey Completed
- Vision and Mission
- Next Steps

The bench of work discussion

1. Jurisdiction Participation
2. 2018 Mitigation Strategy Review, Updates, Progress reports
3. Critical Infrastructure Index (CF1-CF5 prioritizing)
4. Capability Assessments
5. Dashboards
6. Hazard Rankings

Next steps

1. Meet with Cities to prepare their plan portion.
2. Discuss assessments.
3. Strategy Reviews

4. CIKR updates
5. Capability Assessments
6. Dashboard Improvement
7. Historical Data

The next Regional Review Working Group Meeting is set for May 18, 2023.

Bruce Kelii
Deputy Director
Hennepin County Emergency Management
612-596-0249
bruce.kelii@hennepin.us

Regional Review Working Group Meeting Minutes #3 | **May 18, 2023**



Hennepin County Memo

Emergency Management
1600 Prairie Drive
Medina, MN 55340-5421

Phone: 612-596-0250
Fax: 763-478-4001
TDD: 763-478-4030

DATE: 5/18/23

TO: Eric Waage

FROM: Bruce Kelii

SUBJECT: 2023 HMP Region Review Working Group, Meeting #1

The third meeting of the HMP Regional Review Working Group took place on May 18, 2023. The Working Group members present were:

- Bruce Kelii- Deputy Director- Hennepin County Emergency Management
- Scott Gerber- South Regional Chair- Eden Prairie Fire
- Mark Ray- North Regional Chair- Crystal Public Works
- Paul Falls- Lakes Regional Chair- Minnetrista Police
- Eric Gustafson- East Regional Chair- Office of Emergency Management- Minneapolis

The agenda

- Progress Timeline Update
- Cities Scheduled
- Tutorial created to assist Mitigation Planning Teams
- Checklist- Products and Documents

The bench of work discussion

Priority of Schedule: Regional Chairs, Minneapolis, South, Lakes, North

Once initial meeting takes place touch meetings and discussions can follow until jurisdiction is satisfied through any communication format: one on one, Team Meet virtual, emails, or phone conversations.

| Hazard Mitigation Review Schedule 2023 | | | |
|--|----------|--------------|-------------------|
| Date | Time | City | Notes |
| May 26 Fri | 10a-12p | Crystal | 10-11a Mark |
| May 26 | 1p-3p | | |
| May 30 Tue | 10a-12p | Minneapolis | Eric |
| May 30 | 1p-3p | Minneapolis | Paul |
| June 6 Tue | 10a-12p | | |
| June 6 | 1p-3p | Eden Prairie | Jay Forster, Ulie |
| June 15 Thu | 1p-3p | Eden Prairie | Scott |
| June 16 Fri | 10a-12p | Edina | Andrew |
| June 16 | 1p-3p | | |
| June 20 Tue | 1p-3p | Minnetonka | Aaron |
| June 23 Fri | 10a-12p | | |
| June 23 | 1p-3p | | |
| June 27 Tue | 10a-12p | | |
| June 27 | 1p-3p | Richfield | Jay, Charlie |
| June 30 Fri | 10a-12p | Hopkins | Dale |
| June 30 | 1p-3p | | |
| July 7 Fri | 10a-12p | | |
| July 11 Tue | 10a-12p | | |
| July 11 | 1p-3p | | |
| July 13 Thu | 10a-12p | | |
| July 14 Fri | 10a-12p | | |
| July 18 Tue | 10a-12p | | |
| July 19 Wed | 10a-12p | | |
| 23 Dates | 46 Hours | 10/42 | |

Provide a tutorial for jurisdictions to review after initial review meeting.



The next Regional Review Working Group Meeting is set for June 22, 2023.

Bruce Kelii
 Deputy Director
 Hennepin County Emergency Management
 612-596-0249
 bruce.kelii@hennepin.us

| | | | |
|----------------------|---|-------------|-------------------|
| Appendix B | Social Media and Digital Media Press Release | | |
| Reference to: | Section 3 | 3.21 | page 29-30 |

| | |
|-------------------------------------|-------------------------|
| Hennepin County Website Post | December 1, 2022 |
|-------------------------------------|-------------------------|



— Hazard mitigation

Hazard mitigation is any sustained action taken to reduce or eliminate long-term risk to people and property from natural hazards such as flooding, storms, high winds, wildfires, earthquakes, etc. Mitigation efforts undertaken by communities will help to minimize damages to buildings and infrastructure, such as water supplies, sewers, and utility transmission lines, as well as natural, cultural and historic resources.

Hennepin County All-Jurisdiction Hazard Mitigation Plan

We are updating the All-Hazard Mitigation Plan, as required by the Robert T. Stafford Disaster Relief and Emergency Assistance Act. Local jurisdictions are required to update the plan every five years to remain eligible for pre-disaster and post-disaster mitigation grant programs. Community involvement and feedback are vital to the success of the plan.

Send us your feedback

The information you provide by completing the survey below will help us better understand your hazard concerns and can lead to mitigation activities to help lessen the impact of future hazard events.

- Deadline: January 31, 2023
- [Complete the survey](#)

2018 Plan

- [Volume 1 – background and county profile \(PDF\)](#)
- [Volume 2 – hazard inventory \(PDF\)](#)
- [Volume 3 – community and mitigation strategies \(PDF\)](#)

2024 Hennepin County All-Jurisdiction Hazard Mitigation Plan
Volume 1- Background and County Profile

Facebook and Instagram Post December 1, 2022

Boost post

It's time for mitigation planning! We are preparing for the five-year update of ...
December 1, 2022 at 12:37 PM
ID: 17949540627190254

Interactions
7 likes 0 comments

Performance

| Reach | Likes, comments and shares | Results |
|--|---|-----------------|
| Total: 268 Worst Best | Total: 8 Worst Best | Total: -- |
| This post reached more people than 86% of your 50 most recent Instagram posts and stories. | This post received more likes, comments and shares than 76% of your 50 most recent Instagram posts and stories. | Link clicks: -- |
| Reach: 268 | Likes: 7 Comments: 0 Shares: 1 | |

Feed preview

Hennepin County Emergency Management
December 1 at 12:22 PM

It's time for mitigation planning! We are preparing for the five-year update of the Hennepin County All-Hazards Mitigation Plan, and we want your input. Hazard Mitigation is a whole community process, and community involvement is an important part of that. We created this survey, so you and the community can participate in the planning process. If you live and/or work in Hennepin County, click the link below or use the QR code to take the survey. We are interested in your thoughts and what you have to say. Please share this survey with friends and family. Thank you for taking the time to complete the survey!

forms.office.com/g/C8J9t0n1a

The survey will close on January 31, 2023.

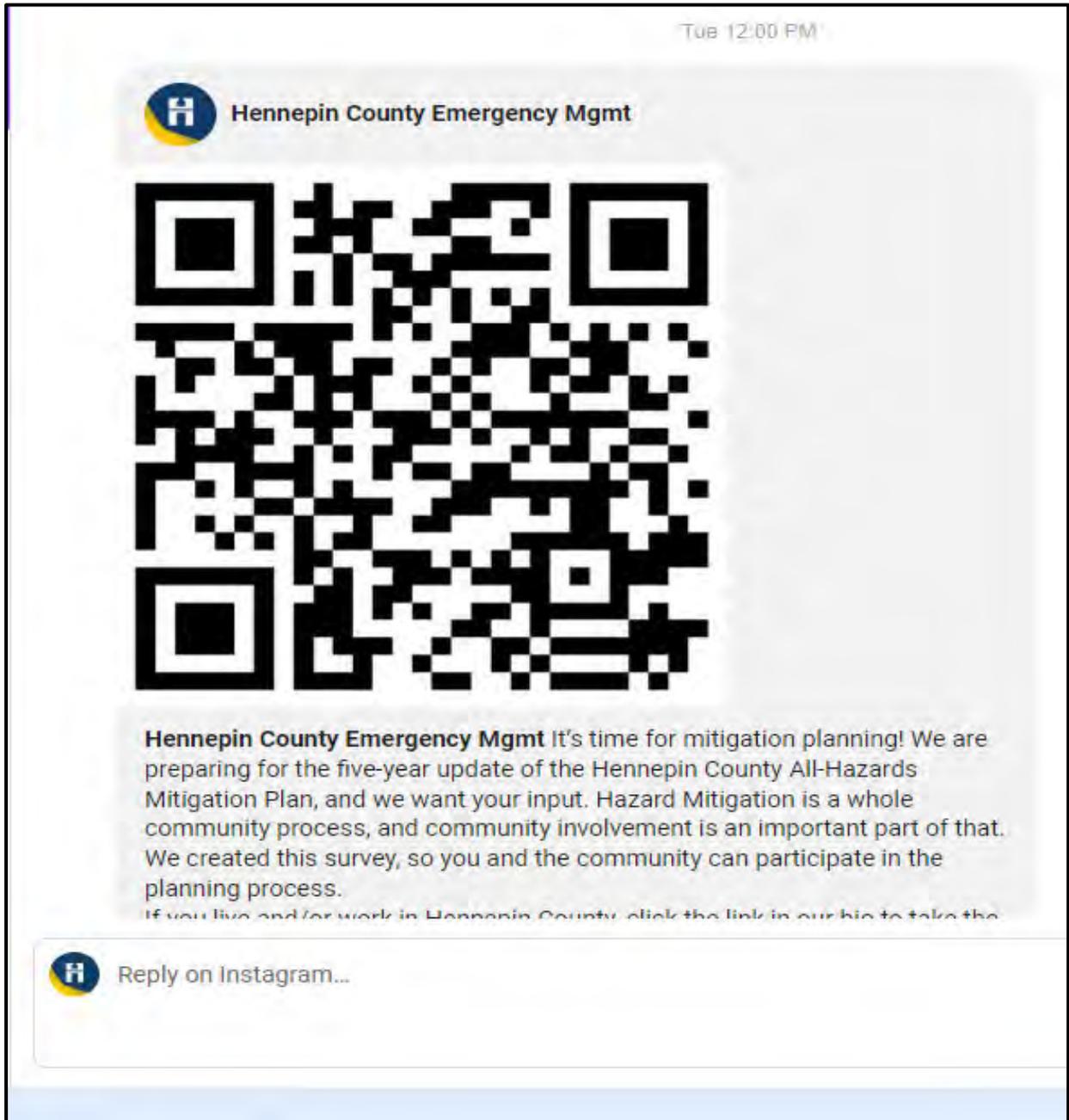
What is Hazard Mitigation?
Hazard mitigation is any sustained action taken to reduce or eliminate long-term risk to people and property from natural hazards such as flooding, storms, high winds, wildfires, earthquakes, etc.

Boost this post to reach up to 491 more people if you spend \$14. **Boost post**

3 likes 6 shares

Like Comment Share

Instagram Post | December 5, 2022



Example support email

December 7, 2022

From: Mark Ray
Sent: Wednesday, December 7, 2022 4:55 PM
Cc: 'Harrison.Loebertmann@hennepin.us' <Harrison.Loebertmann@hennepin.us>
Subject: FW: HC Hazard Mitigation Survey is now LIVE

Hey All,

HCEM has asked that I share the attached and below information with you.

Short version: Please help publicize this survey that HCEM is doing.

Hennepin County Emergency Management is preparing for the five-year update of the All-Hazards Mitigation Plan, and they want your input! Hazard Mitigation is a whole community process, and community involvement is an important part of that. HCEM created this survey, so you and the community can participate in the planning process. If you live and/or work in Hennepin County, follow the link below to take the survey. They are interested in your thoughts and what you have to say, so we sincerely appreciate you taking the time to do this. Please share this survey with your friends and family too. The more responses we get, the better! <https://forms.office.com/g/C8RiibfnYa>

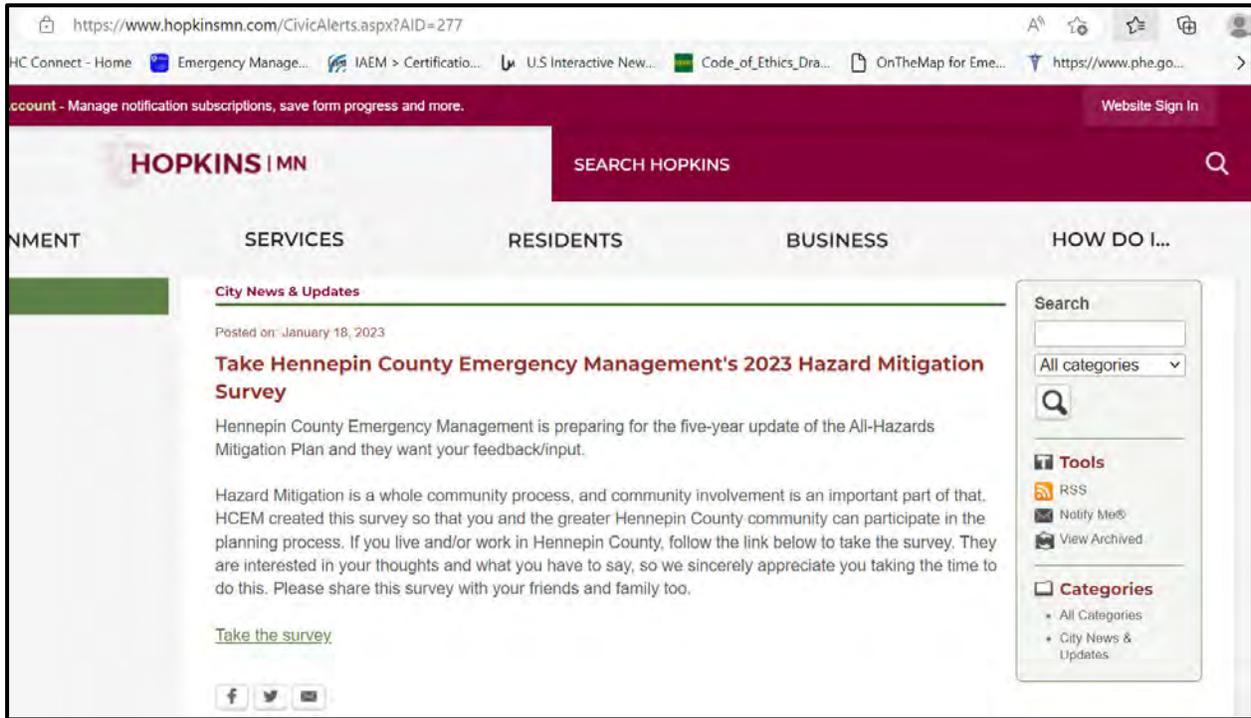
Thank you,



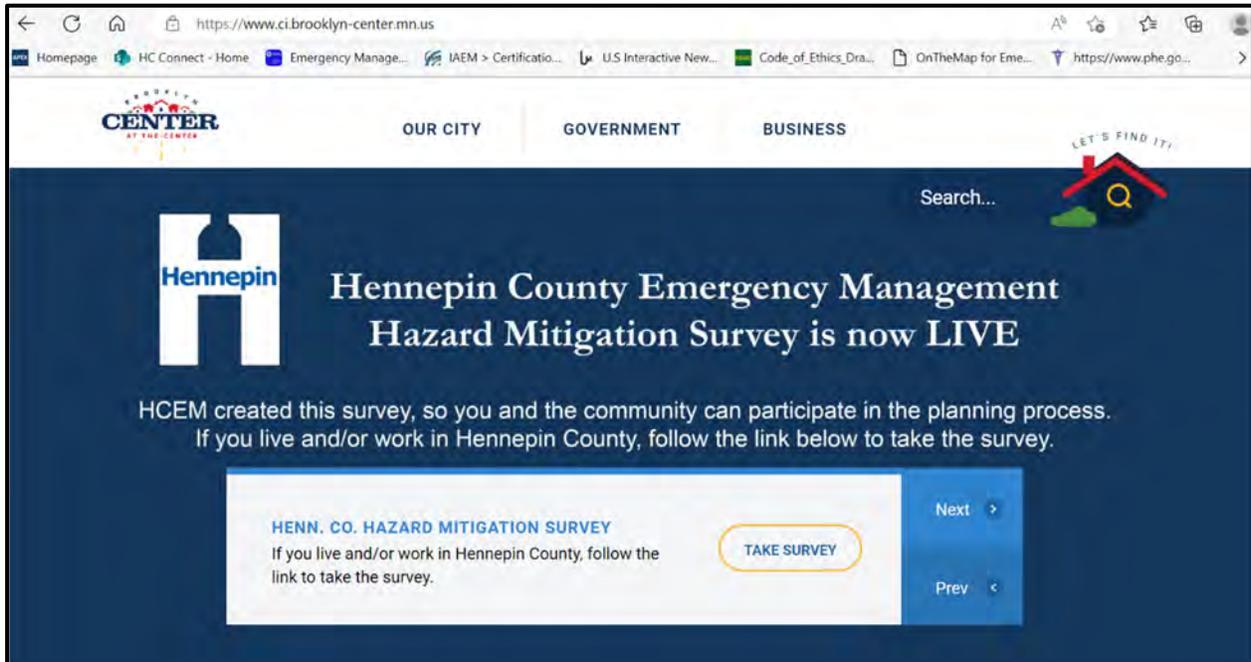
Mark Ray, PE
Director of Public Works/City Engineer, City of Crystal
763-531-1160 | Main: 763-531-1000 | www.crystalmn.gov
4141 Douglas Dr. N. | Crystal, MN 55422-1696

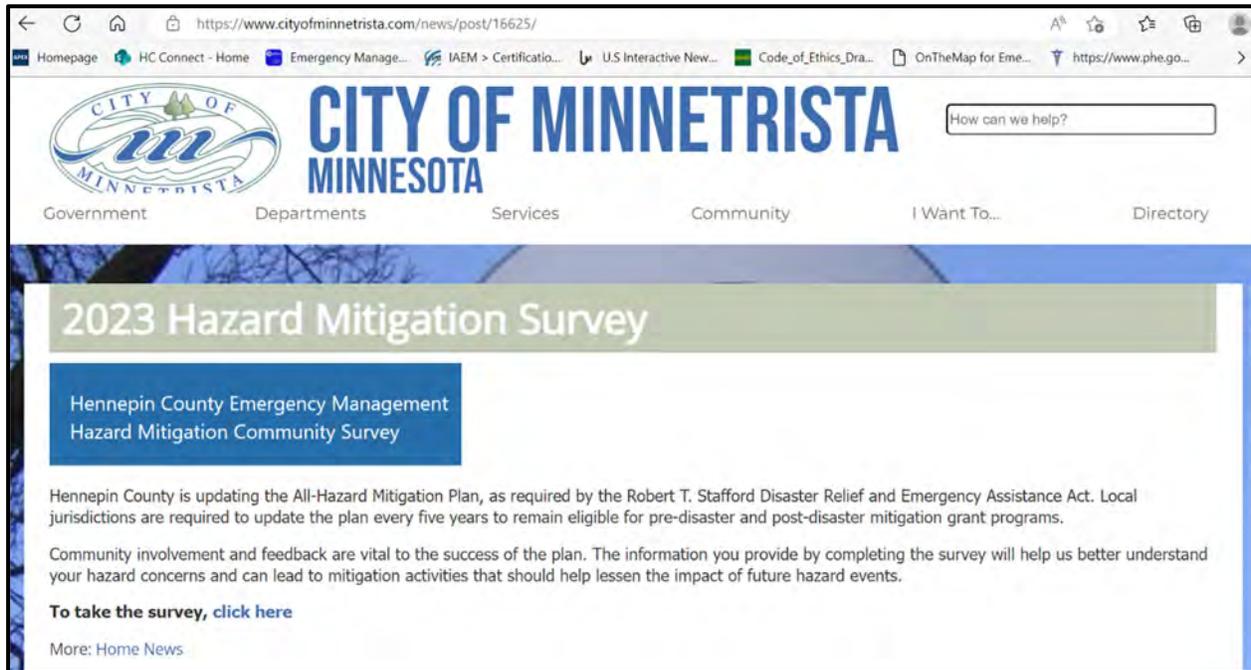


Hopkins Website Post | **January 18, 2023**



Brooklyn Center Website Post | **January 18, 2023**

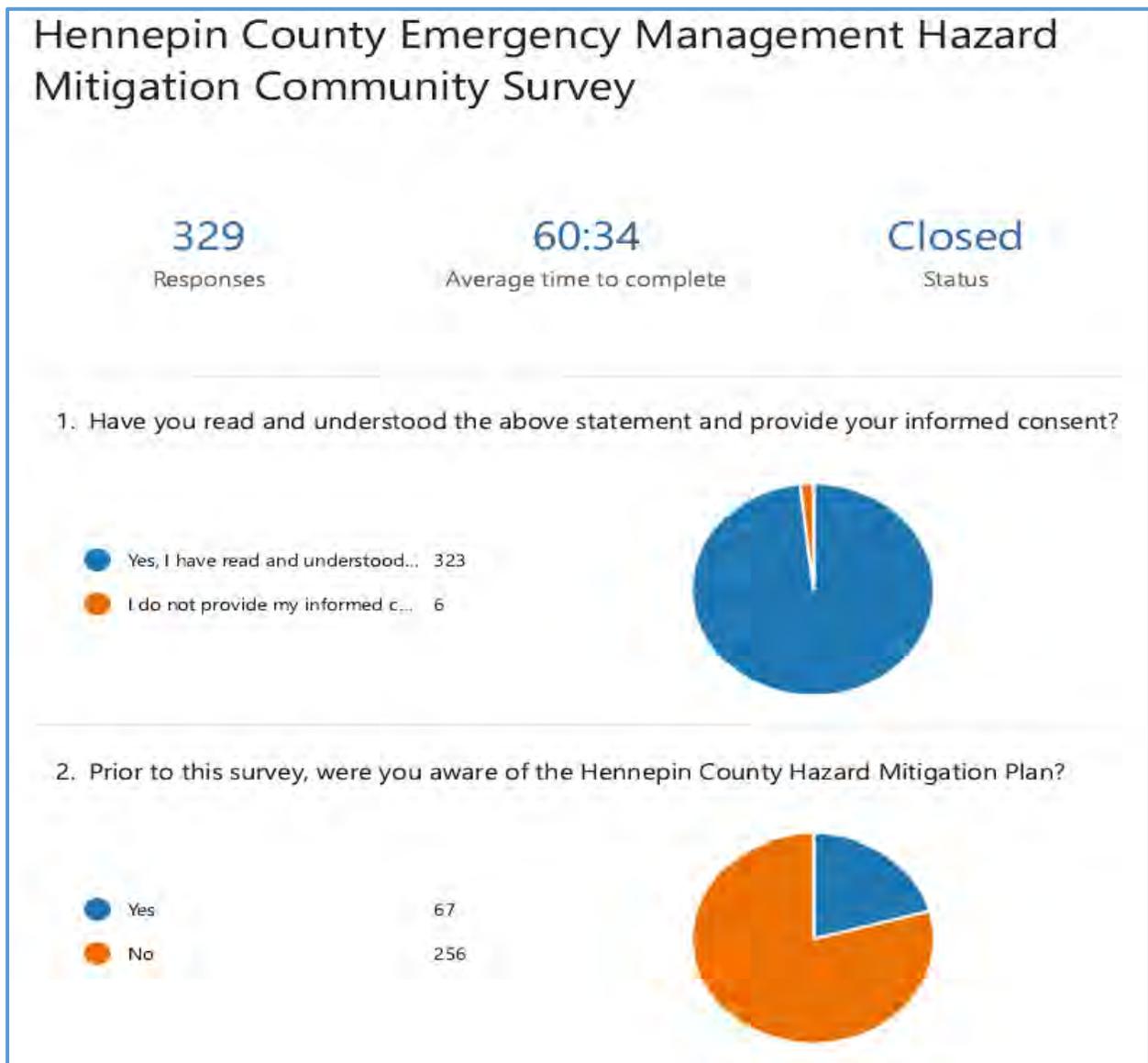


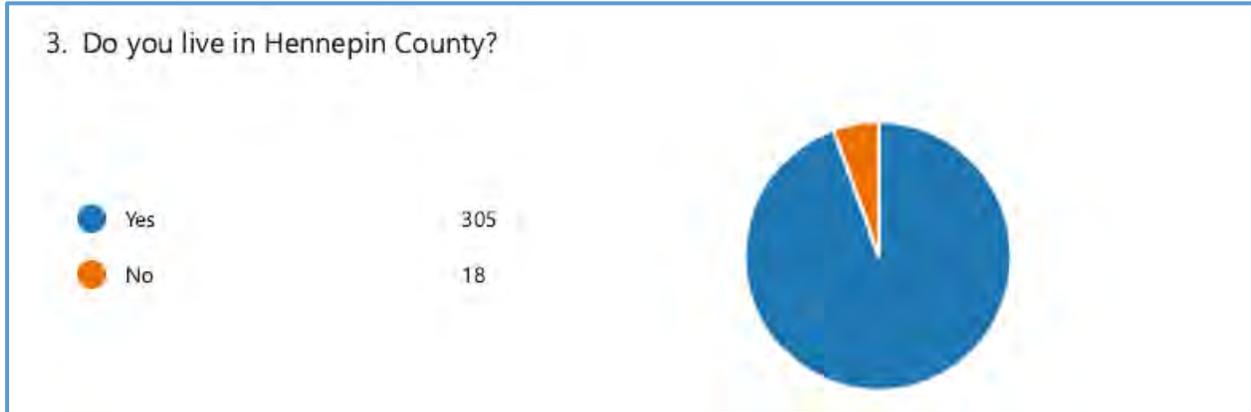


| | | | |
|----------------------|-----------------------------|-------------|----------------|
| Appendix C | Survey Questionnaire | | |
| Reference to: | Section 3 | 3.22 | Page 31 |

PUBLIC INVOLVEMENT RESULTS
Questionnaire Analysis

329 people responded to the survey. To access the questionnaire, participants were provided an informed consent form letting them know that their information was voluntary, that any free response questions were optional, and that the results would be published as part of the 2024 HMP. We also wanted to know how many respondents knew that a Hazard Mitigation Plan existed. 78% of the respondents did not know the plan existed. This shows that just by participating in the questionnaire, people were learning about mitigation. The survey asked if they were residents of Hennepin County. Of the 329 responses, 18 indicated they did not reside in Hennepin County.

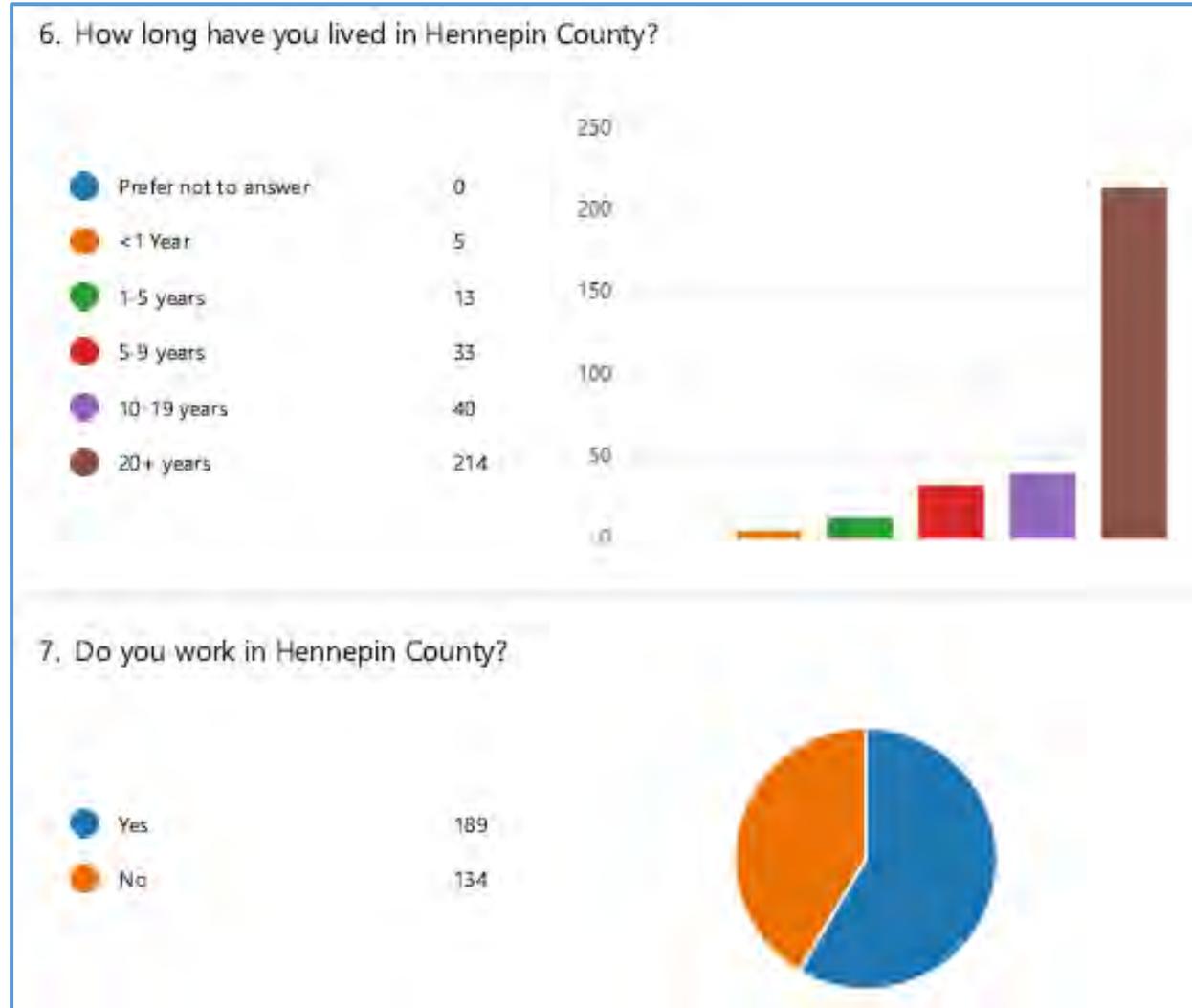




The next few questions pertained to residency, employment, and city of employment. The city with the highest participation was Brooklyn Center at 22 %, second was Crystal with 12%. We had participants from 30 of the 47 cities to include Fort Snelling and one choosing “prefer not to answer” in Hennepin County.



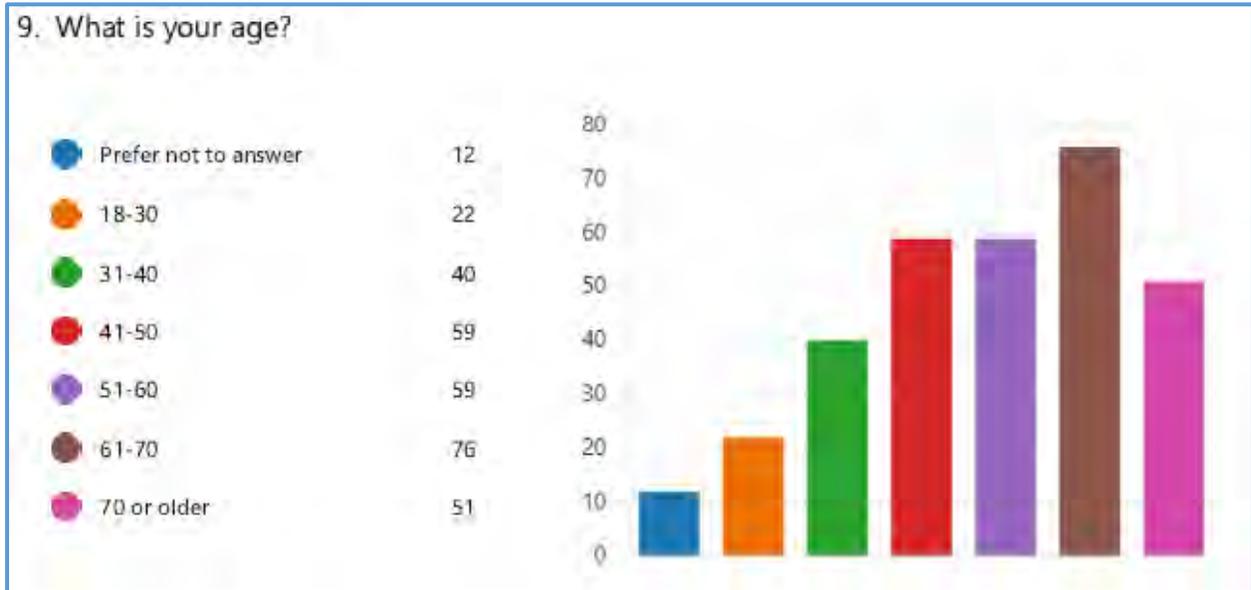
An overwhelming 65% of the respondents have lived in Hennepin County 20 or more years. 57% responded that they work within Hennepin County.



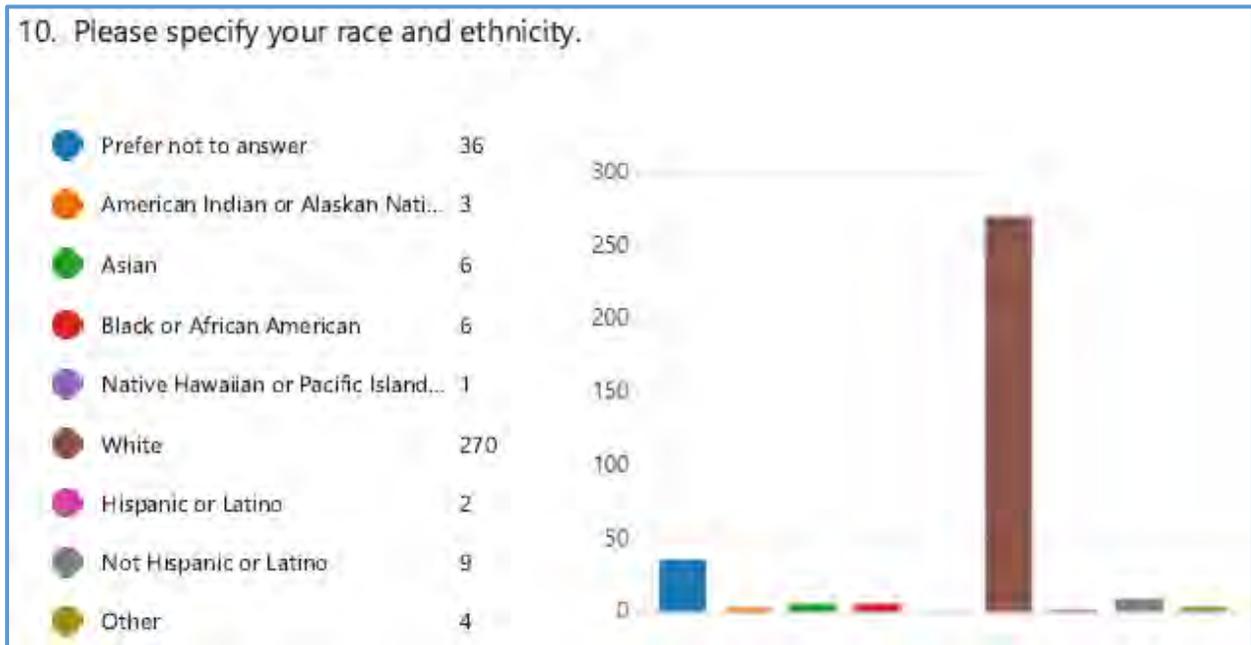
Survey participants worked in 29 different cities with 14% of the respondents working in Minneapolis.



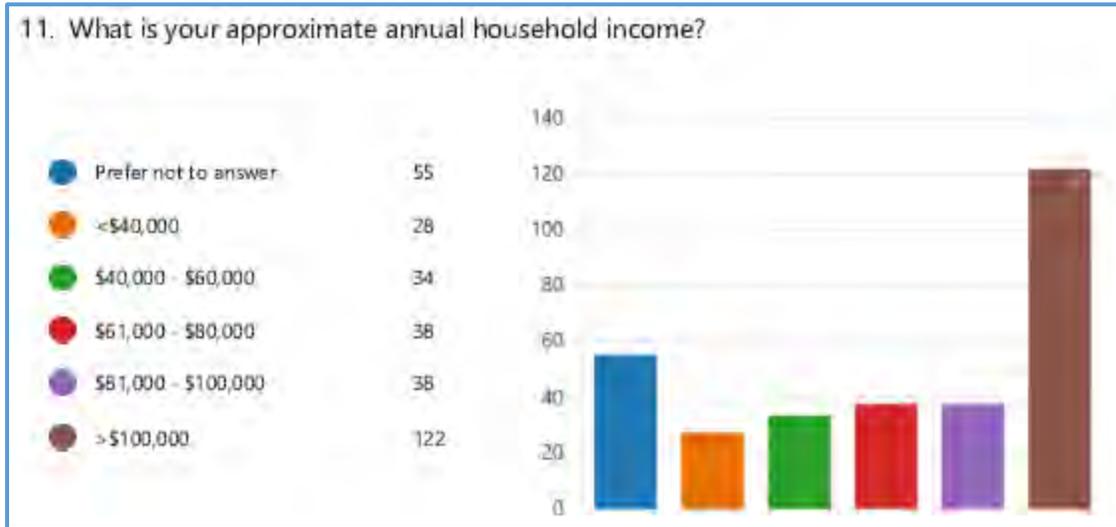
Some personal information was asked. The largest age demographic to respond was between the ages of 61-71 or 23%



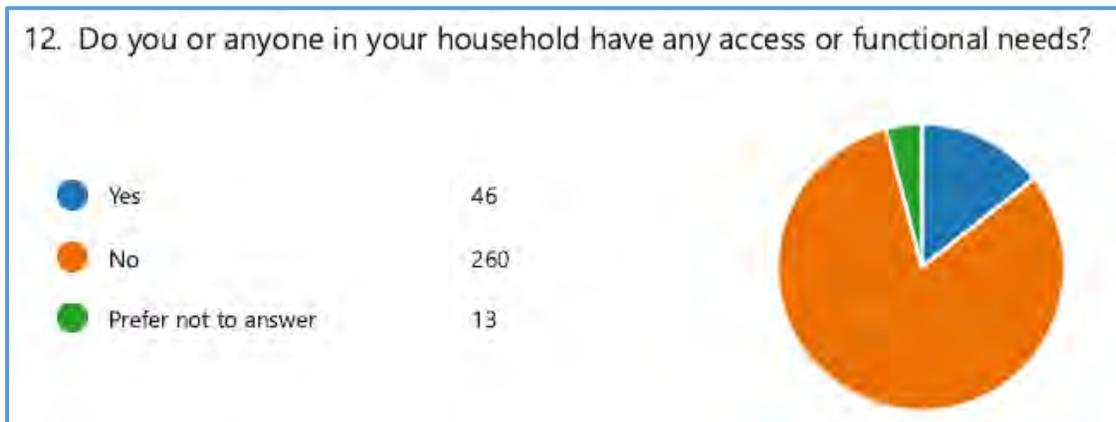
82% of the respondents were white, with 11% preferring not to answer.



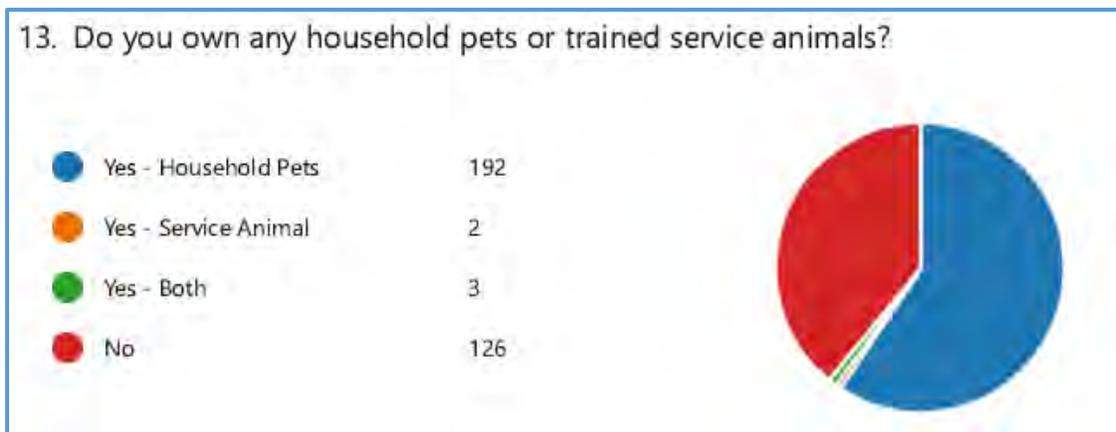
Household information was surveyed with questions about income, access and functional needs, and pets or service animals. 23% of the respondents replied as making less than \$60K.



14% said “yes” they have access and functional needs.

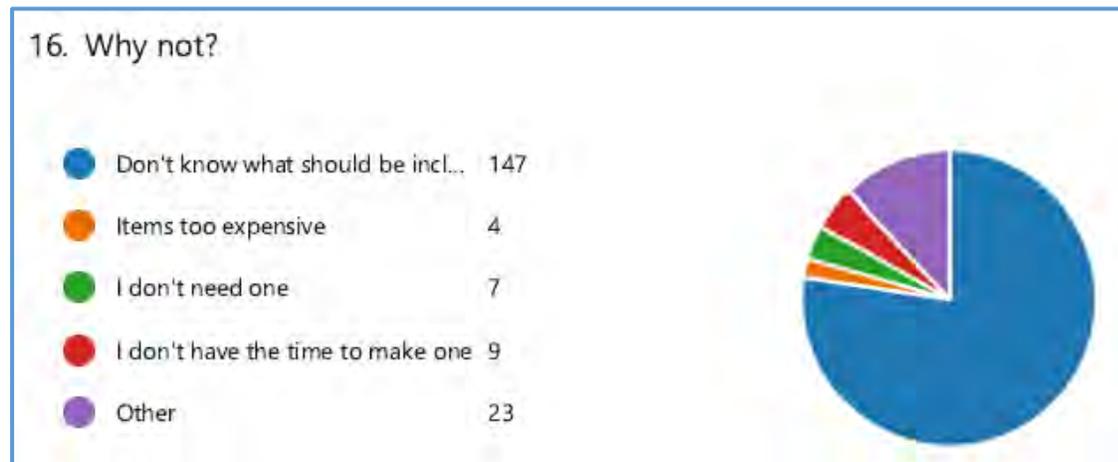
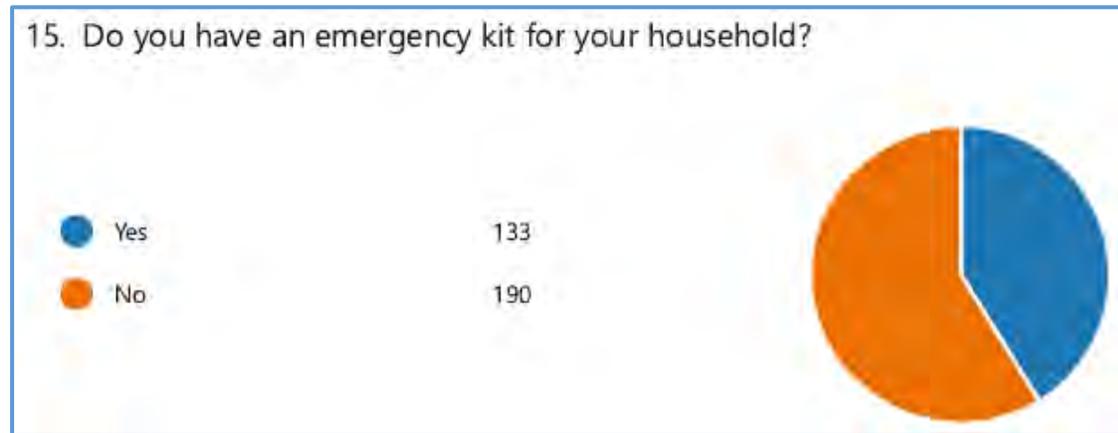


59% of respondents had pets and or service animals. With 70% not having an emergency plan for their animals.

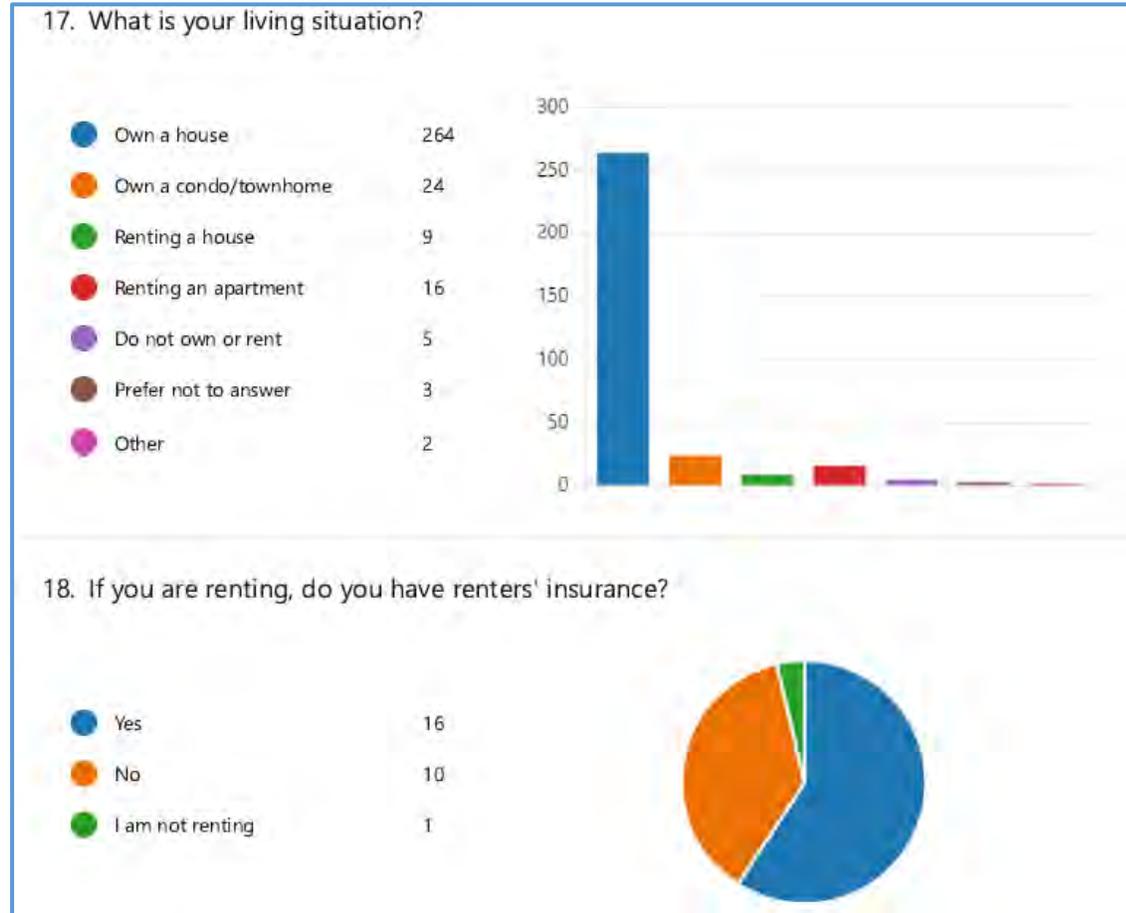




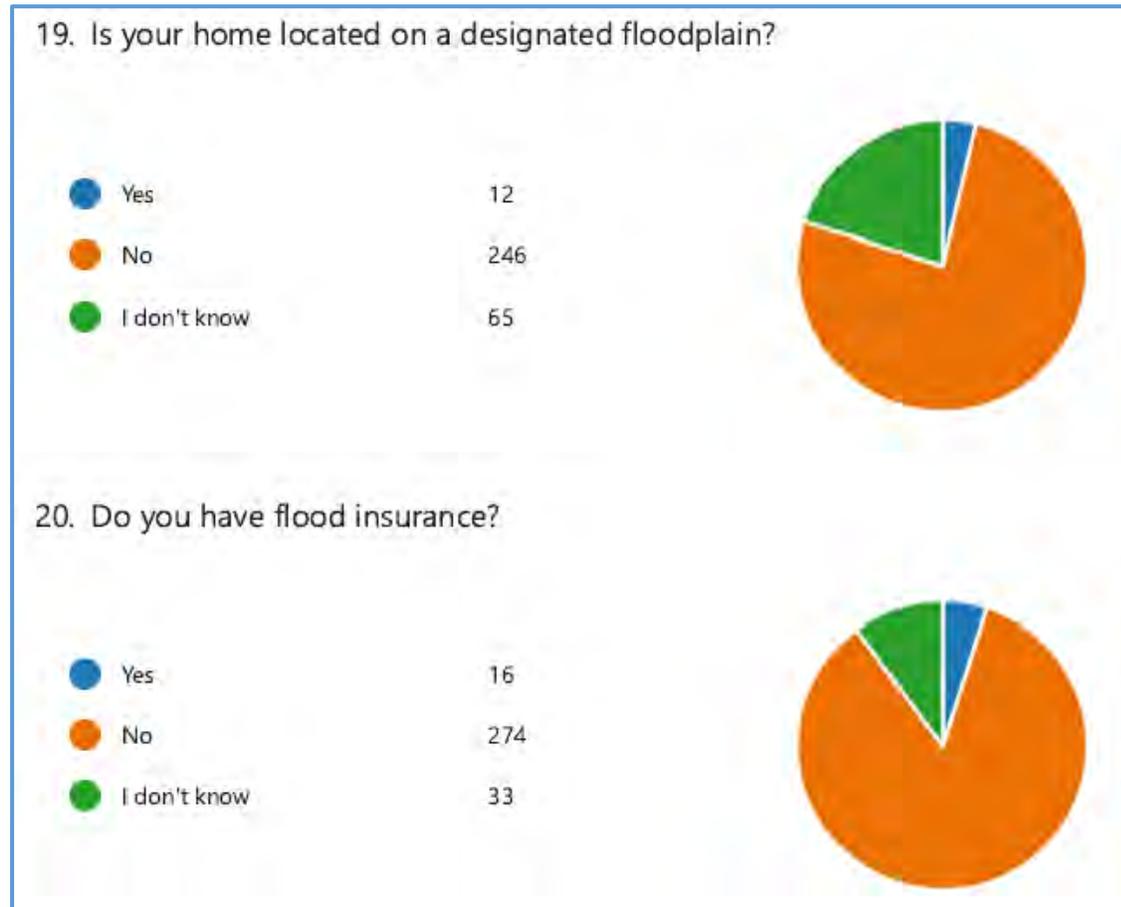
Two questions were asked about having emergency kits. 59% of those responses said that they “did not.” The reason given by 77% of the respondents was that they did not know what is included in making one.



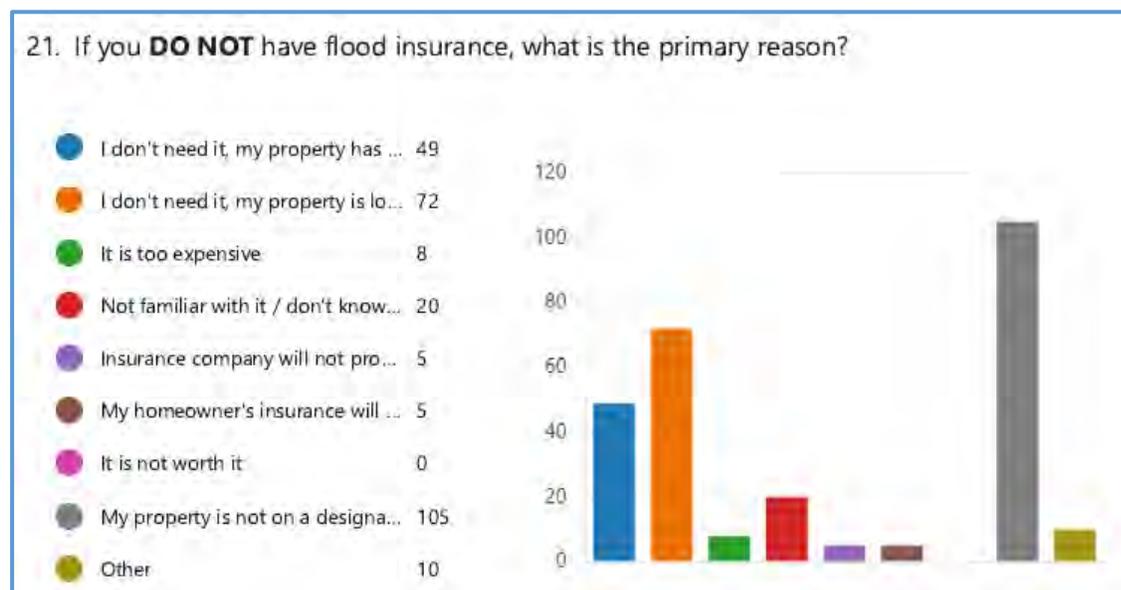
Two questions were asked about living situation and renters' insurance. 82% own their home. 59% of renters carry insurance.



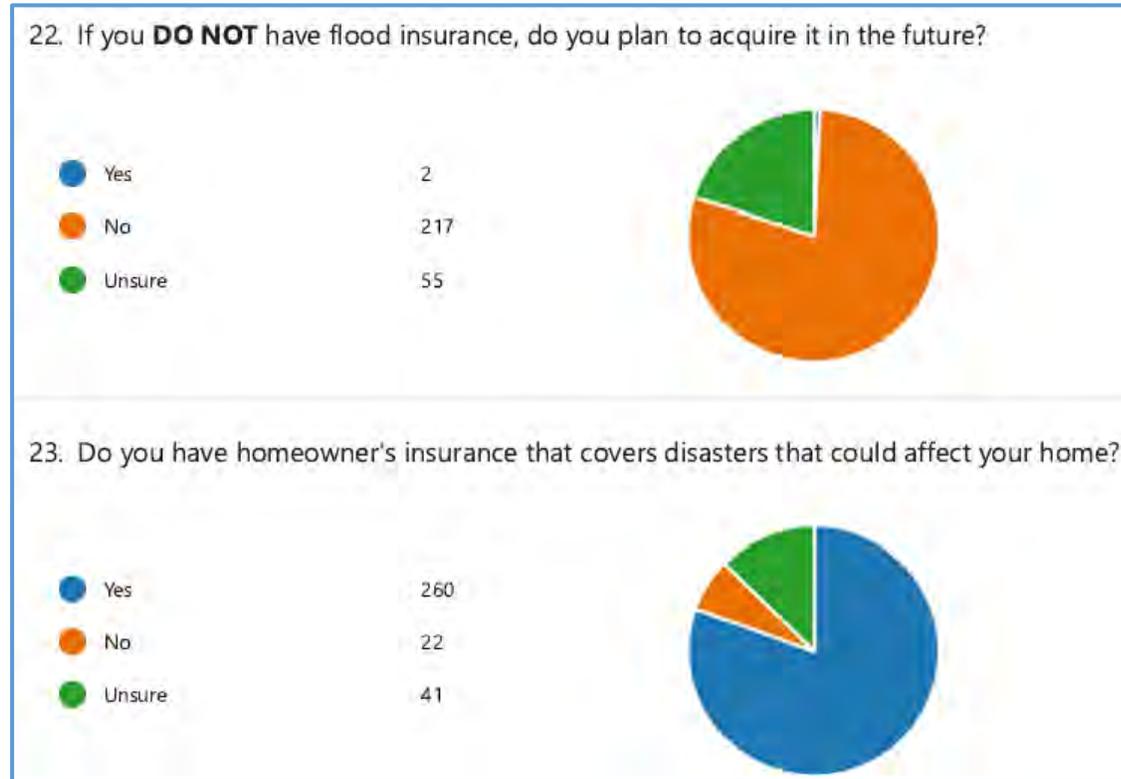
Several questions were included with floodplain and flood insurance. 4% live in a flood plain and 20% wasn't sure if they lived in a floodplain with 5% of all respondents having flood insurance.



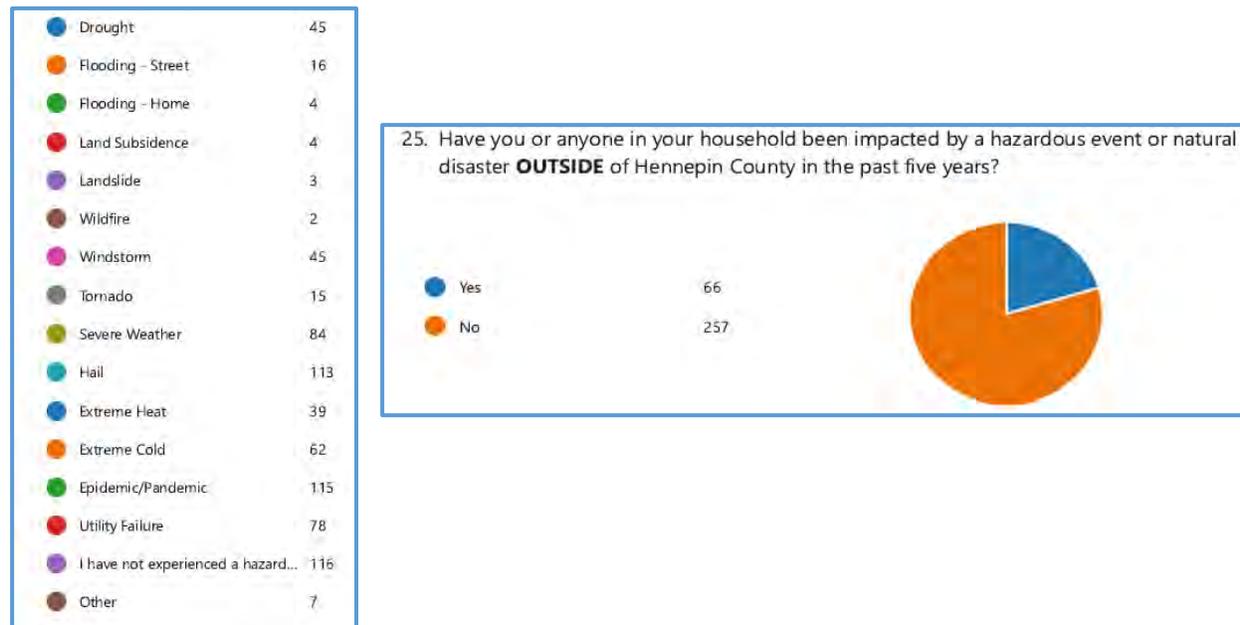
For the 83% not requiring or needing insurance. 7% was not familiar with it or don't know if they need it.



80% of the respondents have homeowner coverage if damages occur.

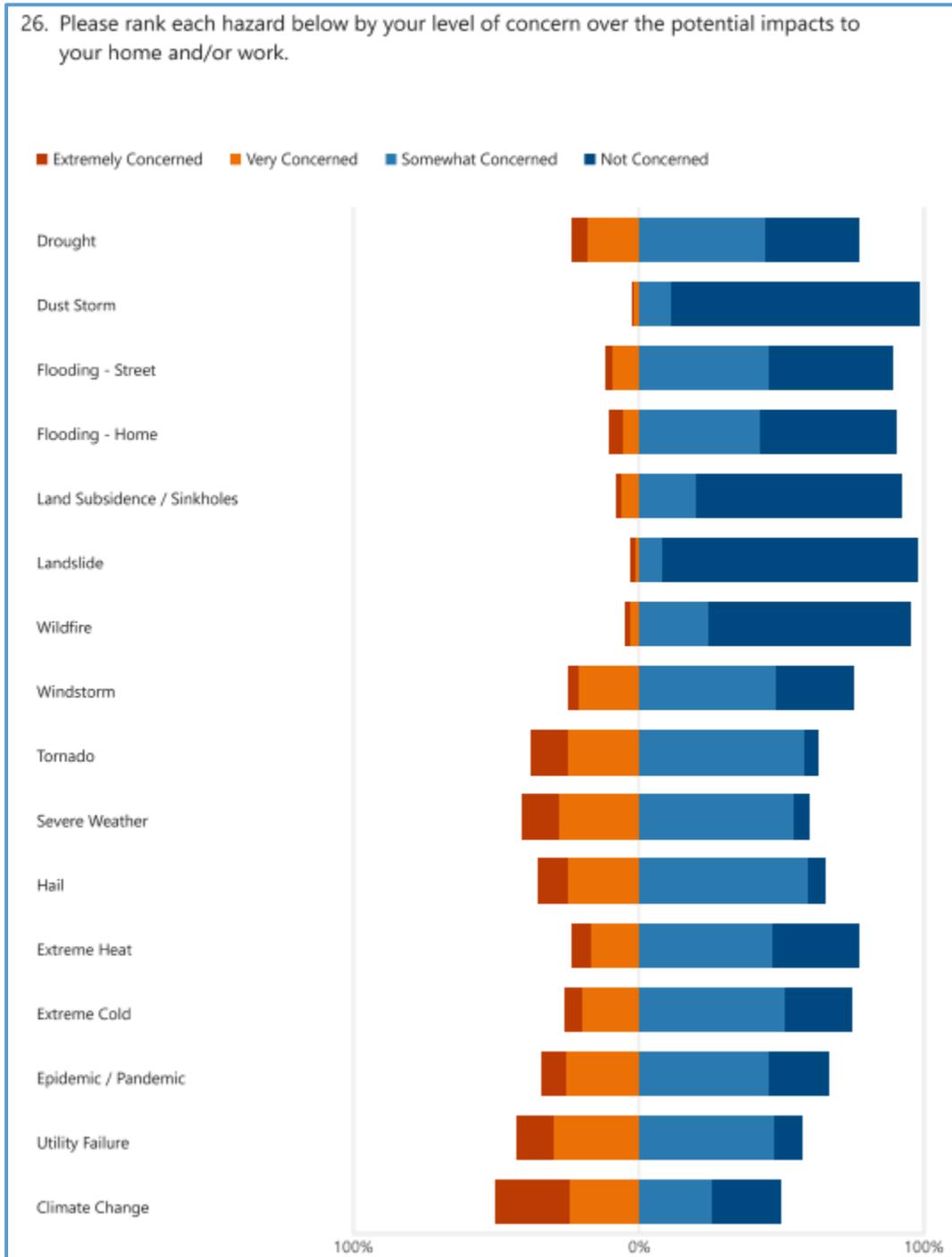


Two questions addressed if a respondent was impacted by a disaster in the past 5 years. If so, what did they experience? They were able to mark all that apply. 15% were impacted by pandemic, 15% were impacted by hail, and 11% impacted by severe weather.



The respondents were able to rank hazards. Climate Change received the most concern, with severe weather and utility failure rounding out the top 3. Participants were also asked if there were other hazards not listed- with the majority of responses as “none”.

2024 Hennepin County All-Jurisdiction Hazard Mitigation Plan
 Volume 1- Background and County Profile



Participants were asked to consider what hazards they felt they were most vulnerable too, and what are they prepared to handle? Respondents were able to select all that apply.

Vulnerable

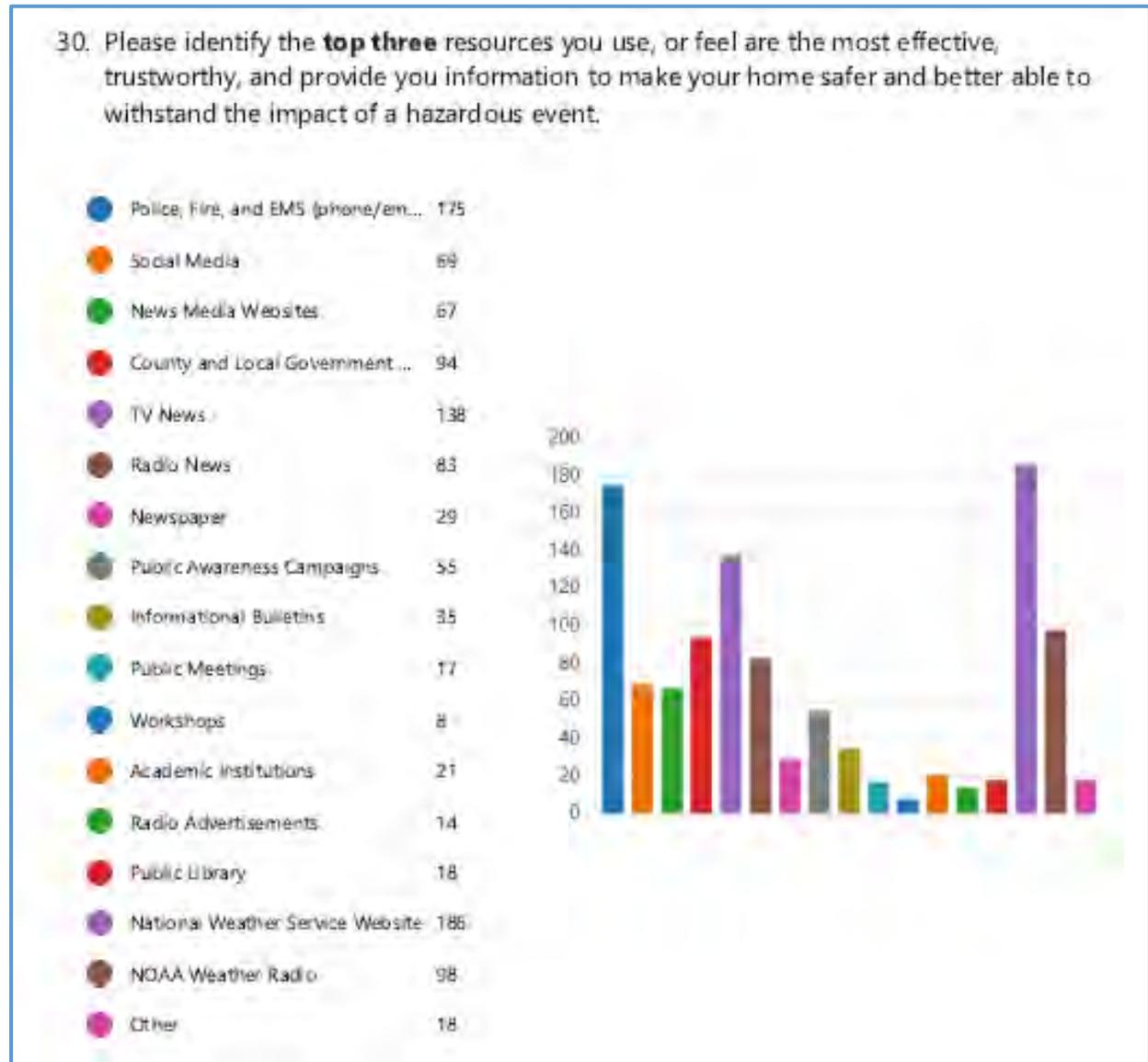
Prepared to Handle

2024 Hennepin County All-Jurisdiction Hazard Mitigation Plan
 Volume 1- Background and County Profile

| | |
|-----------------------------|-----|
| Drought | 51 |
| Dust Storm | 2 |
| Flooding - Street | 33 |
| Flooding - Home | 31 |
| Land Subsidence / Sinkholes | 11 |
| Landslide | 6 |
| Wildfire | 17 |
| Windstorm | 91 |
| Tornado | 186 |
| Severe Weather | 211 |
| Hail | 160 |
| Extreme Heat | 86 |
| Extreme Cold | 116 |
| Epidemic / Pandemic | 125 |
| Utility Failure | 143 |
| Climate Change | 109 |
| Other | 10 |

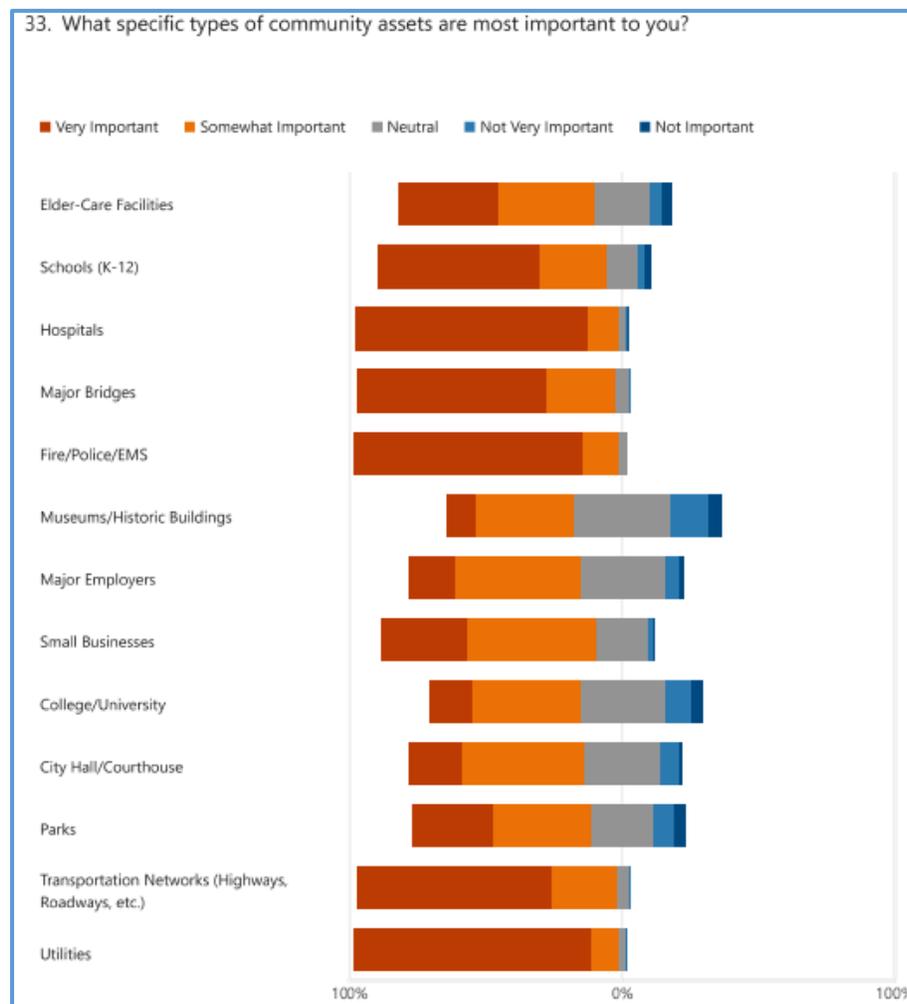
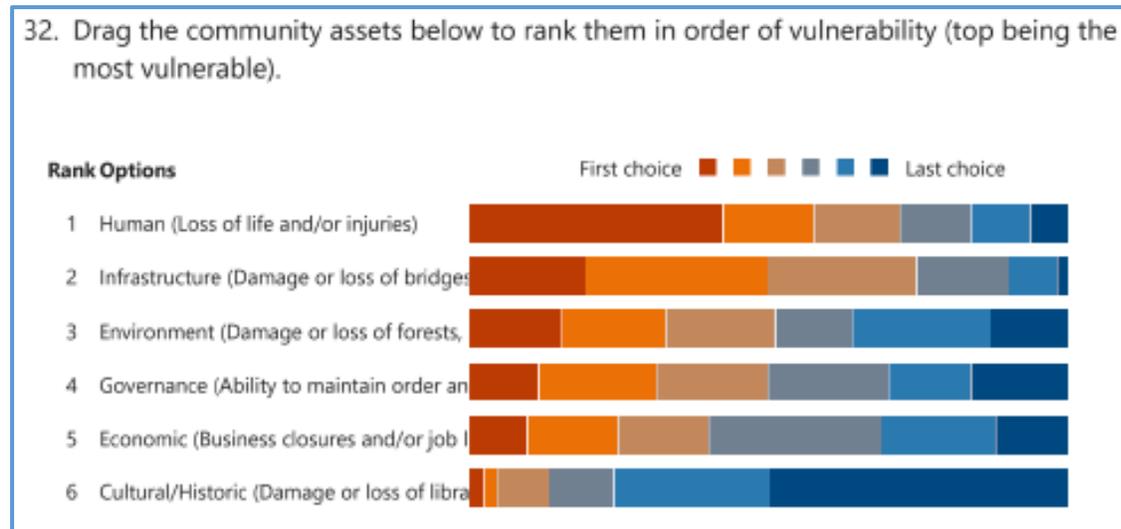
| | |
|-----------------------------|-----|
| Drought | 128 |
| Dust Storm | 73 |
| Flooding - Street | 86 |
| Flooding - Home | 51 |
| Land Subsidence / Sinkholes | 30 |
| Landslide | 33 |
| Wildfire | 40 |
| Windstorm | 90 |
| Tornado | 105 |
| Severe Weather | 170 |
| Hail | 136 |
| Extreme Heat | 150 |
| Extreme Cold | 162 |
| Epidemic / Pandemic | 143 |
| Utility Failure | 81 |
| Climate Change | 46 |
| Other | 19 |

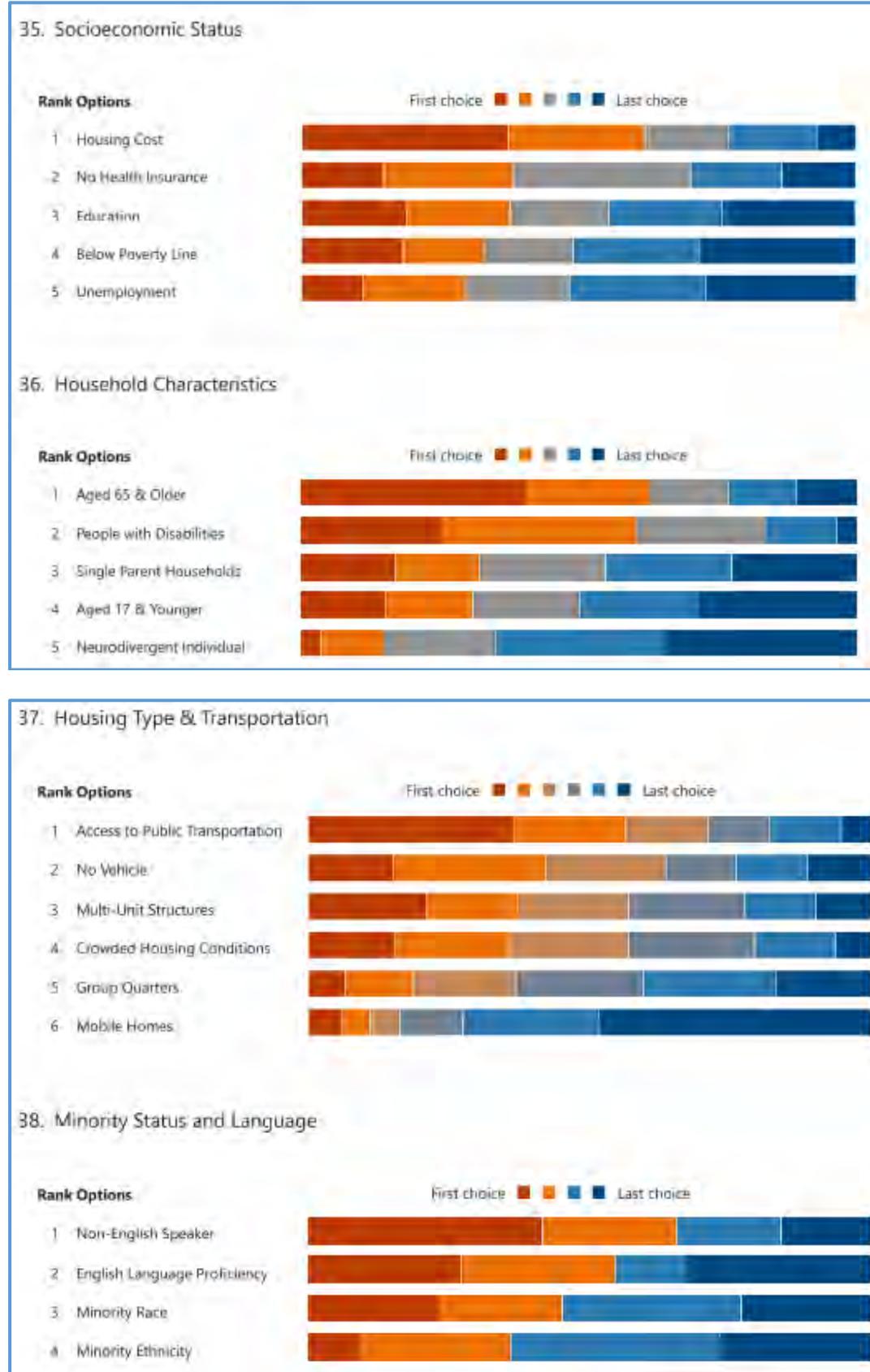
Respondents were asked to pick their “Top Three” most reliable and trustworthy information sources. They were able to select all that apply. 16% each for the National Weather Service, Police, Fire, and EMS followed by 12% getting their information from TV News



2024 Hennepin County All-Jurisdiction Hazard Mitigation Plan
 Volume 1- Background and County Profile

Respondents were able to rank community asset vulnerability and what assets were most important to them.





39. Are there any other social vulnerabilities not listed?

57
 Responses

Latest Responses

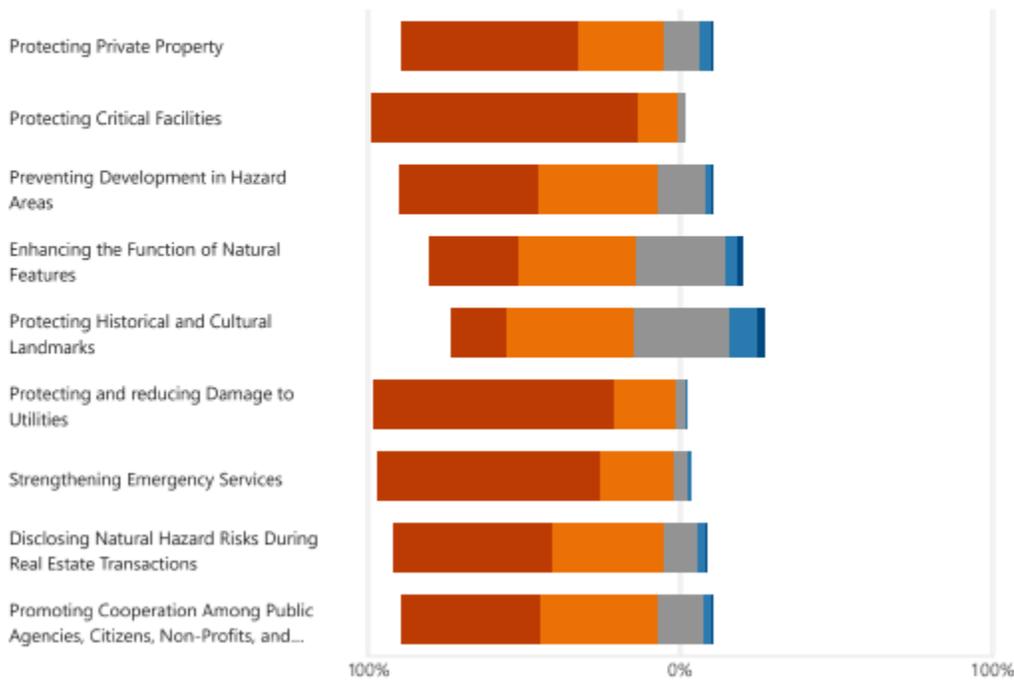
40. Which of these vulnerabilities do you find most concerning in your local community?

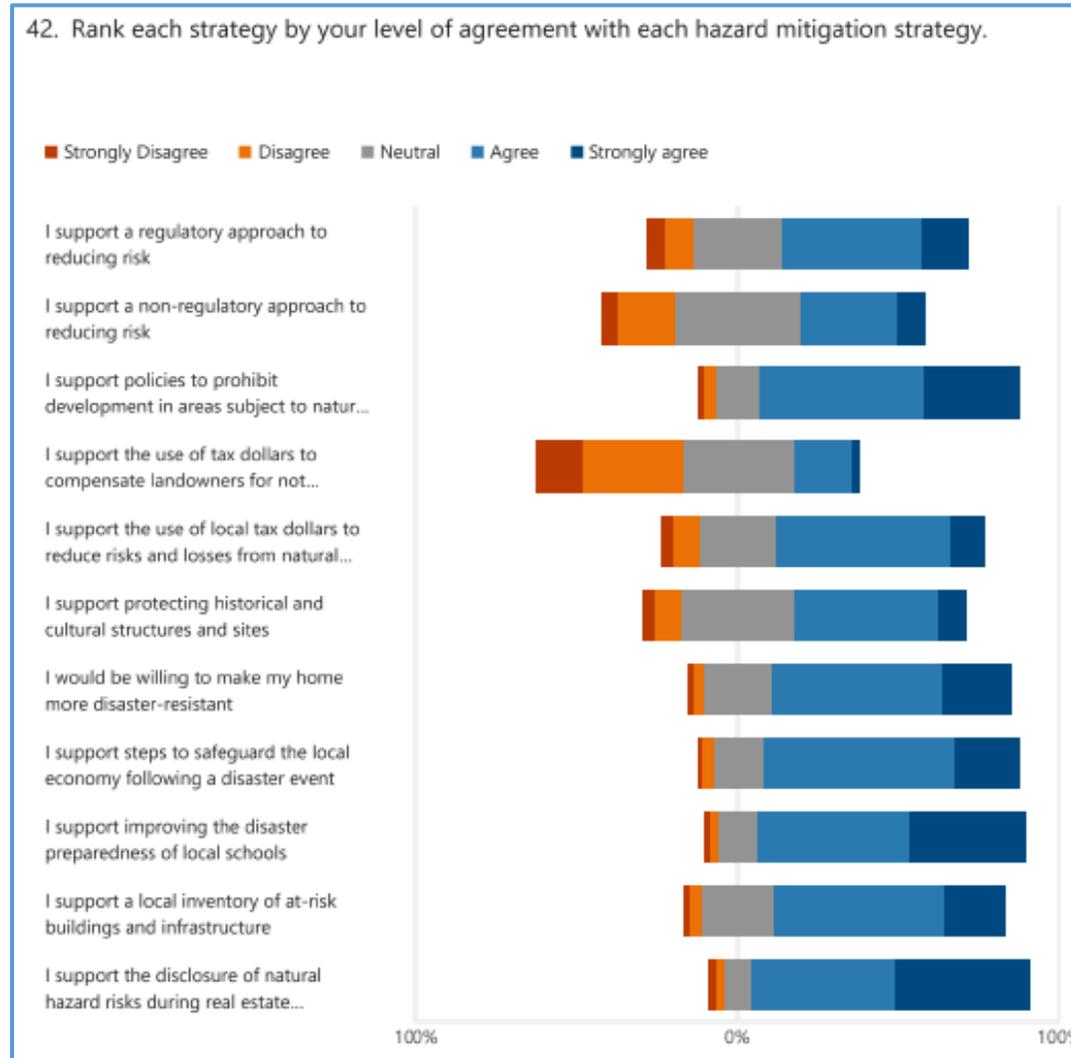
81
 Responses

Latest Responses

41. Rank each mitigation priority by level of importance **TO YOU** when planning for natural hazards in the county.

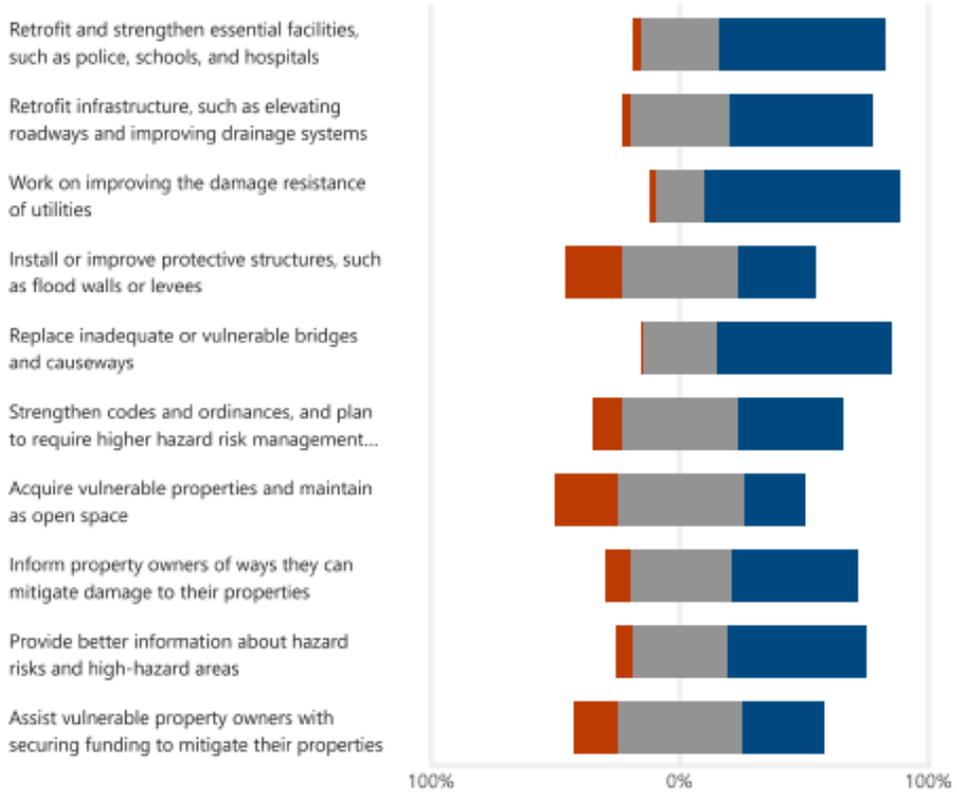
Very Important Somewhat Important Neutral Not Very Important Not Important





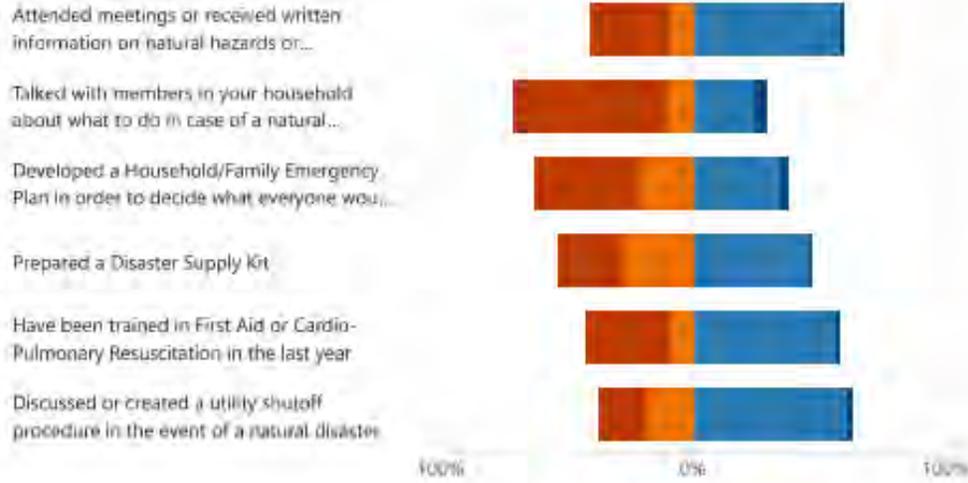
43. What types of projects should local, county, state, and federal governments focus on to reduce the impact of natural hazards in the county? Please rank by low, medium, or high priority.

Low Medium High



44. What have you and/or your household done and/or plan to do to prepare for hazards and natural disaster?

■ Have Done ■ Plan To Do ■ Not Done ■ Unable To Do

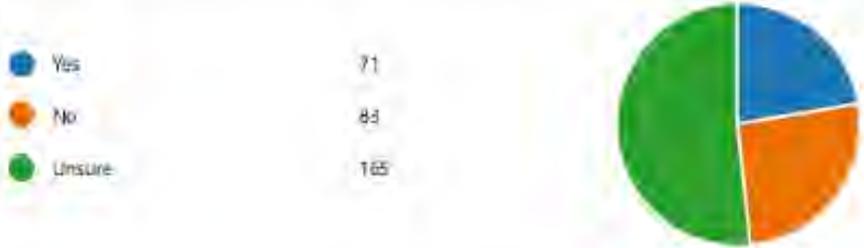


45. How did you hear about this survey?

| | |
|-----------------------------|-----|
| ● Social Media | 136 |
| ● County Website | 20 |
| ● City or Municipal Website | 68 |
| ● Other | 87 |



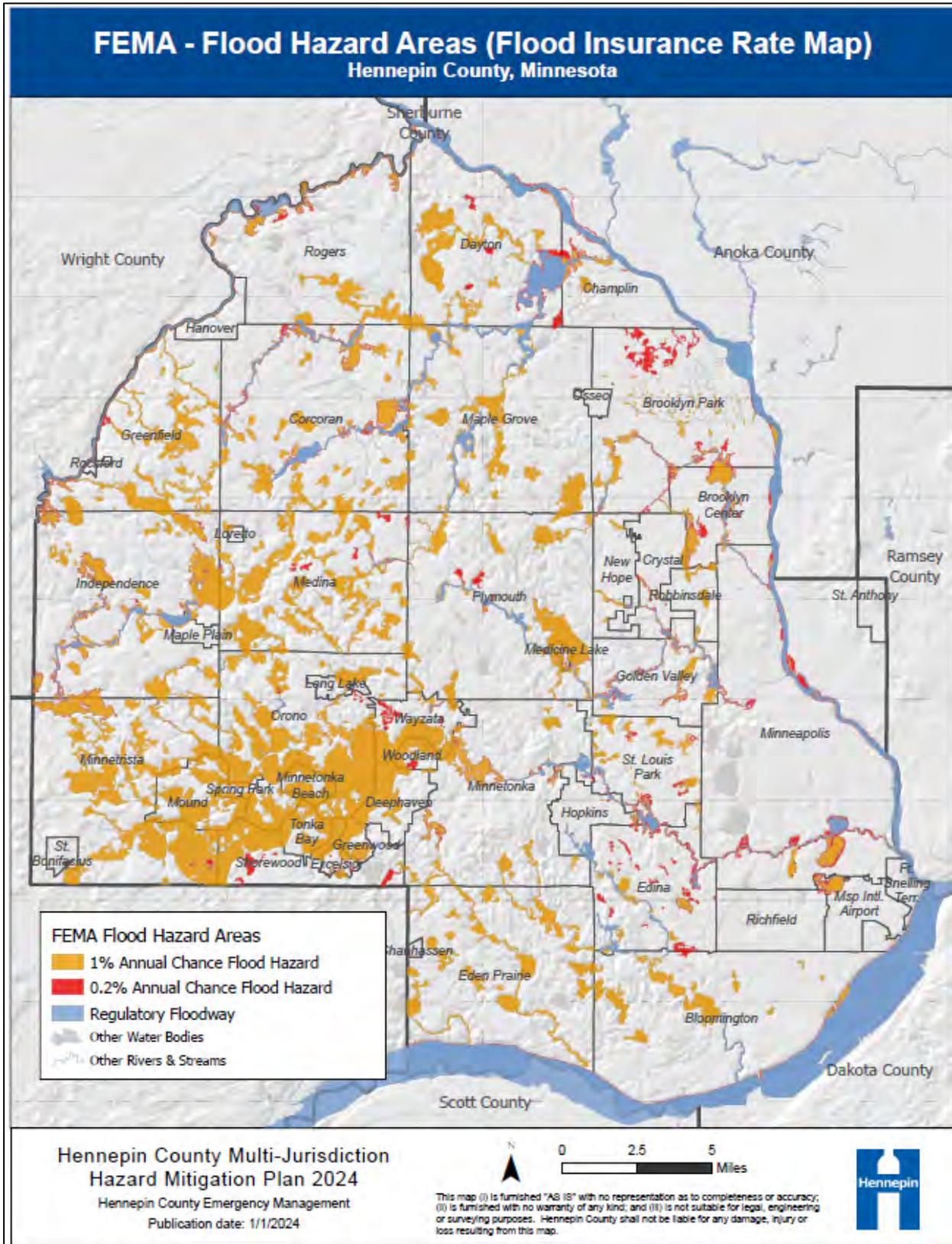
46. If Hennepin County Emergency Management were to hold a public meeting to gather further input on a draft version of the Hazard Mitigation Plan, would you attend?



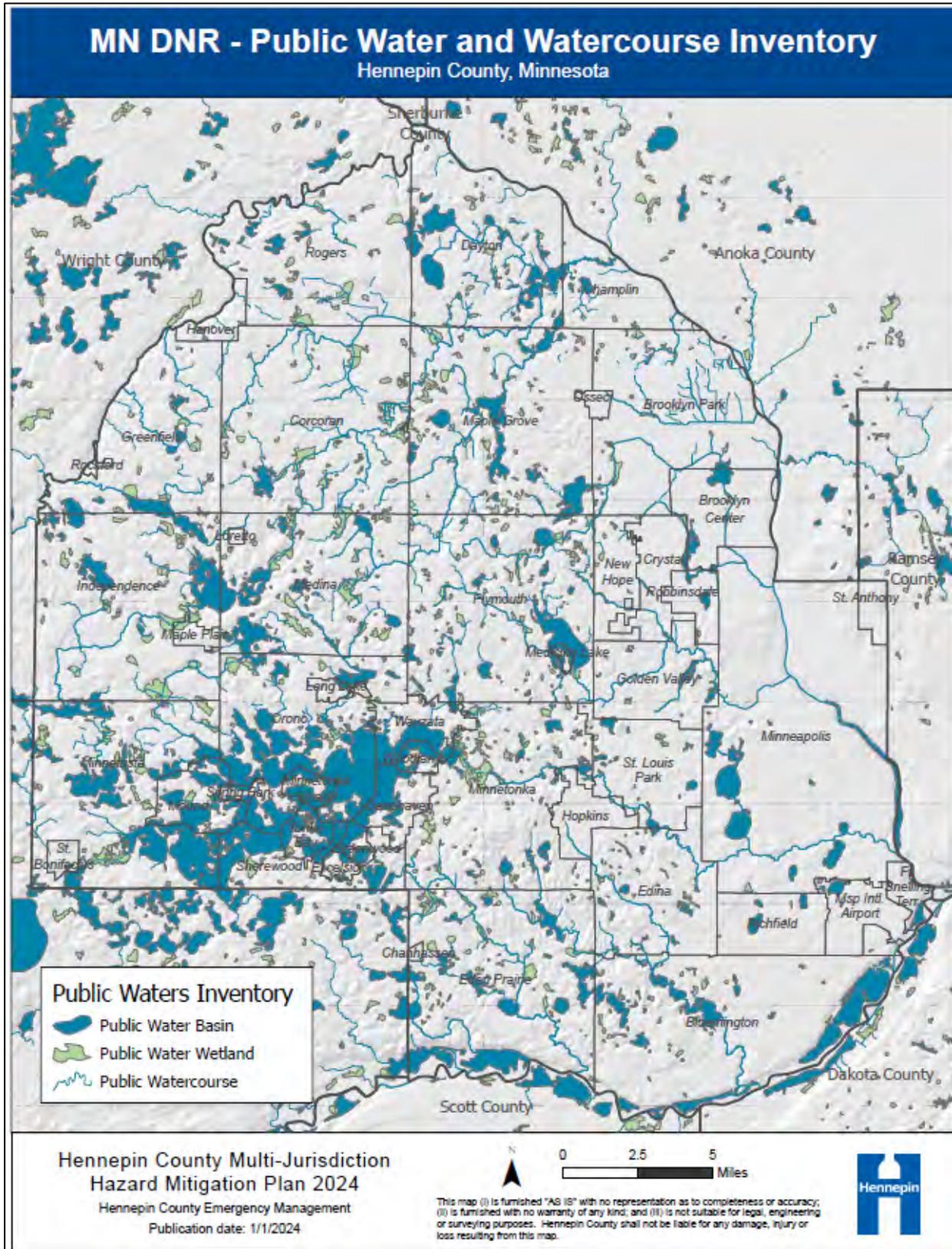
47. Please provide any additional feedback about this survey below.

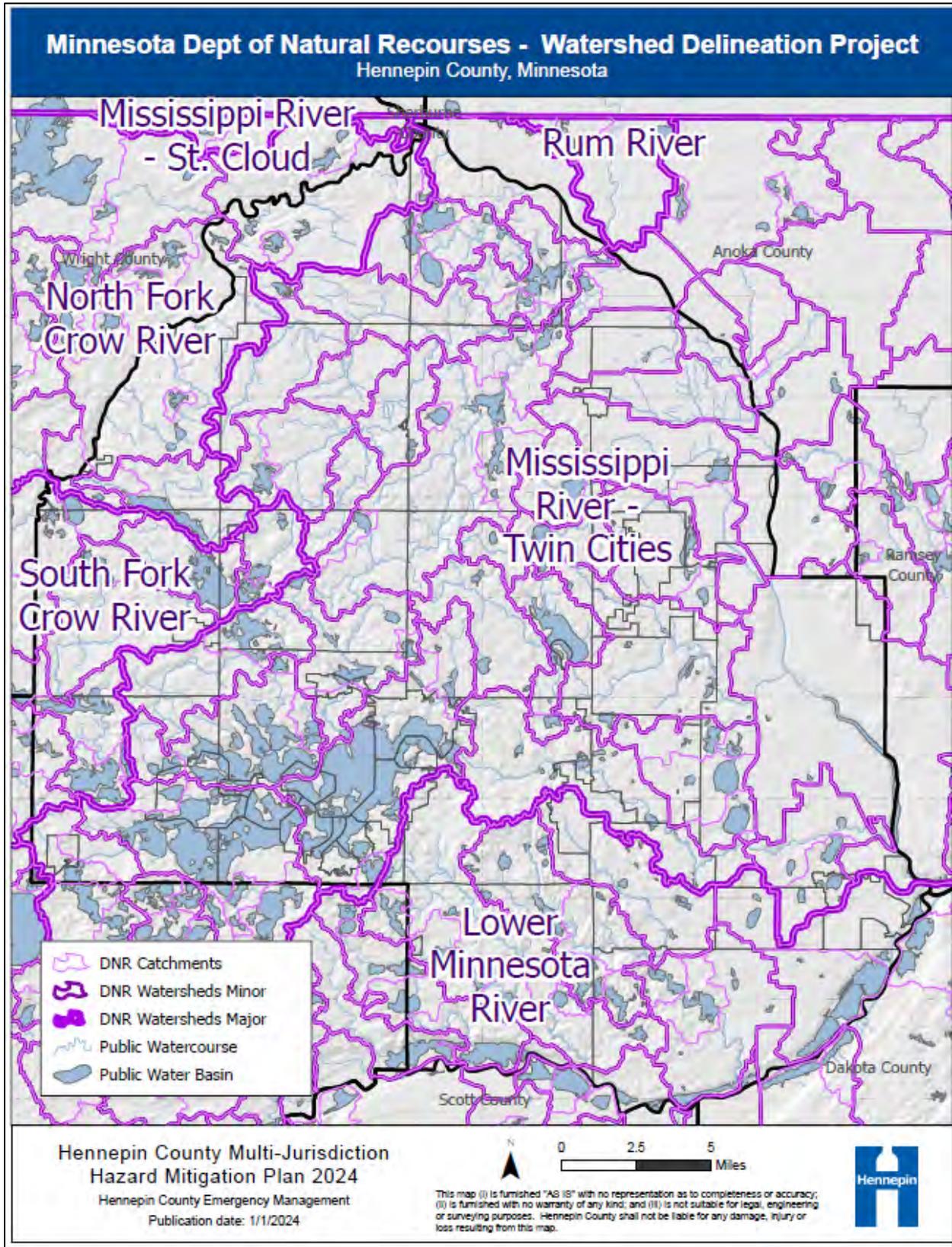
48
Responses

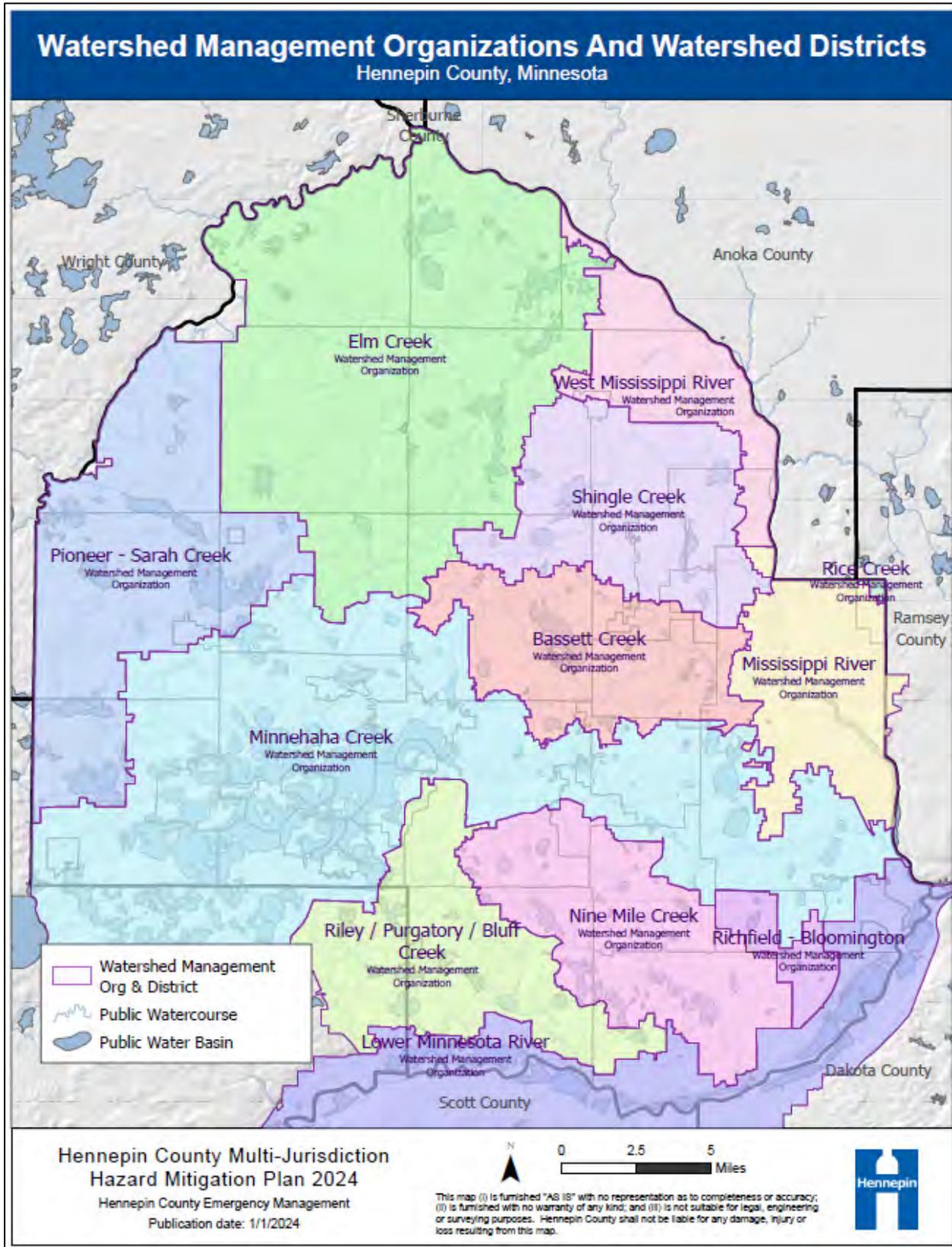
Latest Responses



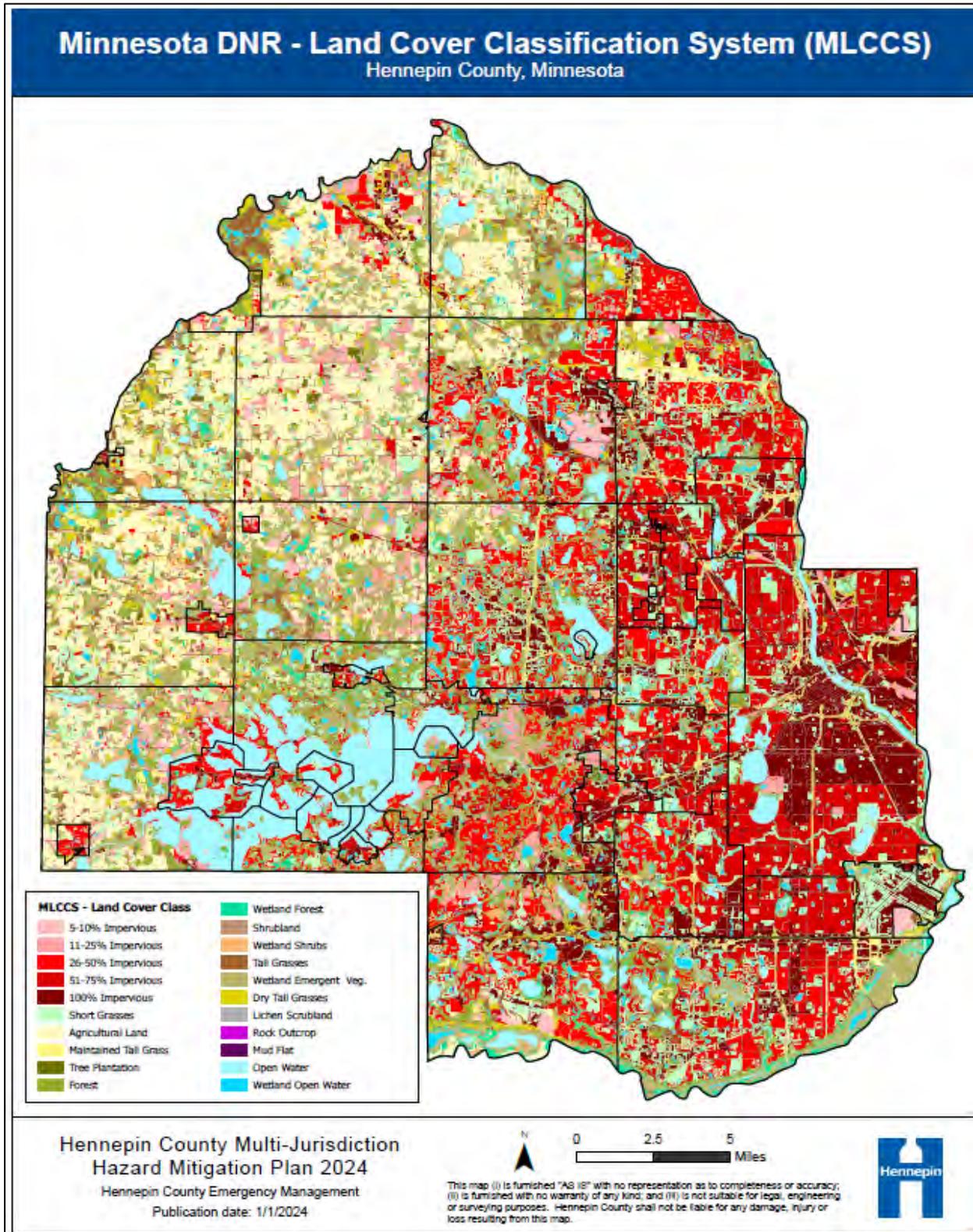
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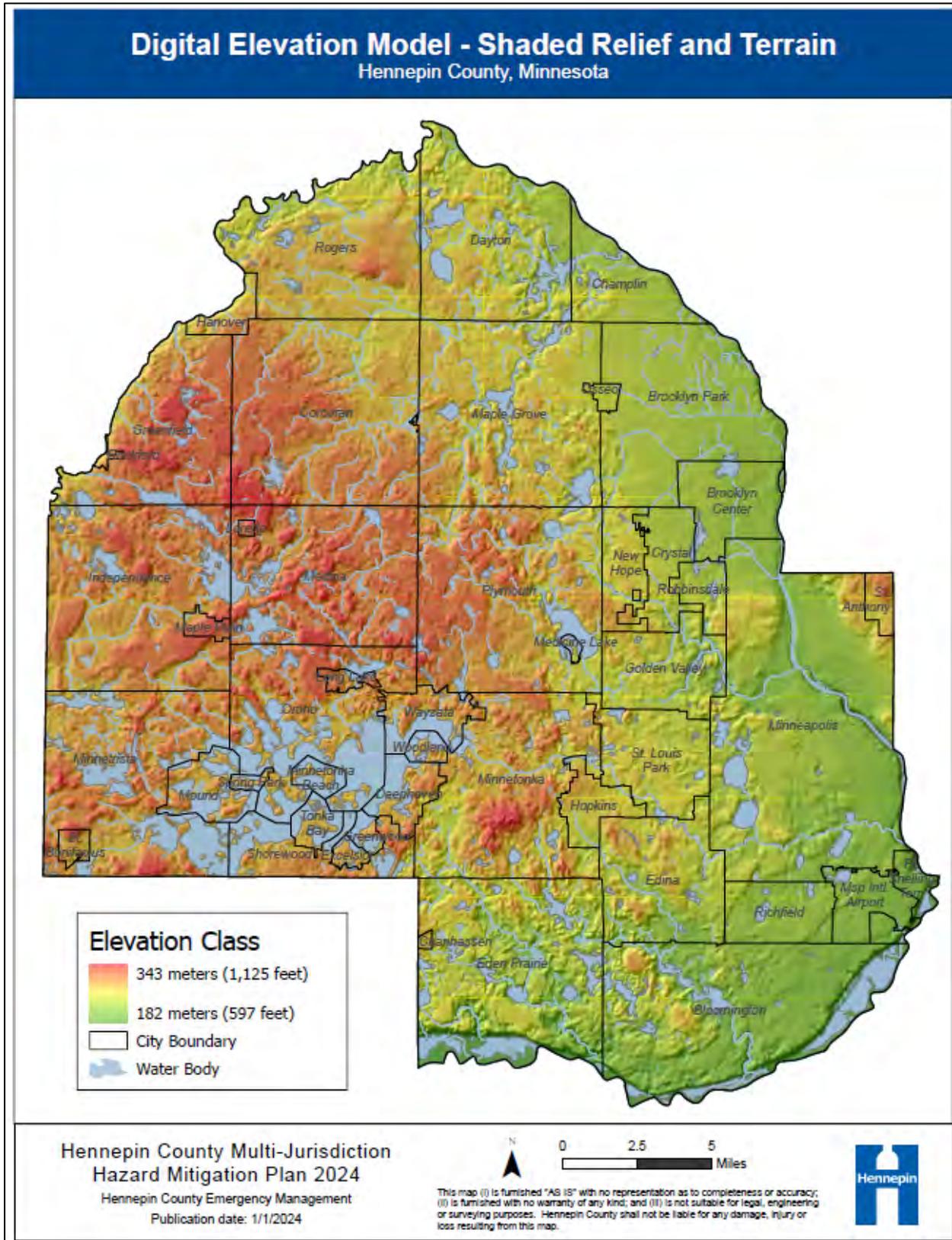


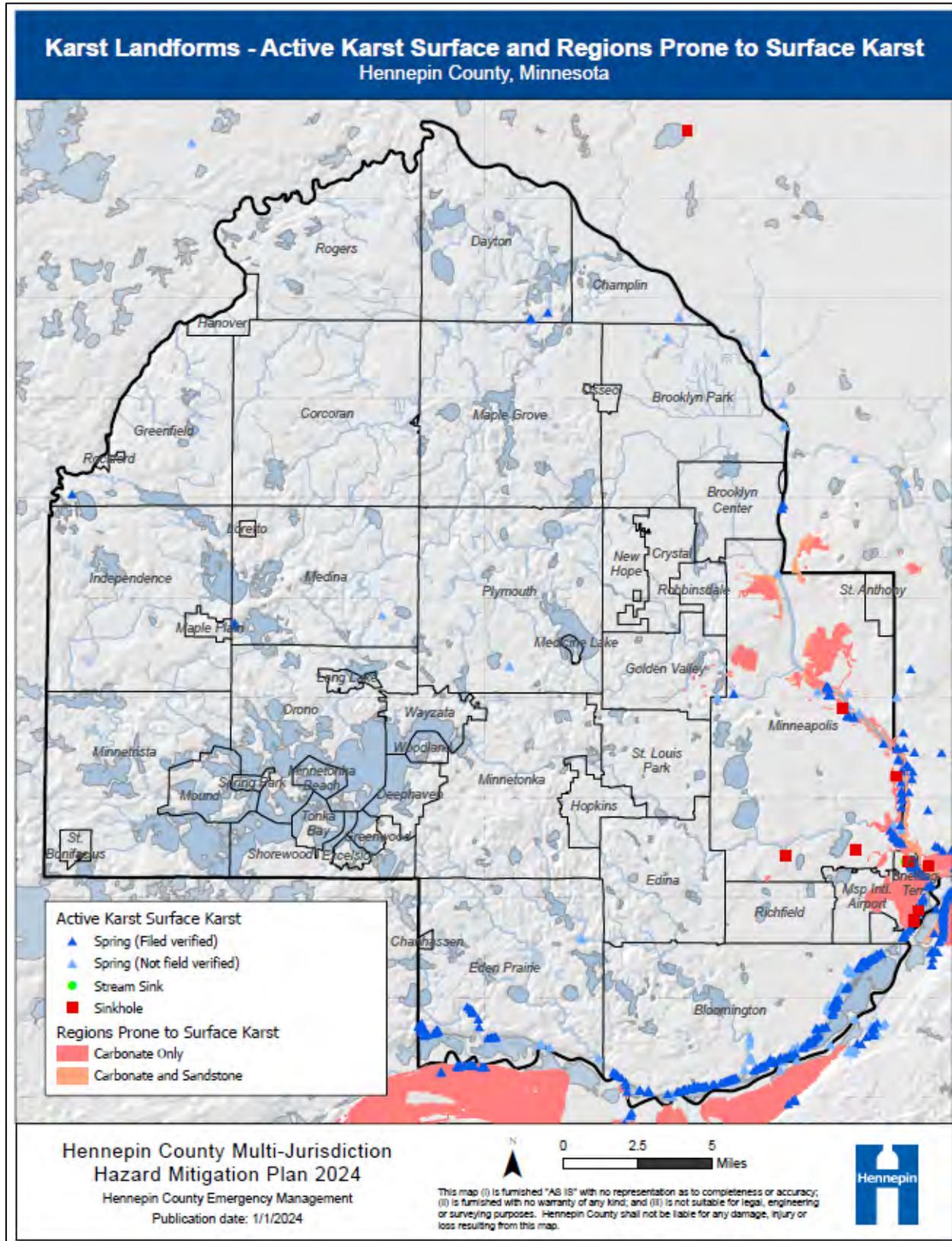


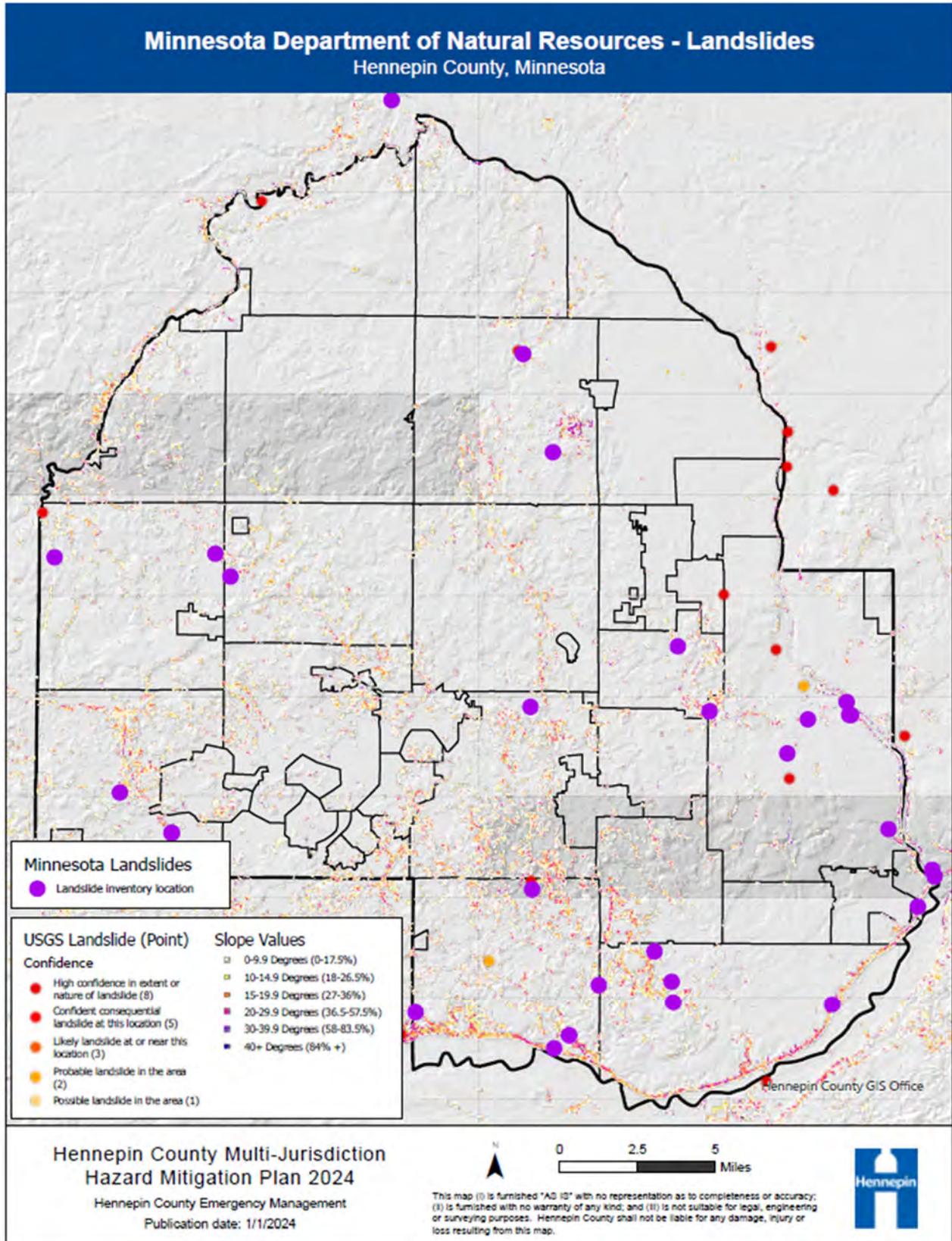


2. Geography



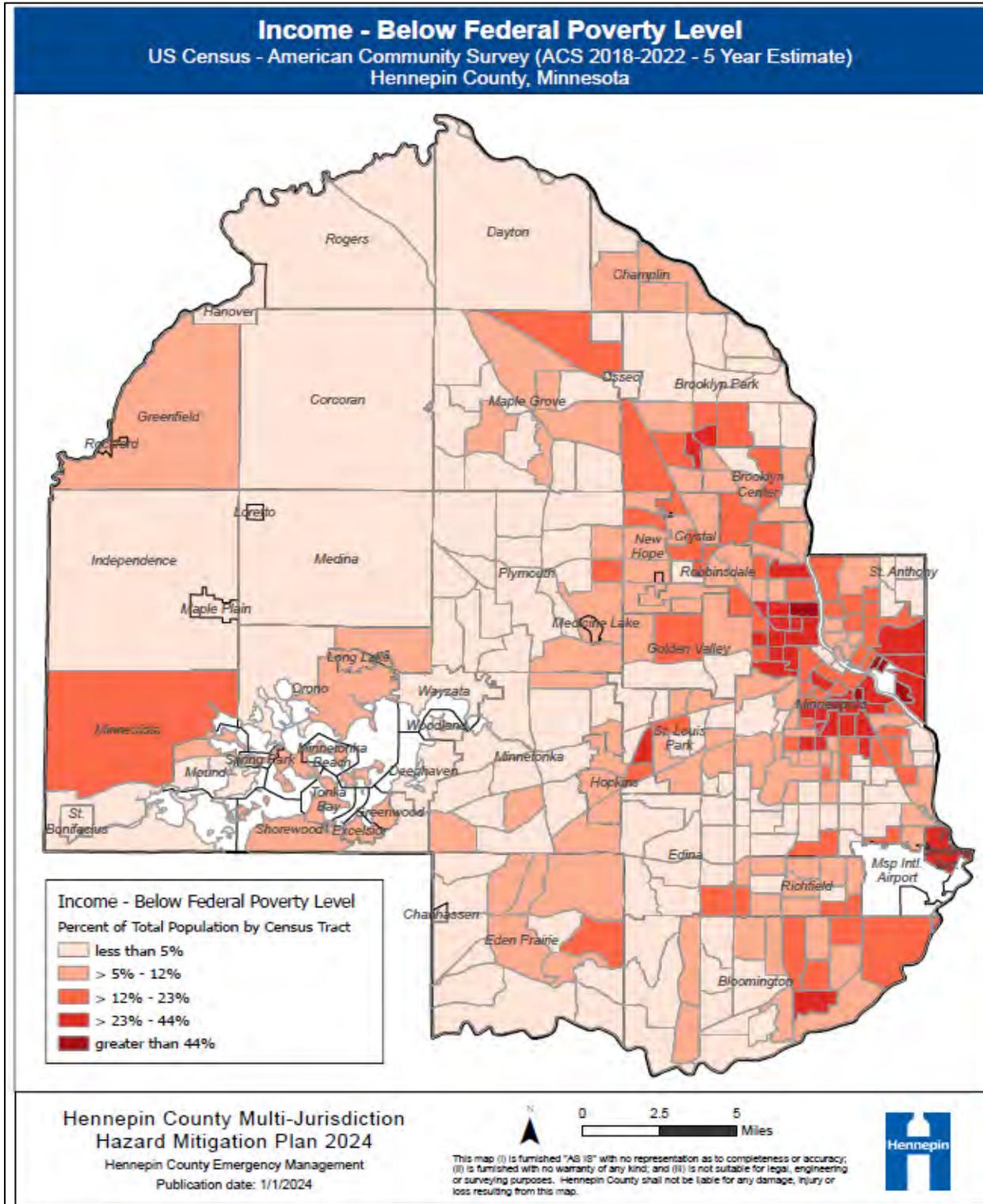


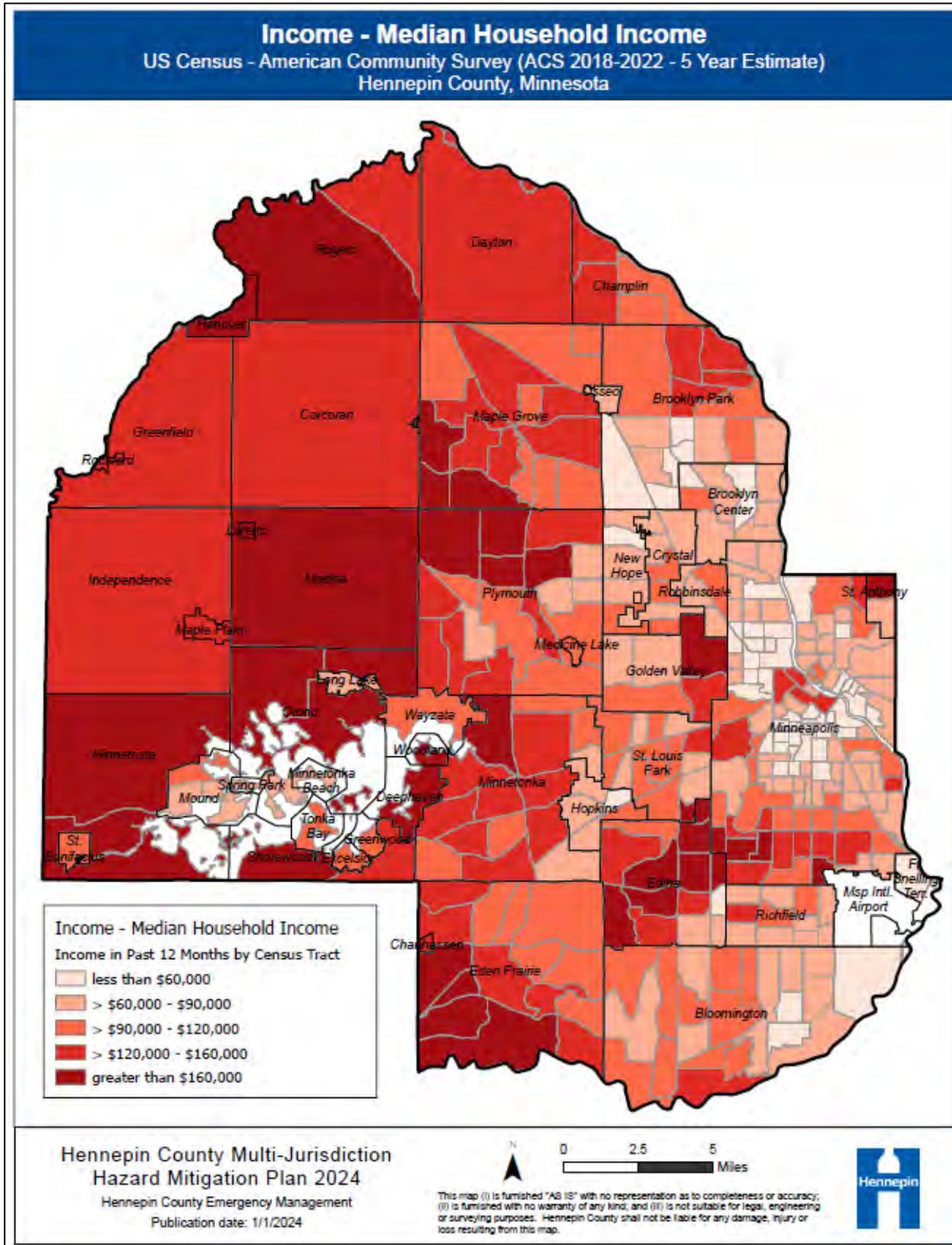




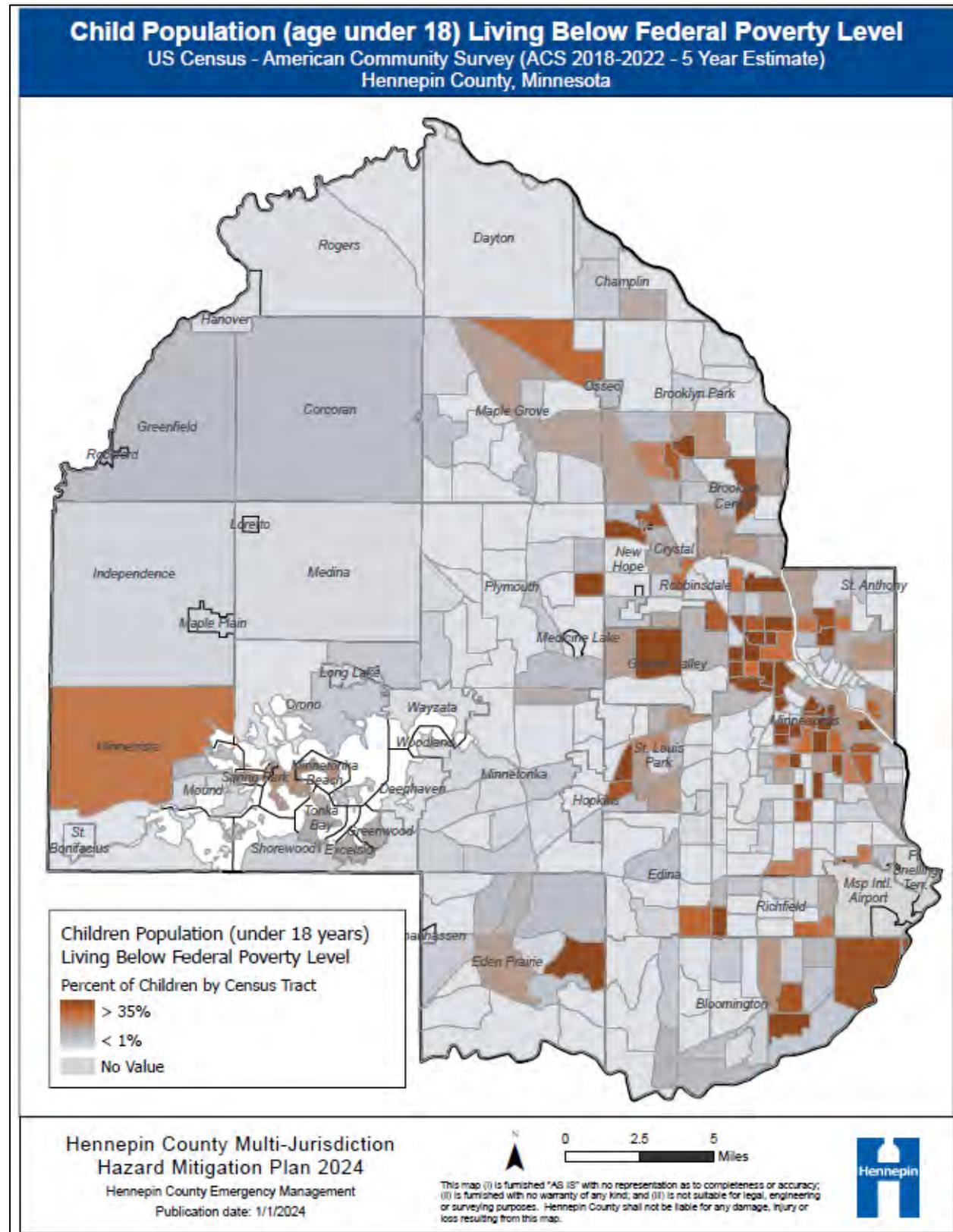
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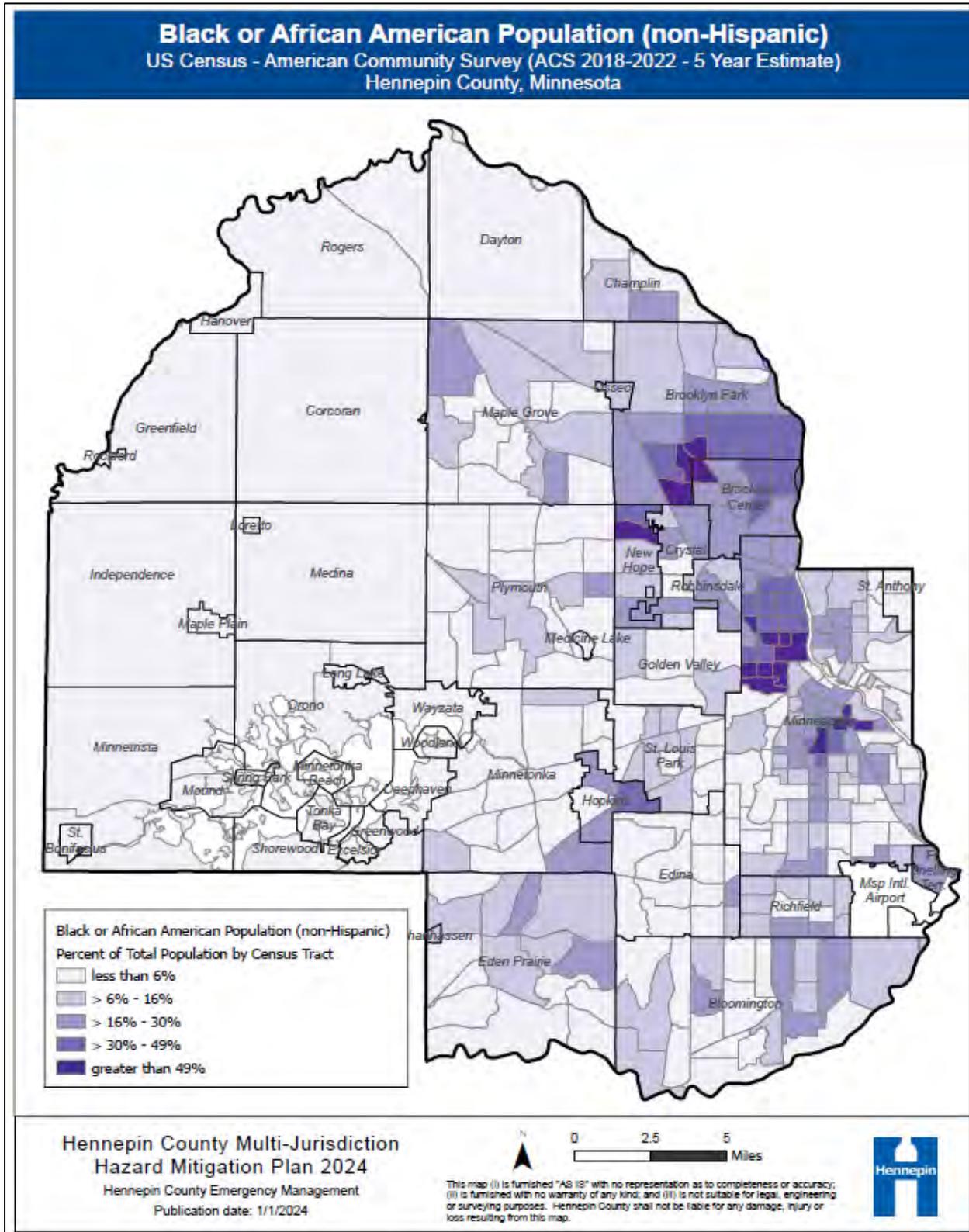
3. Income and Poverty

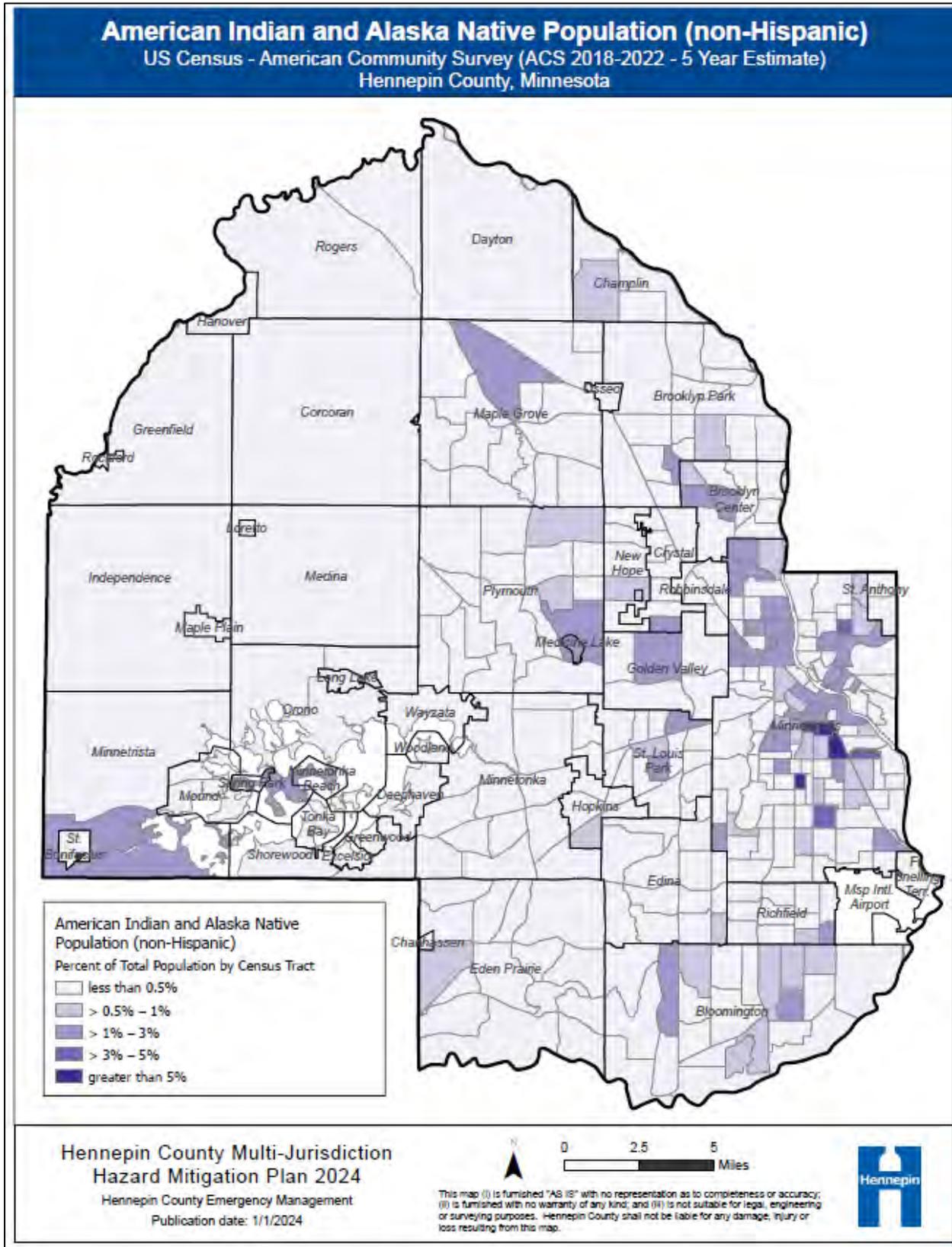


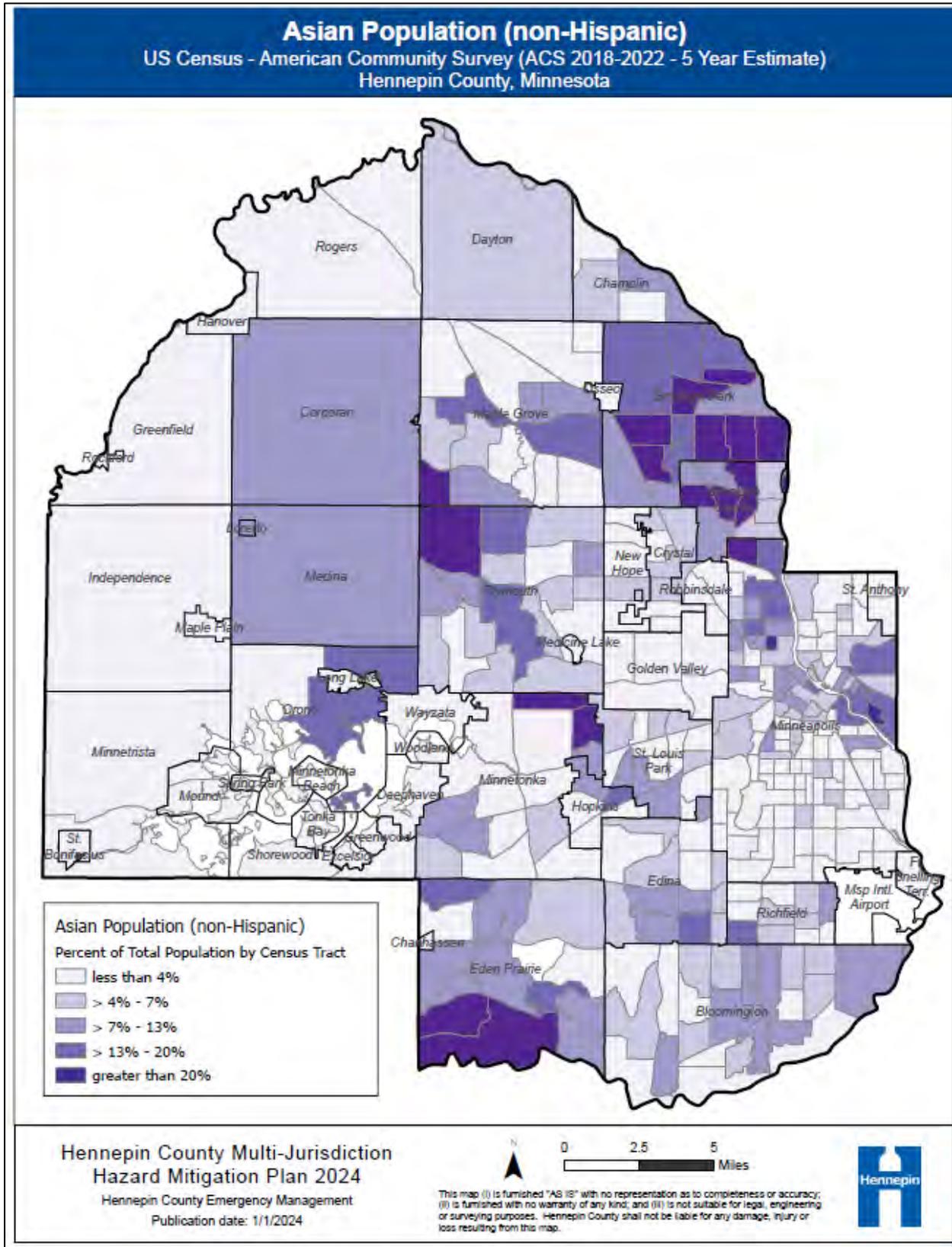


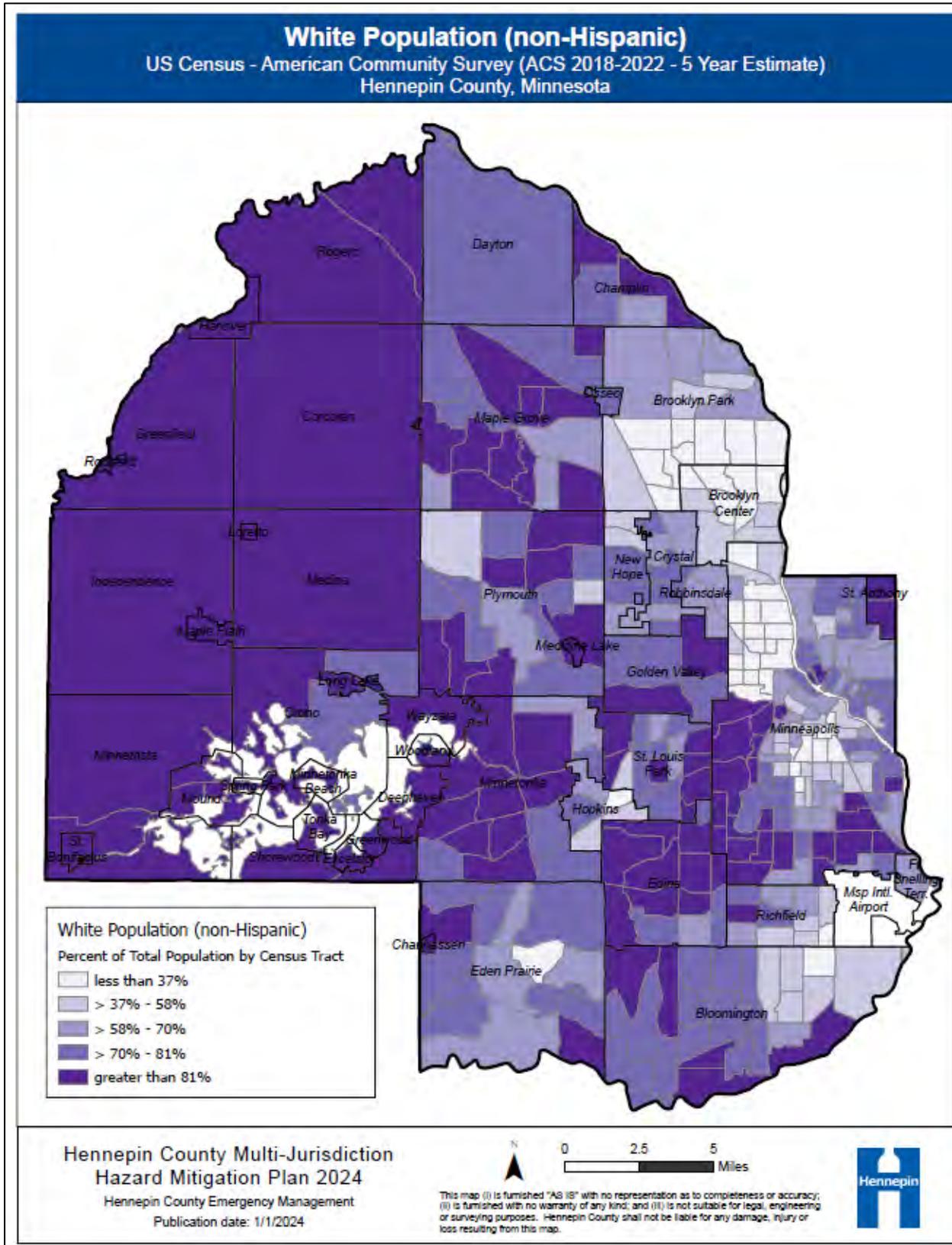
4. Population

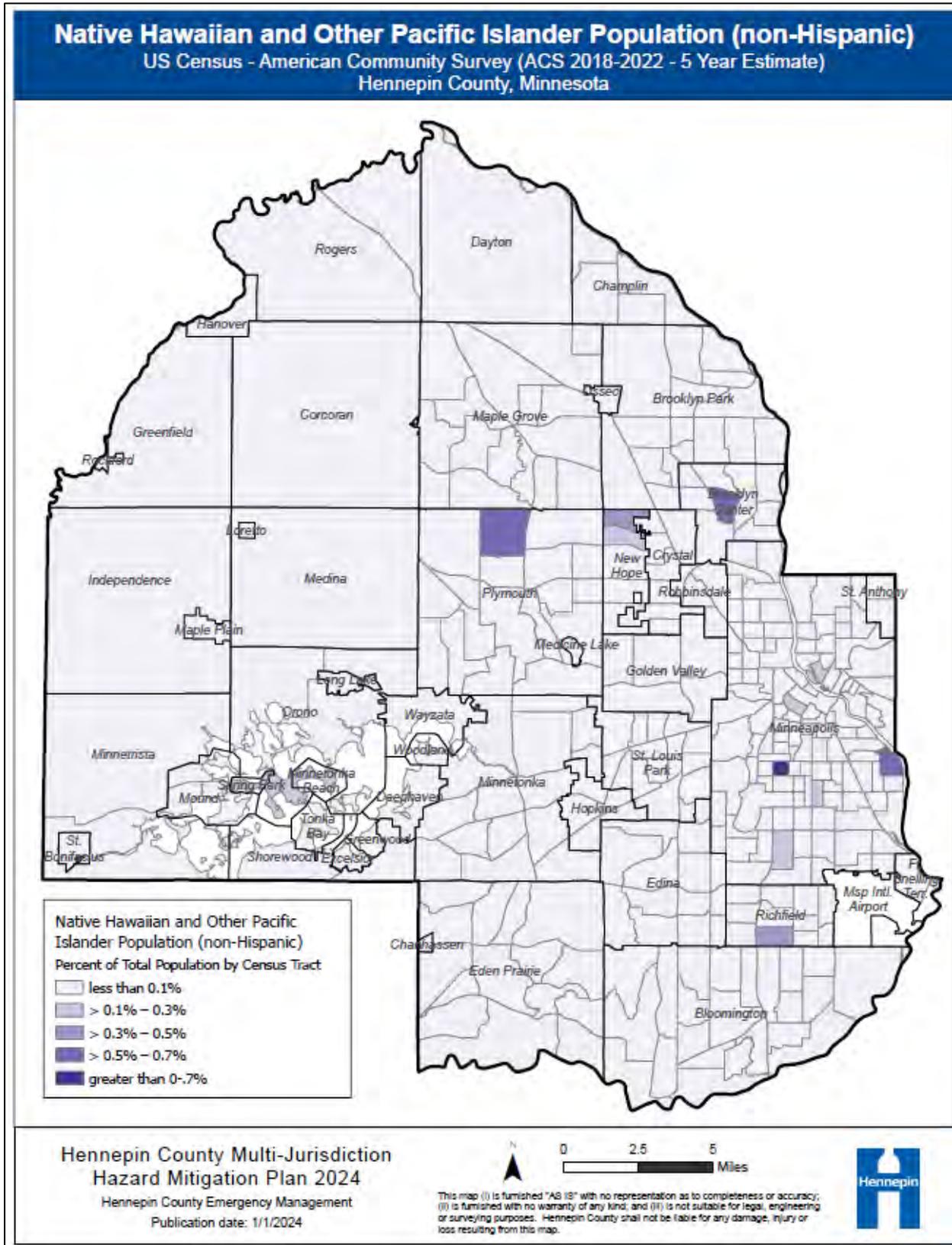


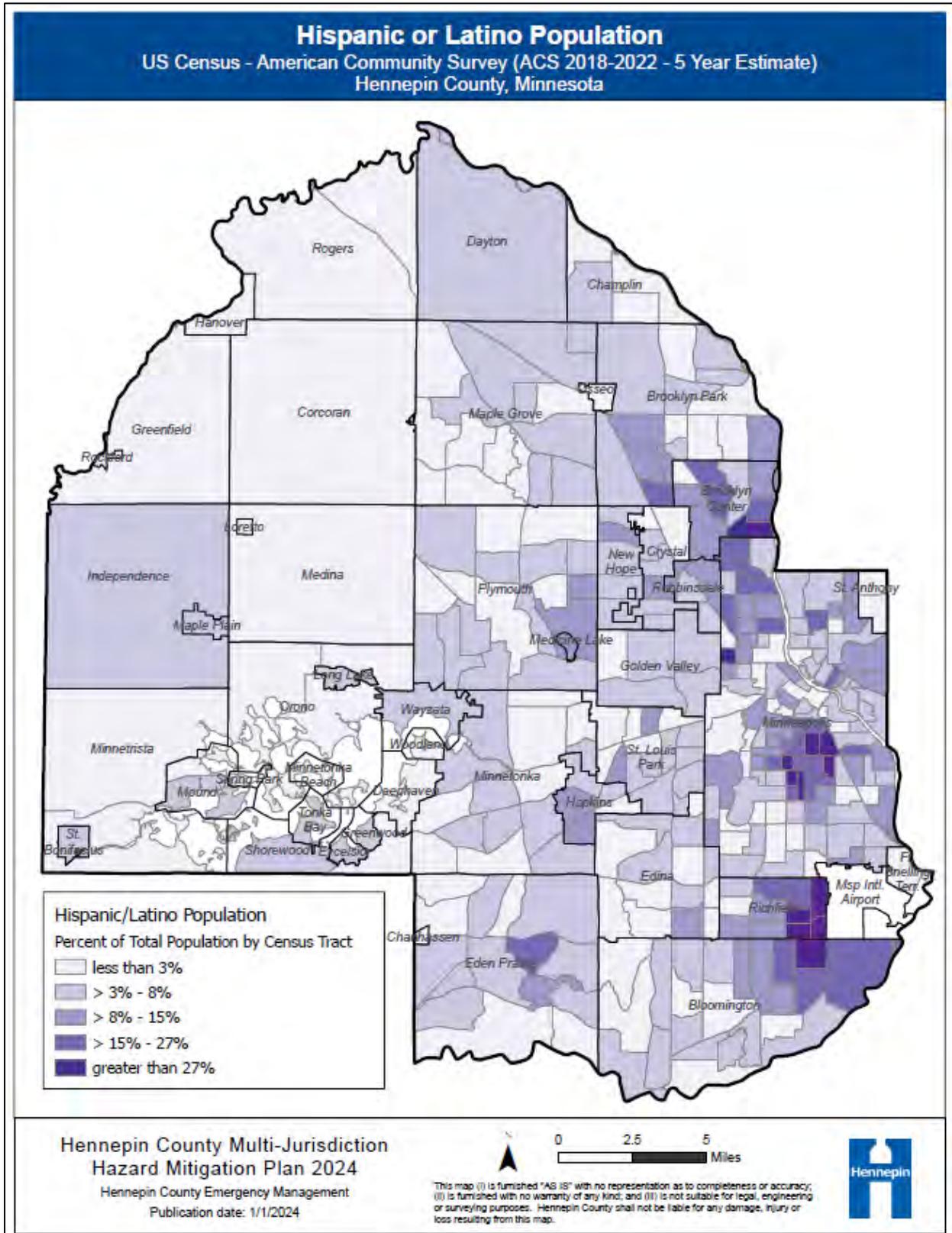


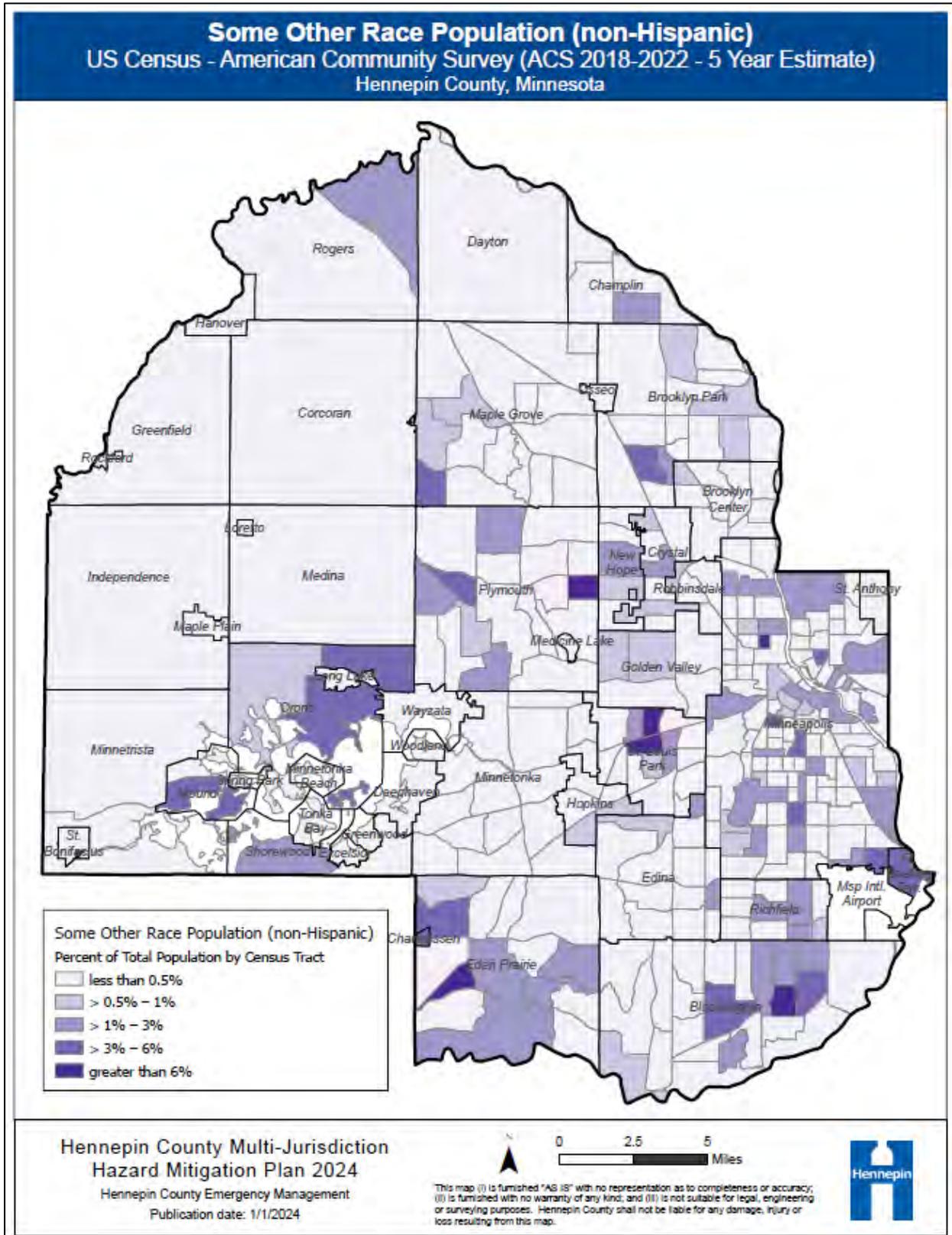


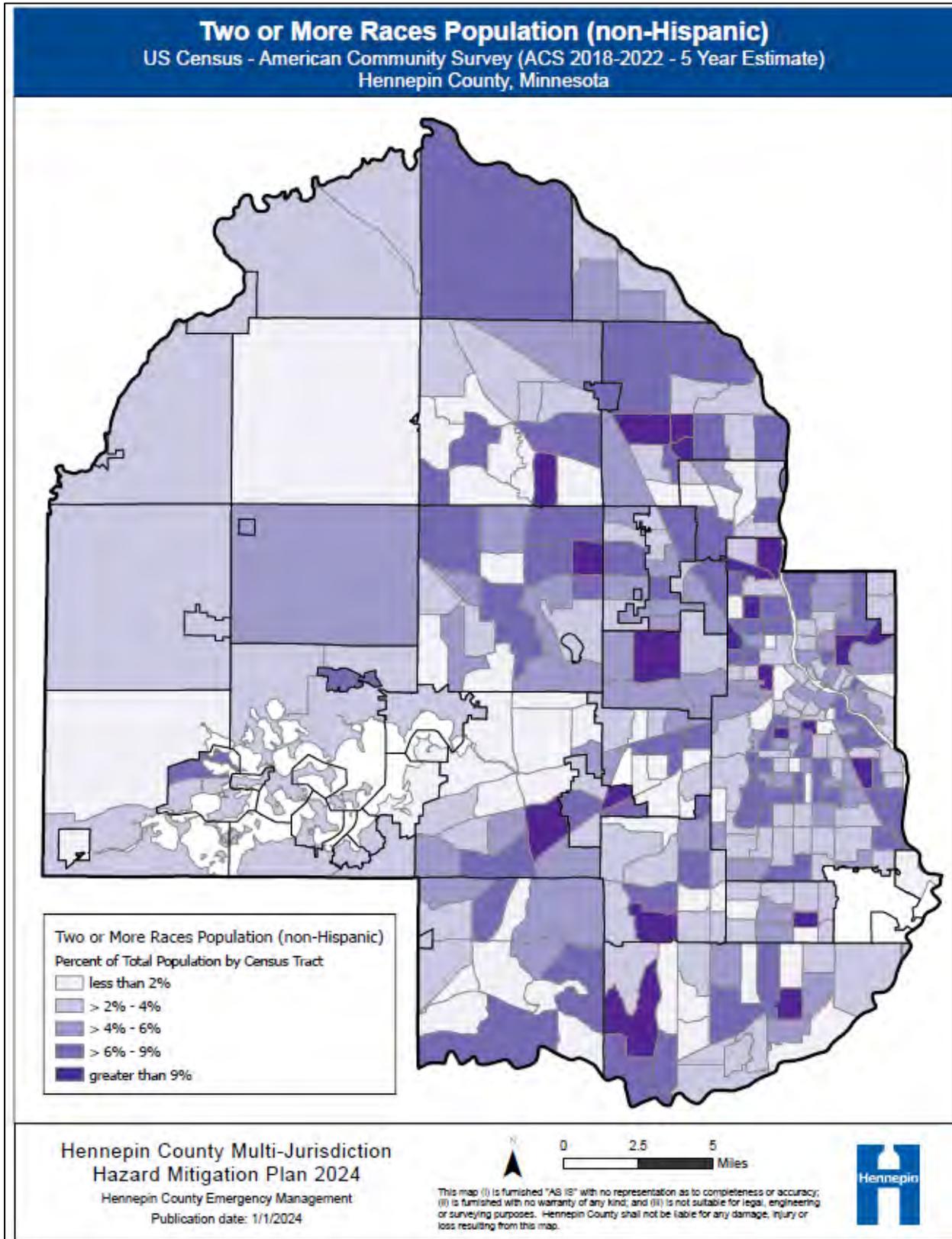


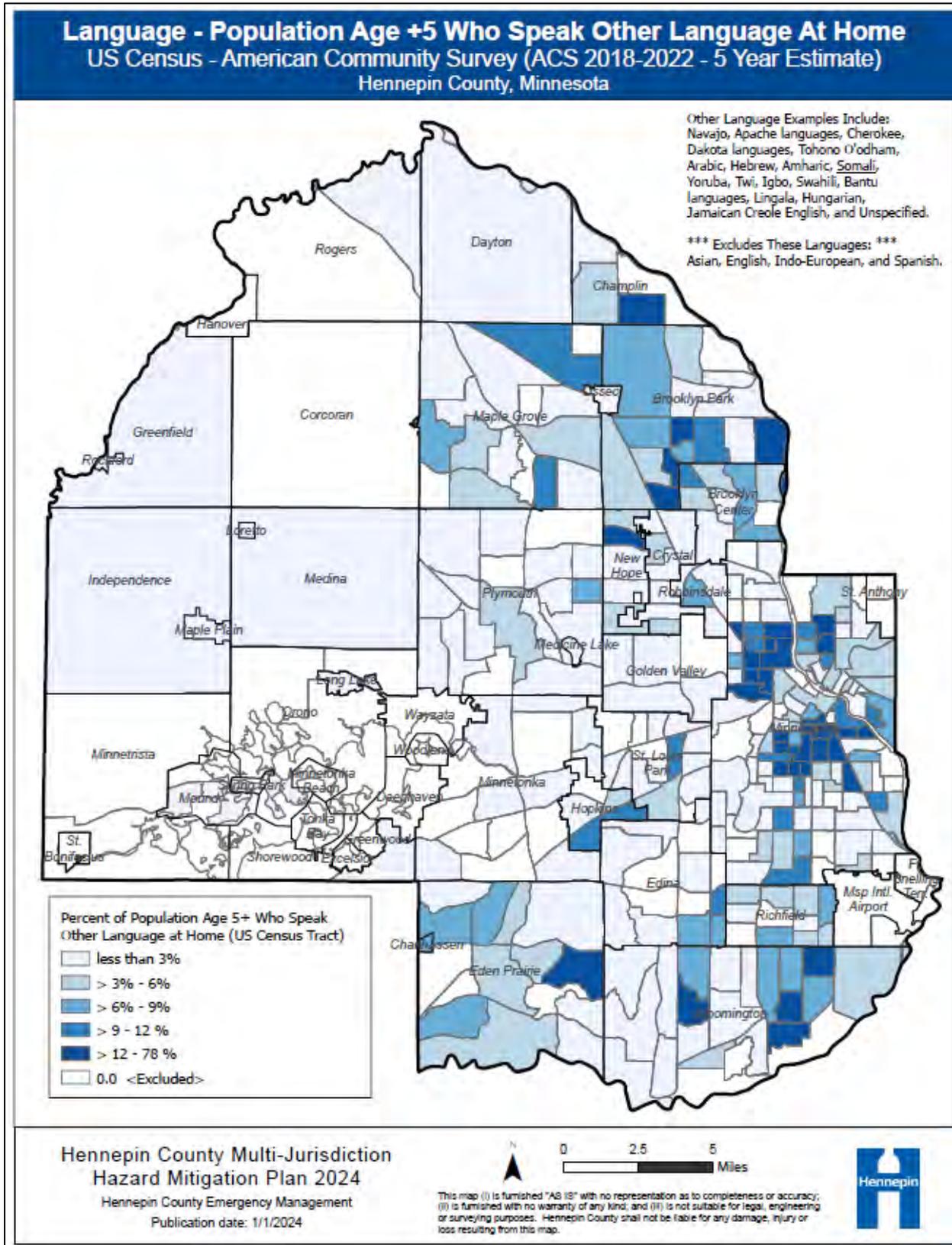


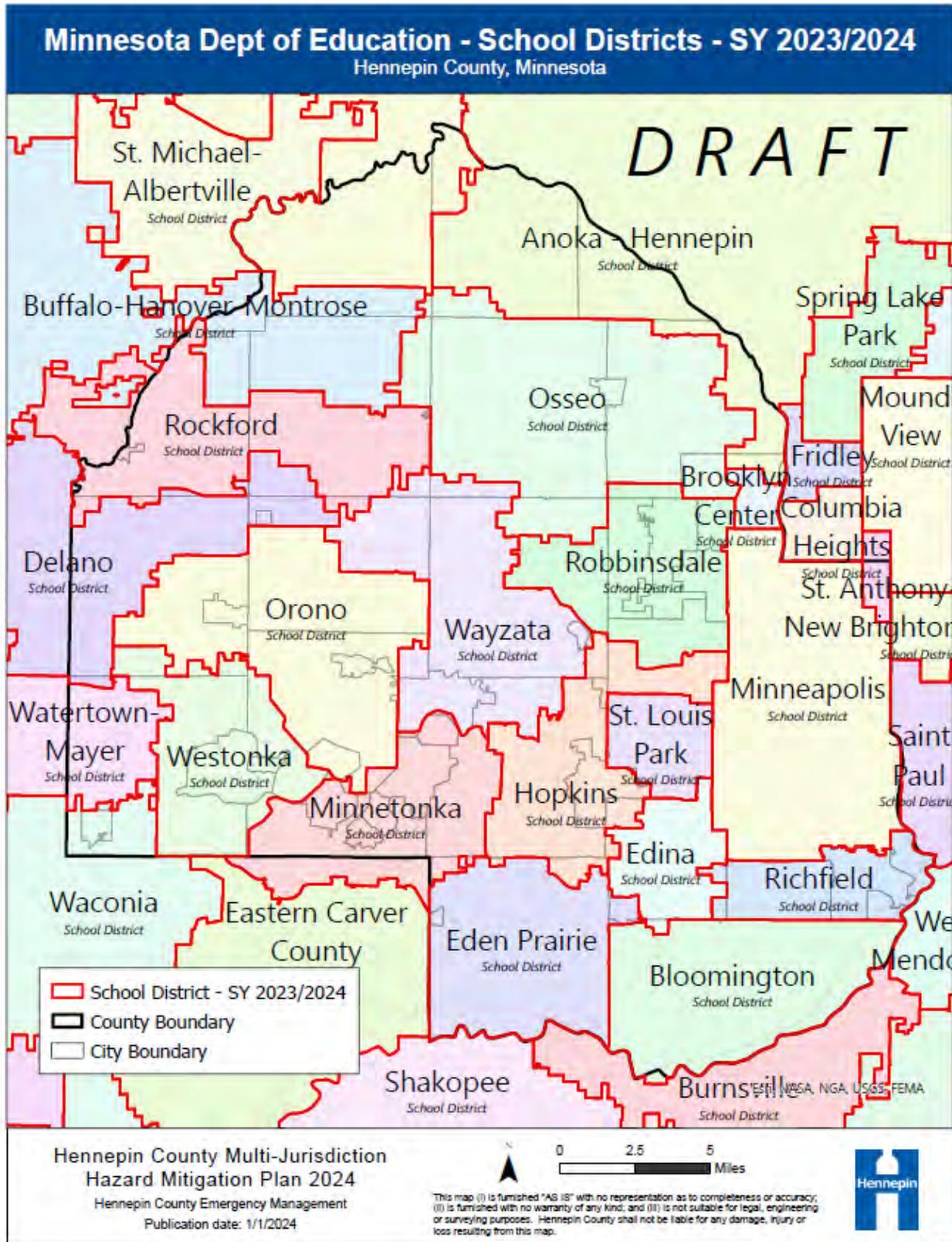












Appendix E

Community Growth Trend Summaries E1a

Each community that participates in this Mitigation Plan was given the opportunity to detail changes in development that have occurred within their jurisdiction, if that development involved known hazard prone areas, or if that development impacted underserved communities. The details provided by each community that fall within the scope of this plan are provided in this appendix.

E.1: Champlin

The City has experienced moderate commercial and residential development over the past few years. The residential development was mainly single-family residential subdivisions. None of the new development has been into any hazard prone areas or has affected vulnerable populations.

E.2: Dayton

The City of Dayton has seen enormous growth in residential and commercial properties. However, that growth has yet to be in any hazard-prone areas within the community, such as floodplains, and it has yet to impact vulnerable populations within the community.

E.3: Edina

Over the past 5 years the City has approved several large scale re-developments. As these sites were already developed, there was no impacts on wetland, floodplains or hazard prone areas. There have not been any developments that have affected vulnerable populations. Each site was reviewed by City staff and consultants when necessary and found not to have negative impacts. The following projects have been approved and built: 8 unit townhome replaced a 5-unit townhome at 5132 Hankerson Avenue; 21-unit apartment replaced a day care at 4425 Valley View Road; a 118-unit senior apartment replaced an office building at 4040 70th Street; a 408 unit apartment replaced a large office building at 4660 77th Street; A 200 unit apartment replaced an office building at 4911 77th Street; A 196 unit apartment replaced an office and Perkins at 4917 Eden Avenue; 24,000 square foot medical office replaced a 16,000 s.f. medical office at 6500 Barrie Road; New restaurant, indoor tennis courts and fitness center built at Interlachen Country Club, 6200 Interlachen Blvd.; A 276 unit apartment replaced an office building at 4600 77th Street; 4-unit townhome replaced a beauty salon at 4404 Valley View Road; Church and school expansion at 5051 Eden Avenue; 3-story furniture store and restaurant built in the parking lot at Southdale; 70-unit apartment replaced a large recording studio at 4100 76th Street; 62 unit apartment replaced a laundromat at 7075 Amundson Avenue; A 10,000 square feet retail building replaced an office building at 6950 France; A 167 unit apartment replaced a retail building at 3650 Hazelton Road.

E.4: Loretto

The Chippewa Estates Development was completed between 2018-2020 and consists of four single-family residential homes. No part of this development is in a hazard prone area, nor did it affect vulnerable populations.

E.5: Maple Grove

The City of Maple Grove is a fast-growing community with a number of large areas undergoing rapid development. Highlights include development of residential neighborhoods in the area of 105th Avenue,

construction of a large new headquarters building for Boston Scientific, residential neighborhoods in the vicinity of the Hindu Temple north of Arbor Ridge Parkway (101st Avenue), as well as numerous other residential and commercial buildings of various sizes. Maple Grove works within a comprehensive master plan in coordination with the Metropolitan Council and the State of Minnesota to ensure that new development has minimal effect on vulnerable populations and limited exposure to hazard prone areas.

Maple Grove - 105th Avenue Master Plan

In 2018, the City of Maple Grove initiated a planning process to guide future development in the 105th Avenue North Growth Area. The study area is generally defined by Interstate 94 to the west, Interstate 610 to the south, County Road 81 and the rail line to the north, and Fernbrook Lane to the east.

Core objectives of the 105th Avenue North Growth Area Master Plan were to examine alternatives for land uses, parks, trails and open space features and guide the design of the infrastructure network needed to support the desired development. Additionally, another key objective was also to understand the desires of existing landowners in the study area, some of whom are interested in developing their property and others, primarily existing single-family residences, who are interested in remaining. Finding the right balance for new development, identifying what uses will likely remain, providing future opportunities for land uses to transition over time, was fundamental to the success of the Master Plan.

The study area includes a variety of development areas, or districts, each with their own unique physical characteristics and development and/or redevelopment potential. In order to understand and address the many facets influencing development in the 105th Avenue North Growth Area, the planning team worked to understand current and future market conditions, existing and currently proposed land uses, potential transportation enhancements (vehicular, bicycle and pedestrian) and to identify necessary parks and open space features.

Maple Grove – Gravel Mining Area South Master Plan

The GMA South study area is just over 400 acres. Located north of Interstate 94 and west of US Highway 169. Elm Creek Boulevard bisects the northern portions of the plan area. The existing land uses within the GMA south area principally material extraction and industrial. Surrounding land uses include regional-scale commercial to the west, and low-density residential to the south across I-94. Ownership of the parcels within the GMA South area is limited to a handful of entities.

According to the most recent comprehensive plans for Maple Grove and Brooklyn Park, the area surrounding the gravel mining area south is envisioned for a wide range of uses. Commercial uses (Arbor Lakes) are well established to the west and industrial use is expected to continue to the north. Housing is planned to the west of the parkway shown north of the GMA area. A large business park to the east across 169 (in Brooklyn Park) is planned to continue. An established neighborhood is located to the south across I-94, with some mixed use area available adjacent to the highway.

Maple Grove – Northwest - 610 Master Plan

Existing land uses within the study area primarily consist of agricultural uses and undeveloped open space. Approximately a dozen rural residences and farmsteads dot the study area. A 20-acre parcel

containing the Minneapolis Northwest KOA campground and RV Park is located along Brockton Lane/County Road 101. The Hindu Society of Minnesota owns approximately 80 acres within the study area, which includes a Hindu temple facility. Adjoining land uses within Maple Grove City limits include a combination of single-family and townhome residences to the south within the Delgany Neighborhood. Areas further to the southeast, include commercial and retail uses primarily within the Maple Commons development. Directly west and across I-94, land uses are similar to those within the study area, consisting of primarily undeveloped open areas, with larger-lot single-family residences.

The City's proposed 2018 Land Use plan designates the study area primarily low-medium density residential. Higher density residential categories are identified within the Hindu Society property in recognition of their campus master plan. An additional area identified for highdensity residential is located at the intersection of 105th and 101st Avenues. Areas east of 105th Ave and Lawndale Lane are designated as mixed use, envisioned to contain a mix of residential, office, and office-warehouse uses primarily. The school district property is identified as a future public use.

E.6: Medicine Lake

Medicine Lake is making long-term improvements to critical infrastructure beginning in the summer of 2024. These projects include complete reconstruction of all streets within the city of Medicine Lake, municipal water main installation, sanitary sewer upgrades, and lift station reconstruction. Each of these projects will impact all residents of Medicine Lake.

E.7: Medina

Recent residential development activity in Medina has included single-family and townhome development concentrated north of Highway 55. Commercial development included the new Adam's Pest Control office building and Loram Warehouse development. Okalee, a new senior housing/assisted living facility has also been constructed and the Wealshire Memory Care facility has been expanded, both housing populations with service needs. Development and construction have not been in hazard prone areas.

E.8: Minneapolis

Minneapolis recently received an application for an addition to an existing home in the floodplain. An existing home at 4845 James in the FP overlay and AE floodway proposed a building addition. They received a CUP to build the addition on pilings as opposed to on fill, which would have been permitted by code as of right. The proposed floor elevations were above the base flood elevation. No other development that is of relevance to the hazard mitigation plan occurred.

E.9: Minnetrista

The Woodland Cove development has progressed over the past several years in the area just north of Hwy 7 at Kings Point Road. It includes a variety of housing ranging from townhouses, villa homes, single family homes and multi-million dollar lake homes. Within the past year or so we have added commercial property to include a grocery store, Caribou Coffee, a liquor store and a several hundred unit apartment complex. Additionally, there are a couple other areas in the city currently zoned for multi-family development. None of these areas are prone to hazards.

E.10: New Hope

As an inner-ring suburb of Minneapolis, the city of New Hope is largely developed, with limited opportunities for further development. However, New Hope continues to pursue opportunities for redevelopment in all areas and has seen growth in commercial, industrial, and single-family housing areas, despite some slowing during the COVID19 pandemic. Single-family home values have risen steadily the past few years, increasingly the valuation of property for homeowners and slowly growing the overall tax base of the city. The city's population has held steady around the 21,000 mark for several years, and population diversity remains relatively steady year-over-year.

A new consideration for the community to incorporate into vulnerability planning is the addition of a new residential development. This development was completed on a 8.7 acre site, consisting of 32 single-family homes near a known Burlington Northern Santa Fe (BNSF) freight railway, which does transport hazardous materials, including crude oil. Continued development and redevelopment near this transport site is a consideration going forward.

E.11: Plymouth

The City of Plymouth has recently developed the Hollydale Golf Course into a residential neighborhood. This 160-acre development is located east of Holly Lane N between the 4600-block and the 5900-block. There are 231 lots for single family homes. There are no hazard prone areas in this new development. Enclave mixed use project is currently under construction. The property is located along Bass Lake Rd, west of Hwy 169 and consists of 19 acres. The project will contain commercial, office and mixed use retail/residential. There are no known hazard prone areas in this development.

Parkera and Twin Cities Orthopedics: is currently under construction and is a redevelopment site of Dundee Nursery. The site was remediated during initial construction and there are no known hazards. When complete the site will have a 70,00 Square Foot medical building (complete/TCO) and a 210 unit multi-family building with 428 parking spaces (bus transit).

E.12: Robbinsdale

Recent development in Robbinsdale can be characterized as redevelopment of obsolescent or underutilized commercial and office properties for high density multiple family uses. No building occurred in any hazard prone areas and there was no impact to vulnerable populations.

E.13: Rogers

Residential Development

The City has seen approximately 2000 new single family lots be platted/subdivided (available for construction, not necessarily built) over the past 5 years.

New Single Family and Townhome permits

- 265 new homes (single/townhomes) constructed in 2023.
- 226 in 2022
- 256 in 2021
- 141 in 2020
- 83 in 2019

Apartments

- 2019-2021 – Vincent Woods apartments constructed with 165 units.

2024 Hennepin County All-Jurisdiction Hazard Mitigation Plan
Volume 1- Background and County Profile

- 2022 - The Frederik apartments were constructed with approximately 175 units.
- 2023 - Territorial Lofts constructed on Territorial Road, 75 units
- 2022 - Quest Apartments constructed on 137th Avenue North, 135 units.

Commercial Development

- Endeavor Distribution Center (Brockton Lane)
- Graco expansion, 440,000 sq ft of industrial expansion of existing Graco facility. (David Koch)
- Capitol Beverage Expansion (South Diamond Lake Rd)
- Freddy's/Dunkin strip mall (Main Street)
- 21st Century Bank (Rogers Drive)
- I-State Trucking (CR81)
- Rogers Tennis Club (James Rd)
- Primrose Daycare (South Diamond Lake Rd)

Construction of Norbella Senior Living and Memory Care development (40 units) could introduce new vulnerable populations to the community on South Diamond Lake Road.

No recent developments are in a floodplain.