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RESILIENCY

Goal 1: Minnesota's environment, natural resources, and communities are resilient in the face of climate change, land use changes, and extreme weather events.

Fund projects that…

Applied Research & Technology Development (4 members selected)
Demonstration (4 members selected)

1. ~~Identify~~Research, demonstrate, and promote workable, holistic, multi-benefit~~, diverse~~, and economically- and ~~socially~~ socially-viable solutions for reducing the impacts of climate change, land use changes, and extreme weather events, through both engineered and natural solutions targeted at critical areas.

~~2. Research or demonstrate market-based policies that are economically viable and help pay for the land use, conservation, and other practices needed to achieve climate resiliency.~~

3. Use public open space to demonstrate climate change adaptation, mitigation, and prevention.

Education, Awareness, & Outreach (4 members selected)

4. Broaden understanding of effective climate adaptation management practices among ~~private~~ landowners through education, outreach, technical assistance, and the development of collaborations and networks to share and learn about new and innovative practices.

~~5. Develop collaborations and networks to share and learn about innovative and effective strategies.~~

Planning (3 members selected)

6. Support the development and implementation of local climate resiliency and adaptation plans that address landscape and species resiliency.

LESS THAN 2 MEMBERS SELECTED CATEGORY

Implementation (2 members selected)
Acquisition (2 members selected)
Restoration (2 members selected)
Construction (2 members selected)

~~7. Protect and restore wetlands, forests, prairies, and other critical systems that enhance biodiversity and provide multiple community resilience benefits.~~

8. Implement land and water management practices and protect and restore wetlands, forests, prairies, and other critical systems ~~that~~ to enhance biodiversity and provide multiple community resilience benefits~~ecosystem resilience to climate change~~.

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Monitoring (2 members selected)
Coordination & Collaboration (2 members selected)
Basic Research (1 member selected)

9. Compile existing research, identify gaps, and develop research to quantify land use and land cover changes, in order to identify restoration and protection needs to achieve resilient natural systems.

Equity (1 members selected)
Evaluation & Assessment (1 member selected)
Stewardship (1 member selected)

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WATER

Goal 2: Minnesota's water resources are better managed for both water quantity and quality to support aquatic life, drinking water, recreation, and other uses.

Fund projects that…

Basic Research (4 members selected)

1. Research impacts of ~~nutrients, agricultural~~ runoff, ~~and urban~~ stormwater, and contaminants on surface water and groundwater quality ~~and quantity, as well as opportunities to mitigate those impacts.~~ and develop practical solutions.

2. Research ~~effective~~ current and future water supply and use ~~scenarios~~ – including modeling water scenarios, mapping resources, managing water on land, optimizing use ~~to prevent overuse of groundwater~~, and improving water reuse ~~and wastewater management~~ – to identify improvements needed to support planning efforts and implementation of best management practices and ensure the state's water resiliency and sustainability.

3. Increase understanding of weather and future weather and climate patterns~~,~~ and ~~how these align with anticipated water needs across Minnesota~~its potential impact on water resources.

Monitoring (4 members selected)

4. Monitor and assess the condition of lakes, rivers, wetlands, and groundwater on a regular cycle and provide a long-term data set to support decision-making and evaluate efforts.

Implementation (3 members selected)
Restoration (4 members selected)
Construction (3 members selected)

5. Implement measures to improve water quality and restore and enhance habitats, shoreline, and natural hydrology in lakes, rivers, and wetlands.

Applied Research & Technology Development (3 members selected)
Demonstration (3 members selected)

6. ~~Research and d~~Demonstrate innovative~~, market-based policies~~ practices, strategies, and partnerships that ~~solve local~~prevent and reduce water issues in ~~both forest-based regions and agriculture-based~~urban, suburban, and rural regions.

~~7. Research, implement demonstrations, and develop incentives and policies related to holding back water and increasing evapotranspiration opportunities to prevent water pollution.~~

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Education, Awareness, & Outreach (3 members selected)

8. Provide educational opportunities and technical assistance programs for teachers, students, state and local decision-makers, landowners, and the public ~~Educate local officials~~ on how to improve and protect water resources, including ~~model projects and policies that can be emulated at all scales~~groundwater, surface water, and stormwater systems.

LESS THAN 2 MEMBERS SELECTED CATEGORY

Evaluation & Assessment (2 members selected)

9. Evaluate the effectiveness of current management and restoration practices and past investments to improve water resources.

Coordination & Collaboration (2 members selected)

10. Enhance coordination and collaboration among tribal, state, and local water agencies and community partners to improve the effectiveness and efficiency of water management.

Planning (2 members selected)
Acquisition (2 members selected)
Stewardship (2 members selected)
Equity (1 member selected)

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FISH AND WILDLIFE (SPECIES)

Goal 3: Minnesota has healthy and diverse aquatic and terrestrial wildlife and plant populations that sustain and enhance the state's environment, economy, and quality of life.

Fund projects that…

Basic Research (4 members selected)

1. Research species and ecosystems and develop strategies to effectively manage, maintain, protect, and restore healthy habitats and populations.

Monitoring (4 members selected)

2. Monitor the biologic and environmental health of systems to support and improve species management and conservation strategies.

Education, Awareness, & Outreach (3 members selected)
Stewardship (3 members selected)

3. Support and provide technical assistance and planning support to private landowners on cost-effective, ~~trustworthy~~ proven strategies and technologies to develop and restore diverse, native habitat.

4. Promote public awareness on the importance of diverse wildlife and plant populations through comprehensive education programs.

Implementation (3 members selected)
Restoration (4 members selected)
Acquisition (3 members selected)

5. Develop plans and ~~Implement~~ implement conservation actions to protect, conserve, and restore species, ~~that prioritize~~ with a priority on habitat connectivity and the needs of vulnerable, declining, poorly understood, or sensitive species.

6. Prevent the introduction, reduce the spread, or develop and demonstrate alternative control techniques for invasive species.

~~7. Conserve and restore additional lands and support management of currently protected lands.~~

~~8. Develop and implement plans that strategically conserve and restore large, connected natural areas, prevent habitat fragmentation, increase habitat connectivity, and allow species to shift their range.~~

Evaluation & Assessment (3 members selected)

9. Evaluate the effectiveness of current management practices and past investments to sustain and enhance wildlife and native plant populations.

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LESS THAN 2 MEMBERS SELECTED CATEGORY

Applied Research & Technology Development (2 members selected)
Coordination & Collaboration (2 members selected)
Demonstration (2 members selected)
Planning (1 member selected)
Construction (1 member selected)
Other (1 members selected) – Adaptive Management
Equity (0 members selected)

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LAND

Goal 4: Minnesota's public and private lands – including forests, grasslands, wetlands, and agricultural lands – provide long-term benefits to fish, wildlife, and people.

Fund projects that…

Demonstration (4 members selected)
Applied Research & Technology Development (3 members selected)

~~1. Promote, research, and evaluate best management practices (BMPs) on public and private lands, in order to provide long-term benefits to fish and wildlife.~~

~~2. Research, develop, and demonstrate agricultural production processes and systems that are significantly less carbon-intensive and decrease the loss of nutrients into groundwater and surface water.~~

~~3. Improve and demonstrate how working lands can be economically productive and good habitat.~~

~~4. Research and demonstrate the practical value of regenerative agriculture.~~

~~5. Develop innovative, market-based policies to make substantive conservation efforts financially feasible.~~

6. Develop~~ and implement~~, demonstrate, and evaluate new and innovative practices and processes on public and private lands, including agricultural ~~cropping systems with diverse crops~~and forest land, that provide multiple, long-term environmental and economic benefits~~, including~~ related to ~~exploring markets and supply chain~~habitat, water quality and quantity, and carbon sequestration.

Education, Awareness, & Outreach (4 members selected)

7. Enhance education, technical assistance, and public outreach to change landscape and ecosystem norms and promote the adoption of practices beneficial to the environment and natural resources.

~~8. Educate people through demonstration on the opportunity for public and private lands to slow and store water for multiple benefits (e.g., water quality, habitat, flood mitigation) as well as for carbon sequestration.~~

Restoration (5 members selected)
Acquisition (4 members selected)
Implementation (3 members selected)

9. Acquire and conserve minimally disturbed lands that provide the greatest capacity for multiple conservation benefits to humans, fish, wildlife, and water resources.

10. Restore and enhance lands to provide high-quality natural resource, ecological, or recreational value.

~~11. Preserve and protect the watersheds that are already in good shape.~~

~~12. Identify high-quality habitat, recreation open spaces, and other high-priority areas for action.~~

Coordination & Collaboration (3 members selected)

13. ~~Prioritize projects that~~Foster collaboration among diverse groups, enlist the support of multiple agencies and organizations, and incorporate tribal consultation.

LESS THAN 2 MEMBERS SELECTED CATEGORY

Basic Research (2 members selected)

14. Increase understanding and assessment of tradeoffs among different environmental and societal goals to improve decisions on public and private lands.

15. Collect, compile, and distribute foundational data on critical land and mineral resources to support sustainable resource management.

Planning (2 members selected)

15. Encourage landscape-level and eco-type planning, instead of parcel-level.

Construction (2 members selected)
Equity (1 member selected)
Evaluation & Assessment (1 member selected)
Stewardship (1 member selected)
Monitoring (0 members selected)

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EMERGING ISSUES

Goal 5: Minnesota responds quickly and proactively to emerging environmental and natural resources issues.

Fund projects that…

Applied Research & Technology Development (4 members selected)

1. Research and develop technologies, proactive measures, and emergency response actions to detect and address emerging or emergency threats to the environment and natural resources.

Coordination & Collaboration (4 members selected)

2. Create collaborations and build partnerships among all parties – including academic institutions, government agencies, non-government organizations, communities, and the private sector – to foster innovation and leverage resources and expertise.

3. Enhance coordination and interagency collaboration among federal, state, tribal, and local governments to ensure a unified response.

Implementation (4 members selected)
Restoration (3 members selected)

4. Implement proactive measures to prevent or minimize the impacts from emerging environmental or natural resource issues.

5. Implement natural resource corrective actions in response to emergency issues where delay will be detrimental to the environment and natural resources.

6. Restore impacted ecosystems to minimize the loss of ecological services.

Evaluation & Assessment (3 members selected)

7. Identify, assess, and prioritize potential threats to the environment and natural resources.

LESS THAN 2 MEMBERS SELECTED CATEGORY

Education, Awareness, & Outreach (2 members selected)

8. Raise public awareness about emerging environmental issues and the importance of proactive measures.

Basic Research (2 members selected)
Demonstration (2 members selected)

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Monitoring (1 member selected)

9. Establish comprehensive environmental monitoring networks to detect changes and potential threats.

Acquisition (1 member selected)
Equity (0 members selected)
Planning (0 members selected)
Construction (0 members selected)
Stewardship (0 members selected)

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ENERGY

Goal 6: Minnesota achieves reliance on renewable energy in all sectors, including transportation, building, industry, agriculture, and others.

Fund projects that…

Demonstration (4 members selected)

1. Evaluate, demonstrate, and assess renewable energy systems or fuels for economic viability, compatibility with other land uses, and holistic, life-cycle assessments of environmental and natural resource impacts.

~~1. Demonstrate the ability and statewide potential to generate solar energy on perennially vegetated lands, reducing CO2 and water runoff, while making the enterprise economically viable.~~

~~2. Demonstrate community-scale, net-zero renewable energy systems.~~

~~3. Evaluate, prioritize, and demonstrate how working lands and renewable energy can be mutually beneficial.~~

Basic Research (3 members selected)
Applied Research & Technology Development (3 members selected)

4. Research and develop new and innovative renewable energy and fuel technologies, including biofuels, e-fuels, sustainable aviation fuels, energy storage, and others.

Planning (3 members selected)

5. Develop and implement plans that identify, prioritize, and coordinate efforts to reduce energy consumption and transition to renewable energy through land use planning, infrastructure, education and awareness, and other methods.

Education, Awareness, & Outreach (3 members selected)

6. Provide inclusive education and training programs to build a skilled and diverse workforce for the renewable energy sector.

Implementation (3 members selected)
Construction (3 members selected)

7. ~~Incentivize~~ Encourage and support the use of ~~nonpolluting~~ renewable energy and energy efficiency in agriculture, mining, ~~industries~~industry, utilities, ~~and commercial~~ transportation, homes, and businesses.

~~5. Fund energy efficiency improvements and renewable energy for rental properties, small businesses, and schools.~~

~~6. Encourage bundling renewable energy production and battery storage.~~

Equity (3 members selected)

8. Ensure equitable access to renewable energy and energy efficiency programs in all communities.

LESS THAN 2 MEMBERS SELECTED CATEGORY

Coordination & Collaboration (2 members selected)
Evaluation & Assessment (2 members selected)
Monitoring (0 members selected)
Acquisition (0 members selected)
Restoration (0 members selected)
Stewardship (0 members selected)

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ACCESS AND OPPORTUNITIES

Goal 7: All Minnesotans, especially young people, have access to and take advantage of opportunities, including culturally relevant and innovative connections to the lands and waters of Minnesota.

Fund projects that…

Education, Awareness, and Outreach (4 members selected)
Stewardship (3 members selected)

1. Provide evidence-based, hands-on, and engaging curriculum, programs, and outdoor ~~environmental~~ events to bring a diversity of students and adults to outdoor experiences.

2. Create mentorship programs, leadership opportunities, and learning experiences for a diversity of young people to explore and pursue careers in the environment and natural resources.

3. Enhance environmental education initiatives by integrating diverse cultural perspectives, experiences, and partnerships that foster environmental stewardship in all communities.

~~4. Implement community-led initiatives that promote environmental stewardship.~~

Construction (4 members selected)
Acquisition (3 members selected)

5. Plan, design, and develop culturally relevant, accessible, and resilient outdoor recreation facilities and infrastructure – including recreation areas, parks, trails, fishing piers, and shelters – ~~and equipment rental programs~~ that create new experiences.

6. Expand networks of trails, parks, and natural areas to connect green spaces seamlessly, improve accessibility and safety, and encourage diverse populations to recreate and engage with nature.

Equity (4 members selected)

7. Address the social, economic, and physical barriers to outdoor recreation through programs that encourage inclusivity and address inequities so that public lands and waters are accessible to all.

8. Assess programs, activities, and physical spaces for their accessibility and effectiveness and implement changes to adapt and retrofit them to welcome more people.

Coordination and Collaboration (4 members selected)

9. Collaborate and partner with indigenous, local, BIPOC, and underserved communities to develop culturally relevant, inclusive, and accessible environmental, natural resource, and outdoor recreation programs, practices, curriculum, and facilities.

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Planning (3 members selected)

10. Develop roadmaps for outdoor recreational opportunities across the state providing communities a vision from which to build.

Demonstration (3 members selected)

LESS THAN 2 MEMBERS SELECTED CATEGORY

Basic Research (2 members selected)

11. Research people's interests in outdoor recreation and understand barriers to participation.

Implementation (2 members selected)
Restoration (2 members selected)
Evaluation & Assessment (2 members selected)
Monitoring (1 member selected)