



WETLAND CONSERVATION ACT

Restoration and Protection of Exceptional Natural Resource Value (ENRV)

BWSR Administrative Guidance, July 1, 2010

Overview

Rule Reference: MN Rule 8420.0526, Subpart 8.

Applicability: To provide guidance to Technical Evaluation Panels (TEPs) and Local Government Units (LGUs) for use in evaluating potential projects for the allocation of wetland replacement credit under the ENRV provisions of the Wetland Conservation Act (WCA). ENRV provides an option to generate credit for projects that restore and protect exceptionally valuable natural resource functions.

Intended Use: This guidance does not carry the weight of rule and is not binding on any party, however it does provide additional specificity for applying the ENRV action eligible for credit and should be used as a supplement to the WCA rule.

Project eligibility and the allocation of credit under ENRV is determined by the LGU with the concurrence of the TEP.

Application and Review Procedures

Decisions on eligibility and credit allocation are made by the LGU with TEP concurrence. LGUs must consider all WCA requirements and relevant local priorities in making decisions.

Applicants considering the use of ENRV should anticipate a rigorous review process. Using ENRV often requires additional documentation and more in-depth analysis than other actions eligible for credit. The determination of exceptional resource value and the contribution of a project to the function and sustainability of that resource requires detailed analysis and significant professional judgment by the TEP.

The review process for potential ENRV projects relies heavily on pre-application scoping. Early TEP involvement is vital. Applicants should solicit feedback from the TEP and consider any recommendations before submitting a complete application to the LGU. The TEP can provide early input on the value of the resource,

qualification for ENRV, information needs, and other aspects of the proposed project. Due to the diverse nature and complexity involved in utilizing the ENRV credit action, the TEP is encouraged to consult outside expertise for additional review and comment when appropriate.

The applicant must submit sufficient information to document the existence of an eligible resource and for the TEP to determine if the proposed project warrants the allocation of replacement credit. The use of ENRV is approved as part of a replacement or banking plan application in accordance with the standard WCA decision-making process.



Restoration and protection of wetlands and upland buffer adjacent to trout streams can be considered for ENRV due to the exceptional benefits they provide.

When is use of ENRV appropriate?

1. The LGU and TEP concur that the site meets the criteria to be considered an exceptional natural resource for purposes of allocating WCA replacement credit.
2. The action proposed will improve or directly contribute to the function and sustainability of the exceptional resource. The action could include removing a threat in order to improve sustainability.
3. Sufficient assurance exists that both the site and the conditions that result in the site being exceptional will be protected by the action proposed, the conservation easement, and/or other mechanisms.

Projects proposing the use of ENRV must comply with all applicable requirements of MN Rule 8420.

Qualification for use of ENRV is somewhat rare as other actions eligible for credit are usually available and exceptional resources are not common.



Projects that restore and protect northern white cedar are excellent candidates for ENRV.

Application Requirements for ENRV

The use of ENRV relies heavily on early TEP involvement and the submittal of supplementary information. In addition to the application requirements of MN Rule 8420.0330, the following information is of particular importance for the review of potential banking and replacement plan proposals utilizing ENRV:

- √ Supporting evidence for qualification as an exceptional natural resource (i.e. identification of state-listed species and associated habitat, rare plant community location and composition, wildlife travel corridor and discussion of significance, supporting documentation for sensitive surface waters, etc.). See page 3 of this guidance for details.
- √ A wetland delineation documenting the presence of wetland on the project site which either is an exceptional natural resource or will contribute to the function and sustainability of an exceptional resource.
- √ A description of the actions proposed and how they will improve the function and sustainability of the exceptional natural resource (this could involve a functional assessment).
- √ A description of potential credit allocation, and supporting rationale, based on this guidance and WCA rule.
- √ The identification of measurable performance standards with an associated monitoring plan.
- √ Identification of the conservation easement area (easement recorded after plan approval). To the extent practicable, the conservation easement should cover both the area restored and the exceptional resource itself (if different).

“Exceptional” Natural Resources

- ◆ **Exceptional Resources.** The WCA rule provides a list of exceptional resources. They include habitat for state-listed endangered or threatened species, rare native plant communities, special fish and wildlife resources, sensitive surface waters, and others determined to be exceptional by the TEP. See MN Rule 8420.0526, Subp. 8 for details. A site containing one of these resources, however, does not necessarily qualify for ENRV.
- ◆ **Public Value.** An exceptional resource is somewhat rare and of special value to the public because of the functions it provides. Exceptional resources are also typically difficult to replace, resulting in a permanent loss of function when impacted (i.e. white cedar swamps and bogs). What is considered exceptional will vary across the state based on abundance, functional benefits provided, statewide or national significance, watershed needs, and local values.
- ◆ **Qualification as Exceptional.** A site that contains a feature listed in rule as exceptional (i.e. rare native plant community) does not automatically qualify as exceptional for allocating ENRV credit. The LGU and TEP must determine that the resource is exceptional within the context of the watershed, region, or state and consistent with local priorities. For example, a wildlife travel corridor primarily used by raccoons is clearly not exceptional.
- ◆ **Functional Assessments.** The Minnesota Routine Assessment Method for evaluating wetland functions (MnRAM) can be used to assist in determining if a site is exceptional and to support the applicability of ENRV for allocating credit. For example, if a site is expected to be a significant wildlife resource, MnRAM can be used as evidence to support its exceptional rating. MnRAM ratings of high or exceptional, however, do not necessarily mean the site qualifies as “exceptional” for ENRV.
- ◆ **Approved Plans.** BWSR approved plans can identify local or regional goals for the restoration or protection of specific wetland types or functions that may be considered exceptional for ENRV.
- ◆ **Functional Gain.** Meeting the definition of exceptional doesn’t automatically result in project approval or the granting of replacement credit. The actions proposed must improve the long-term function and sustainability of the exceptional resource to a degree sufficient to justify the allocation of WCA replacement credit.



Pine marten rely on large tracts of contiguous wetland and upland habitat, including conifer swamps.

Ecological Suitability

TEPs should pay particular attention to the ecological suitability and sustainability requirements of MN Rule 8420.0522, Subp. 5 when evaluating proposals. In determining the value of a resource and the contributions of a proposed action, TEPs can also consider any of the following:

- Wetland types or characteristics that have been significantly lost in the watershed, including current trends in wetland and habitat loss, fragmentation, or degradation.
- Habitat connectivity and proximity to public lands or natural areas (i.e. Wildlife Management Areas).
- Sites that meet, or will meet, the criteria to qualify as a Scientific and Natural Area (as determined by the DNR).
- Wildlife habitat requirements for important species.
- Compatibility with adjacent land use (both current and projected).
- Watershed needs and the benefit of the project to the ecological functions of the watershed.

Allocating ENRV Credit

Credit should be allocated based on the degree a project contributes to the restoration and protection of an exceptional natural resource. The exceptional resource itself can be a wetland, public water, or upland. Proposed actions should directly benefit the exceptional function(s) of the resource and must have long-term and sustainable results. Eligible actions include restoration and preservation of the exceptional resource itself or adjacent wetland and upland areas. The project must include a restoration component to be eligible.

While preservation is often an important component of an ENRV project, restoration activities generally provide more value by improving the function of the exceptional resource in addition to preserving it. Restoration and protection of resources that are susceptible to future impacts generally provide more value than those less susceptible due to protection provided by other sources. The following provides suggested ranges of credit allocation based on the above generalities. The actual amount of credit may be more or less based on project specifics and the TEP's recommendation.



Duck nesting habitat adjacent to a restored prairie pothole in SW MN.

Eligible Actions		Credit Range
1)	Restoration of an exceptional wetland by reestablishing natural hydrology.	50 to 100 percent
2)	Restoration of an exceptional wetland by reestablishing permanent native, non-invasive vegetation.	25 to 50 percent (75% for white cedar)
3)	Restoration of wetland or upland adjacent to an exceptional resource when the restoration activity significantly improves the water quality or habitat functions of the exceptional resource.	25 to 50 percent
4)	Preservation of wetland or upland in combination with a qualifying restoration activity (details on page 5).	12.5 percent

Local Government Units must have TEP concurrence to approve the allocation of credit under ENRV.

General Considerations for Credit Allocation

- ◆ **Restoration.** “Restoration” refers to re-establishment of the natural pre-settlement conditions of a wetland or upland habitat that has been previously degraded or converted to another type by human activity. A wetland that is both hydrologically and vegetatively degraded must have both components restored.
- ◆ **Habitat Connections.** Activities on adjacent upland can include the restoration or preservation of important wildlife habitat connections and travel corridors. Upland should be connected to wetlands being restored or preserved and directly contribute to the function and sustainability of the exceptional resource.
- ◆ **Threat of Degradation or Loss.** Consider threats to the exceptional resource when evaluating projects for potential ENRV credit.
- ◆ **Flooding.** Although rare, restoration of hydrology can include removing excess water from a degraded site, i.e. restoring the natural hydrology of a white cedar swamp degraded from a roadway that blocked normal flow patterns and impounded excess water.
- ◆ **Buffer.** Wetland areas restored or preserved under ENRV should have a buffer adequate to protect the wetland and its function in perpetuity. LGUs should consider the specifications of MN Rule 8420.0522, Subp. 6 for minimum buffer width requirements and credit amounts.
- ◆ **Timeframe.** Restoration credit can only be granted for sites degraded by legal human activity that occurred at least 10 years prior to application.

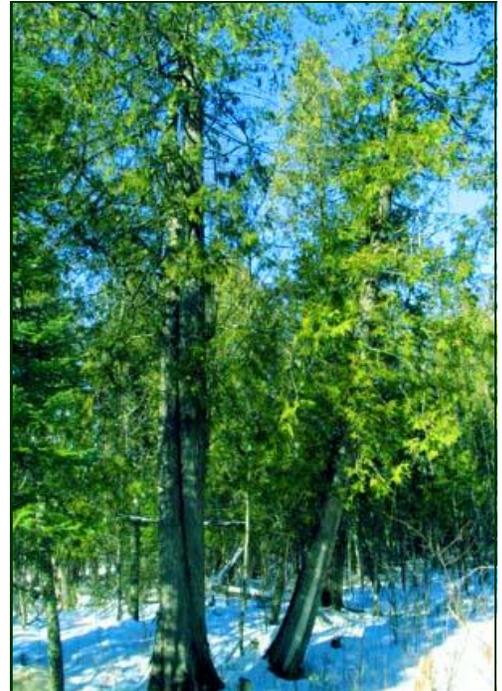
Preservation as a Component of ENRV

ENRV credit cannot be granted for preservation alone. However, ENRV replacement credit can be allocated for the preservation of exceptional wetlands when the project includes a significant restoration component. Typically, restoration of native, non-invasive vegetation or hydrology must occur on at least 25 percent of the project area. Restoration could be of a portion of the exceptional wetland itself, or of adjacent buffer if it substantially improves the function and sustainability of the exceptional resource. Preservation credit can only be granted for areas of native, non-invasive vegetation that do not require management intervention.

To be eligible for preservation credit as part of ENRV, the TEP must also determine that there is a high probability the wetland proposed for preservation will be degraded or impacted and that the wetland either:

- A. Contains or benefits an exceptional resource;
- B. Is a type or function that is rare, difficult to replace, or of high value to the watershed;
- C. Contains a rare or declining plant community; or
- D. Is of a type that is not likely to regenerate, such as northern white cedar.

Allocation of credit for preservation under ENRV is not limited by land ownership or area of the state. However, MN Rule 8420.0526, Subp. 9 and BWSR Preservation Guidance should be consulted for additional details.



Preservation can be considered for portions of sites containing a significant northern white cedar component.



Feeding and resting habitat for migrating scaup is of international importance.

Avoid allocating credit for actions or sites that will depend on perpetual, on-going management to be successful. Focus on achieving sustainable results.

Assessment Tools to Assist in Credit Allocation

Functional assessment methods (such as MnRAM) should not be used as the sole determinant of credit. However, such inventory and assessment methods can be useful tools to assist the TEP in determining the functional gain and success of a project as well as the resulting credit allocation in accordance with identified performance standards. For example, the more important the function and the greater the increase, the more justification for a higher credit allocation within the possible range. The following are some examples of such tools:

- MnRAM
- Floristic Quality Assessment (FQA) for MN Wetlands
- The Hydrogeomorphic Approach for Assessing Wetland Functions (HGM)
- An Index of Biotic Integrity (IBI) appropriate for the location and primary function of the site.
- Forest stand inventories and assessments.
- Hydrologic monitoring.

Applicants should coordinate with the TEP to include appropriate assessment tools in the restoration plan.

Technical Resources

Many sources of information are available for the LGU and TEP to consider in reviewing project proposals to determine if a site is exceptional and if a proposed activity warrants the allocation of wetland replacement credit. This information can vary depending on the specific resource and location. All relevant information can be considered, including:

- Natural resource management plans, wetland inventories, or ecological studies.
- Topographic and hydrologic maps, soil survey information, aerial photographs, and similar data sources.
- Information on rare, endangered, or threatened species and critical habitat.
- Minnesota's Sensitive Lakeshore Identification Manual, County Biological Survey, Natural Heritage Information System, and other fisheries, wildlife, and habitat surveys.
- Other published literature and technical reports.
- Input from local, state, and federal resource management agency technical professionals.
- MnRAM also contains a list of special features that can be useful as a starting point for making this determination.

See the BWSR website for examples of exceptional resources and a list of approved ENRV projects.



A decorah shale wetland may be considered exceptional in southern MN.

Clean Water Act Coordination

The U.S. Army Corps of Engineers is responsible for approving wetland mitigation credit under the federal Clean Water Act. To increase the likelihood that ENRV credit will be acceptable for both the state and federal programs, applicants are encouraged to consult with the Corps early in the process, before a full application is prepared and concurrent with TEP pre-application scoping.



Projects that restore and protect spawning habitat for northern pike or other important species can be eligible for ENRV.

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The primary authors of this guidance are:

- Les Lemm, WCA Coordinator
- Dale Krystosek, Senior Wetland Specialist

This document is available on the BWSR website and may be revised periodically. Check the website for the most current version. www.bwsr.state.mn.us/wetlands

Contact your Local Government Unit or BWSR Wetland Specialist for additional information.