What is a wetland?

Bog, slough, swamp, marsh, wetland—for most of us, those words mean a peaceful pond with cattails, water lilies, waterfowl and frogs.

That's accurate for some wetlands, but not all. Some may have visible surface water only a few weeks each year. Some are farmed or mowed for hay, or maintained as a lawn.

All wetlands, however, share these characteristics:

- they have mostly hydric soils, soils that developed in wet conditions;
- they are wet either above the ground or wet within 12 inches of the ground surface during all or part of the growing season;
- they have vegetation adapted to wet soil conditions.

Top photo: *Some wetlands hold standing water only a few weeks a year.*

Left photo: *Many wetlands are farmed.*

Wetland Classifications

Two different systems are commonly used in Minnesota to classify wetlands.

The Circular 39 system, developed by the U.S. Fish and Wildlife Service in 1956, divides wetlands in Minnesota into eight types. The main differences between them are depth of water and variety of vegetation.

The Cowardin classification, developed by the U.S. Fish and Wildlife Service in 1979, is far more precise. It uses a tier system, with each tier describing the components of a wetland more specifically and narrowly than the last.

The components of the wetland pictured below are described by the Cowardin method. For example, the center of the wetland is classified as PEMF: P means its system is Palustrine (shallow ponds, marshes, swamps, sloughs); EM means its class is Emergent Vegetation (erect, rooted and herbaceous vegetation adapted to wet soil conditions); and its hydrology modifier is F (Semi-permanently Flooded).

By contrast, the entire wetland is classified under the Circular 39 system as a Type 4.