Chapter 6
Wetlands

Introduction

The objectives of this chapter are:

- To notify aggregate operations that state and federal regulations apply to wetlands;
- To provide a general definition of what constitutes a wetland;
- To provide a practical approach to managing wetlands issues, including the regulatory aspects;
- To review the applicable regulations and requirements of a special type of wetland, the "isolated wetland;"
- To discuss the possible consequences of non-compliance;
- To provide a brief overview of the Tulloch Rule and the SWANCC decision, and
- To provide a list of persons to call with questions about wetlands regulations.

Much of the information contained in this chapter was found on U.S. EPA's website at: **http://www.epa.gov/owow/wetlands/**.

Protection of Wetlands - Regulatory Background and Authority

Wetlands are protected by both federal and state regulations. Although the CWA never specifically mentions "wetlands", the regulating authority, the Army Corps of Engineers ("Corps") has expanded its jurisdiction over time to include wetlands. Types of activities common to the mining industry, that may be regulated by Section 404 include, but are not limited to:

- Placement of spoil material,
- Construction of dams and levees,
- Draining of marshy areas,
- Construction of roadways, and
- Mining through marshy areas

One question frequently asked is "why are wetlands regulated?". Wetlands provide habitat for thousands of species of both aquatic and terrestrial plants and animals. Wetlands also provide a water-absorbing and water-slowing buffer when adjacent rivers overflow. Wetlands also absorb excess nutrients, sediment and other pollutants before they reach rivers, lakes and other water bodies. Finally, wetlands provide for many recreational and educational opportunities.

Four federal agencies have roles and responsibilities in wetlands regulation:
U.S. Army Corps of Engineers

- Administers day-to-day program,
- Final authority on jurisdictional determinations,
- Develops policy and guidance,
- Enforces Section 404

U.S. Environmental Protection Agency (EPA)

- Evaluates permit applications,
- Determines jurisdiction and applicability of exemptions
- Approves and oversees State (and Tribal) programs that have been delegated,
- Reviews and comments on individual permit applications,
- Enforces Section 404

U.S. Fish and Wildlife Service and national Marine Fisheries Service:

- Evaluates impacts of all new Federal projects and Federally-permitted projects

U.S. Department of Agriculture Soil Conservation Service

- Limited authority

Ohio has been delegated authority by the U.S. EPA to administer wetlands regulations in Ohio. Ohio also goes a step farther by regulating streams. The Ohio EPA (AOEPA@) conducts a review of the permit applications submitted to U.S. ACE from Ohio landowners wishing to impact wetlands. In addition to the 404 permit, a landowner must secure an additional permit, called a Section 401 Water Quality (AWQ@) Certification, from the OEPA.

What Is A Wetland?

Overview

The Corps and the EPA define wetlands as follows:

"Wetlands are areas that are inundated or saturated by surface or ground water at a frequency and duration sufficient to support, and that under normal circumstances do support, a prevalence of vegetation typically adapted for life in saturated soil conditions. Wetlands generally include swamps, marshes, bogs, and similar areas."

For our purposes, swamps, marshes, and bogs are well-recognized types of wetlands. However, it is important to know that many important specific wetland types have drier or more variable water systems than those familiar to the general public.

While the following section provides a brief technical discussion about what constitutes a wetland, we recommend that a professional experienced in the identification of wetlands be used for the final determination. However, a “certified” or “registered” consultant is not required by the Corps during this process. It is also important to note that wetlands regulation has been and is expected to continue to evolve, as court challenges attempt to deal with issues inherent to this subject. Again, persons knowledgeable in this field are best qualified to advise you on the current status of regulation and how it may pertain to your specific situation.

Characteristics of Wetlands

An area must exhibit all of the following three (3) characteristics to be defined as a wetland:

1. Hydrology (presence of water at or near the surface)
2. Hydric soils and
3. Wetland vegetation.

A brief description of each characteristic follows:

1. According to the U.S. ACE, hydrology exists when a suspected wetland has either saturated or flooded soils during the growing season. A specific length of time that the surface must remain wet has not been defined. Initial investigation into hydrology often begins with perusal of flood plain maps, soil surveys, historical aerial photographs and the like.
2. Hydric soils develop when the land is saturated, flooded or poorly drained for such a long time that oxygen becomes depleted and generate conditions unsuitable for most plants. Hydric soils can be suspected when the soil immediately below the surface has a blue or gray color, smells septic, or is sandy with dark streaks.
3. The plants that can grow in such conditions (saturated and with little/no oxygen), such as marsh grasses, are called "hydrophytes." It is usually the presence of hydrophytes that is the first indication that a wetland may be present.

What to Do When a Wetland Is Suspected

If you, as a landowner, suspect that a wetland may be present in an area that you would like to impact, a wetland delineation should be conducted. The purpose is two-fold:

First - if all three of the characteristics of wetlands are not present, there is no wetland and activities in the area may proceed without a (wetlands) permit. Even so, some landowners choose to discuss the results of the study with the Corps to ensure that the Corps would not consider the area to be a wetland. This is a good point to keep in mind, especially in light of the constant shifting of definitions regarding wetlands as well as the court battles that have occurred and are expected to continue to occur as environmental groups seek to expand the protection of the environment and the agencies seek to expand their authority in these matters.
Second - if all three characteristics of wetlands are present, then a wetland exists and almost all subsequent activities in that area are regulated. A delineation will verify the hydrology and will identify the type of hydric soil and plant species present. A delineation will also calculate the wetland's total surface area and determine the quality of the wetland. It is critical to determine these factors early in the permitting process.

Typically, a wetland delineation is conducted by an experienced and knowledgeable wetlands consultant who has a good working relationship with the agencies involved in the permitting process. A delineation should include the generation of a scaled site map that shows the wetland boundaries.

Once a wetland has been identified and delineated, the following general steps should be taken, in the order presented:

1. Review the Corps' list of exempt activities to see if your situation qualifies.
    a. If your activity is exempt, in most cases you may proceed without further review and/or approval
2. Review the Corps' list of Nationwide ("NW") Permits to see if your situation qualifies; obtain if appropriate.
    a. If your activity qualifies for a NW Permit, you may have to complete all or some of the following requirements:
        i. Pre-construction notification (PCN) only
        ii. Pre-construction notification followed by review by Corps and OEPA
        iii. Regional and/or case-specific conditions
        iv. A list of Nationwide Permits that may be applicable to the aggregate and industrial minerals' industries is included in Appendix A.
3. If your project falls within the Lake Erie Watershed, contact the Buffalo District to discuss whether the project qualifies for Letter of Permission (LOP) coverage. There are seven types of Lake Erie Watershed Projects that cause minimal degradation to waters of the state. These Letters of Permission (LOP) substantially expedite the permitting process. An individual Corps permit may need to be obtained (Item #5, below).
4. Review the OEPA's list of Nationwide Permits (included in Appendix B) to determine if there are additional restrictions to those listed in the Corps' NW Permits; comply as appropriate.
    a. If your activity qualifies for a NW Permit, you may have to complete all or some of the following requirements, which may be more stringent than the Corps' requirements:
        i. Pre-construction notification only
        ii. Pre-construction notification followed by review by OEPA
        iii. A 401 Certification
        iv. Review OEPA's special conditions and limitations to the NW permits (we recommend that you contact Randy Bournique of the OEPA and review the specific Corps NW permit you are considering to determine if there are any special conditions and limitations).
5. Obtain an individual 404 permit.
    a. Contact the appropriate District to discuss your project prior to preparation of the permit application. This is known as a pre-application consultation and often helps expedite the permit process.
    b. Prepare the application (Form ENG 434S, included in Appendix C of this Chapter). A Checklist of information required for an application to be considered complete is included in Appendix D.
    c. Submit the completed application to the appropriate District, along with the appropriate fee (usually $100 for commercial projects). A list of Corps contacts may be found on Page 10 of this Chapter.

6. Obtain an individual Section 401 WQ permit.
    a. Review OEPA's Pre-application Guidelines and Projects and Activities of Concern, both available on the web at: **http://www.epa.state.oh.us/dsw/401/guide.html** and **http://www.epa.state.oh.us/dsw/401/concern.html**, respectively.
    b. Contact the OEPA to discuss your project prior to preparation any final engineering plans and preparation of the permit application. This is known as a pre-application consultation and often helps expedite the permit process.
    c. If applicable, notify the OEPA permitting representative that your project qualified for an LOP through the Corps.
    d. Ensure that the Corps has notified OEPA of your 404-permit application (OEPA will not proceed with the 401 WQ certification without proof that the Corps is involved in a 404 permit for the project).
    e. Prepare the application (401/401appl.898, included in Appendix E of this Chapter, is also available on the web at **http://www.epa.state.oh.us/dsw/401/401appl_fis.pdf**
    f. Submit the completed application to the appropriate District. (Do not submit a fee at this time; a fee statement will be issued by the agency at a later date. Fees range from a minimum of $15.00 to a maximum of $200 per certification).
7. Obtain other permits that might be required for the project. Examples might include a stormwater permit, a Permit To Install for the installation of sedimentation ponds, or an NPDES permit for the discharge of water off-site (see Chapter 7). An air permit might be required for the clearing activities in the area; see Chapter 4 for details.

Once applications are received by the agencies, several similar procedures are initiated within each agency:

- Agency will conduct a completeness review of the application materials. Applicant will receive notice of the determination.
- Agency will publish public notice regarding nature of proposed project and generally will provide 30-days for the public to comment.
- Agency will hold public hearing(s) if suitable public interest is generated.
- Agencies will review comments provided by other stakeholders such as U.S. Fish and Wildlife Service and national Marine Fisheries Service, U.S. Department of Agriculture Soil Conservation Service, ODNR, etc.
- The permit application is issued or denied.

During the Ohio EPA's review phase, the agency must take into consideration whether the water quality will be lowered by the proposed work. The Director cannot authorize the work unless the applicant makes the following case:

1. the wetland impacts cannot be avoided,
2. the unavoidable impacts have been minimized and
3. the impacts are necessary to accommodate important social or economic development in the area.

These three criteria are contained in the Antidegradation Rule and are somewhat complex to address in the planning and completion of the permit application. Again, a consultant experienced in the permit process would be very helpful to complete all parts of any of the appropriate applications.

Isolated Wetlands

The court case that brought the topic of isolated wetlands to the eyes of industry is known as the SWANCC decision and is discussed further in Section 4.7.2 (below). Prior to 2001, if migratory birds used the waters or wetlands as habitat, they were usually deemed jurisdictional. The 2001 SWANCC decision (U. S. Supreme Court decision) restricted the Corps from regulating isolated "waters of the United States", including wetlands under Section 404 of the CWA. Therefore, no Corps permit is necessary to fill isolated wetlands. However, as did many states, Ohio passed legislation in 2001 that establishes a permanent permitting process for isolated wetlands.

An isolated wetland is defined as Anon-tidal wetlands that are not part of a surface tributary system to intrastate or navigable waters of the Unites States **and** are not adjacent to such tributary water bodies. Examples of isolated wetlands might include potholes and shallow ponds.

Ohio classifies isolated wetlands into three categories that are defined by wetland quality:
Category 1 - generally, the lowest quality of wetland. These wetlands may have developed on excavated or mined lands. These wetlands are recognized to be so degraded or to have such limited potential for restoration that no social or economic justification and lower standards for avoidance, minimization and mitigation are applied.
Category 2 - generally, the broad middle category of "good" wetlands. These wetlands generally have been "...degraded but have a reasonable potential for reestablishing lost wetland functions."
Category 3 - the highest quality of wetland. These wetlands are considered superior, based on habitat, hydrology, recreational function, as well as diversity of species often including threatened or endangered species.

Ohio EPA offers two types of isolated wetland permits: a General Isolated Wetland Permit and an Individual Isolated Wetland Permit. The General Isolated Wetland Permit is available for those isolated wetlands that impact 1/2-acre or less to a Category 1 and/or 2 wetland. The

Individual Isolated Wetland Permit can be used for any impact greater than 1/2-acre for Category 1 isolated wetlands, and between 1/2- and 3-acres for Category 2 isolated wetlands. In Ohio, no impacts to Category 3 wetlands normally are permitted. However, the OEPA would consider an impact to a Category 3 wetland if it was unavoidable and there was sufficient public need.

The approach to permitting an isolated wetland in Ohio is similar to the procedure outlined in the preceding section. No Corps permit is necessary to obtain. Ohio EPA Isolated Permit applications are available on OEPA's website at:
http://www.epa.state.oh.us/dsw/401/Level1_App_Draft2_fis.pdf and
http://www.epa.state.oh.us/dsw/401/Level2_App_Draft2_fis.pdf respectively. Copies of these applications are included in Appendices F & G of this Chapter.

Applications for each of the permits are included in Appendix H. The fees for Ohio's Isolated Wetland Permitting program are outlined in ORC 3745.113. An application fee of $200 must accompany the application; a review fee of $500.00 per acre of wetland impacted is also assessed. The maximum review fee has been established to be $5000.00 per application. If impacts have already taken place, prior to application, the review fee may be doubled, up to a maximum of $10,000.00.

A Practical Approach to Managing Wetlands Issues

The ideal time to address potential wetlands issues is when a property is being considered for purchase. A preliminary wetlands determination, a brief review of site features and readily available resources to identify possible wetlands, should be made in the initial stages of Due Diligence work. If a possible wetland is identified, its location is in an area that is likely to be modified by any activity associated with mining, and purchase of the site appears to be likely, a wetlands determination and delineation should be performed. Verification of the presence of wetland(s) and actual delineation of the wetlands allows the prospective purchaser the opportunity to identify costs that would be associated with the three options for dealing with wetlands: avoidance, minimization and mitigation/monitoring. These costs should be assessed with all of the other costs associated with purchase of the site, and compared to the benefit of purchasing the site.

In many cases, however, wetlands exist on properties, which are currently being mined. As mining progresses, it may become necessary to assess whether impacting a wetland makes economic sense.

Avoidance is the simplest manner to address the presence of wetlands. The decision to avoid all wetlands should be balanced with an assessment of economic feasibility and that the avoidance does not totally hinder the operation.

However, if a business decision is made that the impact of a wetland is necessary, and then authorization from the Corps (a permit) should be pursued. In order to receive authorization from the Corps, an application that contains a mitigation plan and a mitigation/monitoring plan

will need to be submitted. The minimization plan should address impacts to all wetland areas, which may occur either through direct action (i.e. placement of overburden in a wetland area) or through indirect action (i.e. alteration of water flow to an existing wetland through mining activities). Mitigation refers to compensation for the loss of existing wetland. Compensatory mitigation can be accomplished through a variety of strategies including:

- Restoration of the impacted wetland upon project completion,
- Creation of new wetland somewhere else on the property,
- Creation of wetlands off the property, or
- Purchase of acreage in an existing wetland mitigation bank.

The Corps requires a compensatory mitigation ratio that depends on the quality of the impacted water. The Corps often defaults to Ohio's standards as the minimum. Ohio requires compensatory mitigation ratios depending on the location of the wetland and its quality. The minimum ratios range from 1.5: 1 to 3: 1. The Corps will also require a monitoring plan for the establishment of a wetland plant community and maintenance of wetland hydrology. Maintenance of the mitigation wetland is for perpetuity; remedial action must be taken if the wetland is not progressing towards or reverts from the stated goals in the mitigation plan.

Compliance Issues

The primary objective behind compliance is avoidance of fines and bad publicity. The bottom line is that proceeding without a required permit that may or will have an impact on wetlands is a violation of federal law. The owner, developer and/or the contractor can be subject to civil or criminal penalties if they proceed without a permit. Penalties may be assessed up to $50,000 per day of violation. An alternative to a monetary penalty is the requirement to restore the area that had been disturbed without a permit.

Tulloch Rule and the SWANCC Decision

Aggregate and industrial minerals operations may have heard of the Tulloch Rule and the SWANCC decision in the past few years. Both court cases generated a lot of concern and a lot of confusion regarding the authority of the agencies to regulate certain activities or certain wetland areas. In this section, a brief overview of the issues involved in each case is given, followed by statement that concludes the status quo.

Tulloch Rule

The Tulloch Rule commonly is viewed as an effort by the Corps and the EPA to increase their authority regarding certain construction activities in wetlands. Prior to the adoption of the rule, developers used a strategy to drain wetlands without having to obtain a federal permit. In these cases, developers used machines like backhoes, dredges and bulldozers to create ditches, channels and/or retention ponds, taking care to ensure that almost none of the excavated material was redeposited back into the wetland. These ditches, channels and retention ponds were then

used to drain wetland areas, making the area ready for development - all without having to go through the Section 404 process.

The Tulloch Rule essentially expanded Section 404 to include "any addition, including any redeposit" of material - even in de minimus amounts. Thus, the Tulloch Rule, which became

effective on August 25, 1993, required a section 404 permit for activities resulting in "incidental fallback".

The Tulloch Rule was invalidated on June 19, 1998 by the U.S. court of Appeals for the District of Columbia. This court decision found that EPA and the Corps lacked the authority granted by the CWA to regulate such activities if they were conducted in a manner to result in only incidental fallback. In conclusion, land clearing and excavation activities in wetlands currently can be performed without having obtained a Section 404 permit if only incidental fallback occurs. Due to the likelihood that this issue will again be challenged, it is recommended that a landowner consult the appropriate Corps district prior to engaging in these activities.

Because Ohio's 401 process is triggered only when Section 404 is applicable, if the Corps indicates that your proposed activity that generates only incidental fallback does not require a 404 permit, then Ohio cannot require that you obtain a 401 permit.

SWANCC Decision

Previously, based on the Migratory Bird Rule, the Corps had been citing its Section 404 authority over projects involving isolated wetlands by requiring a 404 permit to conduct filling activities in those wetlands.

As a result, the Corps issued guidance in 2001 indicating that Corps field staff can no longer rely on the use of waters or wetlands as habitat for migratory birds as the sole basis for assertion of jurisdiction.

At that time, Ohio enacted legislation that protected isolated wetlands. See Section 4.5 of this Chapter for a discussion of Ohio's program.

Agency Contact Information

U. S. Army Corps of Engineers:

Buffalo District- 1776 Niagara Street, Buffalo, New York 14207 (716) 879-4209 (716) 879-4330
Louisville District- P. O. Box 59 Louisville, KY 40201-0059 (502) 315-6100 (502) 315-6733
Huntington District- CELRH, Huntington 502 Eighth Street Huntington, WV 25701 (304) 399-5210 (304) 399-5353 (866) 502-2570

Pittsburgh District- 2032 William S. Moorhead Federal Building 1000 Liberty Avenue Pittsburgh, PA 15222-4186 (412) 395-7500 (412) 395-7155

Ohio E.P.A.

401/Wetland Ecology Unit Lazarus Government Center 122 S. Front Street Columbus, OH 43216 (614) 644-2001
Jeff Boyles (614) 644-2012
Dan Osterfeld (614) 644-2152 General Isolated Wetland Permit
Peter Clingan (614) 644-2139
Mike Smith (614) 644-2326
Laura Fay (614) 644-2148
Randy Bournique (614) 644-2013

ODNR

Division of Natural Areas and Preserves
Data Services
Natural Heritage Program
1889 Fountain Square Court, Bldg. F-1
Columbus, OH 43224-1331
(614) 265-6453
http://www.dnr.state.oh.us/odnr/dnap/

Ohio Division of Wildlife
National Waterfowl Management Plan
1840 Belcher Drive, Bldg. G-3
Columbus, OH 43224-1329
(614) 265-6330
http://www.dnr.state.oh.us/odnr/wildlife/

U.S. Fish and Wildlife Service

Washington D.C. Office
Division of Endangered Species
Mail Stop 420ARLSQ
1849 C St., NW
Washington, D.C. 20240

Region Three
Ecological Services Operations
Federal Building
Ft. Snelling, Twin Cities, MN 55111

Reynoldsburg Ecological Service Field Office
6950 Americana Parkway, Suite H
Reynoldsburg, OH 43068-4132
(614) 469-6923

Migratory Bird Coordinator
BHW Federal Building, 1 Federal Drive
Ft. Snelling, Twin Cities, MN 55111
(612) 713-5458

Joint Venture Coordinator - National Waterfowl Management Plan - Ohio
BHW Federal Building, 1 Federal Drive
Ft. Snelling, Twin Cities, MN 55111
(612) 713-5433