

SOMERSET SOLAR, LLC

MATTER NO. 21-00982

§900-2.15 Appendix 14-C Revised

Conceptual Wetland Restoration and Mitigation Plan

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§ Section% percent

Applicant Somerset Solar, LLC

Application Somerset Solar Application for a Siting Permit

Facility Somerset Solar Facility

Facility Site Approximately 700-acres defining the limit of disturbance of the Facility

NYS New York State

ORES Office of Renewable Energy Siting

PEM palustrine emergent
PFO palustrine forested

Project Site Approximately 1,396 acres of land defining the project boundary

PSS palustrine scrub-shrub

USACE United States Army Corps of Engineers
WRMP Wetland Restoration and Mitigation Plan



Introduction

The following Conceptual Wetland Restoration and Mitigation Plan (WRMP) has been developed by Tetra Tech, Inc. on behalf of Somerset Solar, LLC (the Applicant) for the Somerset Solar Facility (Facility) located in Somerset, New York. The WRMP was prepared as a component of the Application for a Siting Permit under Section (§) 94-c regulations (Application) submitted to the Office of Renewable Energy Siting (ORES) and serves as the proposal to compensate for anticipated activity within New York State (NYS) jurisdictional wetlands and NYS-regulated adjacent areas pursuant to §900-10.2(f)(2) of the §94-c regulations1. NYSregulated adjacent areas include activities located within 100 feet of NYS-jurisdictional wetlands. As described in the Application, the Applicant's detailed and careful layout considerations and design that are intended to avoid and minimize impacts to aquatic resources to the extent practicable, has resulted in de minimis major activity within wetlands (0.09 acre of major and intermediate activity within NYS-jurisdictional wetlands and 12.87 acres of activity within NYS-regulated adjacent area that do not require mitigation). As required by §94-c regulations, activity within NYS-jurisdictional wetlands and regulated adjacent areas have been categorized as "major, intermediate, or minor". This WRMP describes wetland mitigation activities proposed to compensate for major activity within NYS-jurisdictional wetlands and other activity within NYSregulated adjacent areas resulting from construction of the Facility. Proposed mitigation activities include wetland creation consisting of expanding the wetland area by converting an area of adjacent upland to wetland area by excavating the area to the adjacent wetland grade (and associated water table) and increasing natural vegetation by planting species found within the observed vegetative community. Based on the wetland community, plantings will consist of herbaceous, shrub, and/or tree species.

This WRMP is conceptual in nature and is intended to provide an overall mitigation framework that will be followed. The final WRMP will be submitted as a compliance filing following the issuance of a final Siting Permit for the Facility. The final WRMP will contain the selected mitigation site, which has been approved with the landowners, and subject to approval by ORES. The mitigation location included in this WRMP is preliminary and subject to change, but is identified to illustrate the potential mitigation objectives, as well as document that mitigation can be achieved per the requirements of §94-c regulations, to enable permitting of the proposed wetland activity.

¹ For consistency and to align with the Office of Renewable Energy and Siting Section 94-c regulations terminology, the Applicant is referring to the wetland mitigation plan as the Wetland Restoration and Mitigation Plan (WRMP); however, to address wetland mitigation requirements the Applicant is proposing wetland creation.

Project Description

The Applicant is proposing to construct a 125-megawatt alternating current solar photovoltaic Facility on portions of land located at 7725 Lake Road within the Town of Somerset, Niagara County, New York (Figure 1) (Project Site). The Facility Site is approximately 700-acres, inclusive of the limit of disturbance that will be used for the construction and operation, photovoltaic solar arrays and associated infrastructure (Facility), which comprises approximately 39 percent (%) of the total Project Parcels acreage. Portions of the Facility Site located south of Lake Road consist predominately of open agricultural areas currently used for production of row crops (hay, corn and soybeans), with the portions located north of Lake Road consisting predominately of previously disturbed lands associated with the former coal facility, Somerset Station, including Solid Waste Disposal Area II. Additional Facility details are summarized in Exhibit 3 of the Application.

Activity

As documented in Exhibit 14 of the Application, avoidance and minimization measures have resulted in minimal long-term, activity affect to wetlands. After areas or components of the Facility Site are constructed, the work areas will be stabilized and largely restored to pre-existing conditions in accordance with 19 New York Codes, Rules and Regulations §900-6.3(q)(2)(iii). To expedite restoration of wetlands subject to activity, wetlands will be seeded with a mix of an appropriate native, naturalized, non-invasive wetland plant seed mix.

While the Facility was designed to largely avoid activity within wetland, one wetland (Wetland WA-5) will have major activity from construction and installation of Facility infrastructure (access road crossing with culverts), and these activities will occur in such a way that the wetland activity area is not expected to reestablish after construction, post-construction restoration, or operational phases of the Facility. Table 1 below summarizes the anticipated amount of activity within NYS-jurisdictional wetlands and regulated adjacent areas.

Table 1: Proposed Activity within New York State-Regulated Wetlands within the Facility Site

Wetland ID	Cowardin Class ¹	Principal Functions	Assessed Quality	Feature / Activity ²	Wetland Area Activity (acres)	Adjacent Area Activity (acres)		
	Major Activity							
WA-3A	PFO	Floodflow Alteration, Sediment/Toxica nt Retention, Nutrient Removal, Wildlife Habitat,	Good	Power interconnections (including clearing for interconnections)	-	0.02		



Wetland ID	Cowardin Class ¹	Principal Functions	Assessed Quality	Feature / Activity ²	Wetland Area Activity (acres)	Adjacent Area Activity (acres)
		Uniqueness/Heri tage				
WA-3B	PFO	Floodflow Alteration, Sediment/Toxica nt Retention, Nutrient Removal, Wildlife Habitat, Uniqueness/Heri tage	Good	Solar Panels	-	0.21
WA-5	PFO	Sediment/Toxica nt Retention, Nutrient Removal, Production Export, Wildlife Habitat, Uniqueness/Heri tage	Good	Access Road	0.05	0.46
WA-5	PFO	Sediment/Toxica nt Retention, Nutrient Removal, Production Export, Wildlife Habitat, Uniqueness/Heri tage	Good	Clearing of forest	0.01	0.34
WA-5	PFO	Sediment/Toxica nt Retention, Nutrient Removal, Production Export, Wildlife Habitat, Uniqueness/Heri tage	Good	Solar Panels	-	0.02
WA-5	PFO	Sediment/Toxica nt Retention, Nutrient Removal, Production Export, Wildlife Habitat,	Good	Power interconnections (including clearing for interconnections)	0.002	0.14



Wetland ID	Cowardin Class ¹	Principal Functions	Assessed Quality	Feature / Activity ²	Wetland Area Activity (acres)	Adjacent Area Activity (acres)
		Uniqueness/Heri tage				
WA-12	PFO	Sediment/Toxica nt Retention, Nutrient Removal, Production Export, Wildlife Habitat, Uniqueness/Heri tage	Good	Access Road	•	0.15
WA-12	PFO	Sediment/Toxica nt Retention, Nutrient Removal, Production Export, Wildlife Habitat, Uniqueness/Heri tage	Good	Solar Panel	-	0.23
WA-12	PFO	Sediment/Toxica nt Retention, Nutrient Removal, Production Export, Wildlife Habitat, Uniqueness/Heri tage	Good	Power interconnections (including clearing for interconnections)	,	0.02
WA-12	PFO	Sediment/Toxica nt Retention, Nutrient Removal, Production Export, Wildlife Habitat, Uniqueness/Heri tage	Good	Clearing of forest	-	0.06
WB-13	PFO	Floodflow Alteration, Sediment/Toxica nt Retention, Nutrient Removal, Wildlife Habitat,	Good	Clearing of forest	-	0.02



Wetland ID	Cowardin Class ¹	Principal Functions	Assessed Quality	Feature / Activity ²	Wetland Area Activity (acres)	Adjacent Area Activity (acres)
		Uniqueness/Heri tage				
WB-18	PEM	Floodflow Alteration, Sediment/Toxica nt Retention, Nutrient Removal, Wildlife Habitat, Uniqueness/Heri tage	Good	Solar Panels	-	1.04
WB-18	PSS	Floodflow Alteration, Sediment/Toxica nt Retention, Nutrient Removal, Wildlife Habitat, Uniqueness/Heri tage	Good	Solar Panels	-	0.45
WB-18	PSS	Floodflow Alteration, Sediment/Toxica nt Retention, Nutrient Removal, Wildlife Habitat, Uniqueness/Heri tage	Good	Power interconnections (including clearing for interconnections)	0.001	0.18
WB-18	PEM	Floodflow Alteration, Sediment/Toxica nt Retention, Nutrient Removal, Wildlife Habitat, Uniqueness/Heri tage	Good	Power interconnections (including clearing for interconnections)	-	<0.01
WB-19	PFO	Floodflow Alteration, Sediment/Toxica nt Retention, Nutrient Removal, Wildlife Habitat,	Good	Access Road	-	0.04



Wetland ID	Cowardin Class ¹	Principal Functions	Assessed Quality	Feature / Activity ²	Wetland Area Activity (acres)	Adjacent Area Activity (acres)
		Uniqueness/Heri tage				
WB-19	PFO	Floodflow Alteration, Sediment/Toxica nt Retention, Nutrient Removal, Wildlife Habitat, Uniqueness/Heri tage	Good	Power interconnections (including clearing for interconnections)	-	0.08
WB-20A	PFO	Floodflow Alteration, Sediment/Toxica nt Retention, Nutrient Removal, Wildlife Habitat, Uniqueness/Heri tage	Good	Clearing of forest	-	0.07
WB-20A	PFO	Floodflow Alteration, Sediment/Toxica nt Retention, Nutrient Removal, Wildlife Habitat, Uniqueness/Heri tage	Good	Power interconnections (including clearing for interconnections)	,	0.02
WB-25	PEM	Floodflow Alteration, Sediment/Toxica nt Retention, Nutrient Removal, Wildlife Habitat, Uniqueness/Heri tage	Good	Clearing of forest	0.004	0.34
WB-25	PEM	Floodflow Alteration, Sediment/Toxica nt Retention, Nutrient Removal, Wildlife Habitat,	Good	Power interconnections (including clearing for interconnections)	-	0.05



Wetland ID	Cowardin Class ¹	Principal Functions	Assessed Quality	Feature / Activity ²	Wetland Area Activity (acres)	Adjacent Area Activity (acres)
		Uniqueness/Heri tage				
		Int	termediate Ac	tivity		
WA-5	PFO	Sediment/Toxica nt Retention, Nutrient Removal, Production Export, Wildlife Habitat, Uniqueness/Heri tage	Good	Clearing and manipulation of undisturbed herbaceous vegetation	-	0.30
WA-5	PFO	Sediment/Toxica nt Retention, Nutrient Removal, Production Export, Wildlife Habitat, Uniqueness/Heri tage	Good	Other activities integral to the project involving grading	0.02	-
WA-5	PFO	Sediment/Toxica nt Retention, Nutrient Removal, Production Export, Wildlife Habitat, Uniqueness/Heri tage	Good	Security fence	-	<0.01
WA-12	PFO	Sediment/Toxica nt Retention, Nutrient Removal, Production Export, Wildlife Habitat, Uniqueness/Heri tage	Good	Clearing and manipulation of undisturbed herbaceous vegetation	-	0.26
WA-12	PFO	Sediment/Toxica nt Retention, Nutrient Removal, Production	Good	Security fence	-	<0.01



Wetland ID	Cowardin Class ¹	Principal Functions	Assessed Quality	Feature / Activity ²	Wetland Area Activity (acres)	Adjacent Area Activity (acres)
		Export, Wildlife Habitat, Uniqueness/Heri tage				
WB-13	PFO	Floodflow Alteration, Sediment/Toxica nt Retention, Nutrient Removal, Wildlife Habitat, Uniqueness/Heri tage	Good	Security fence	-	<0.01
WB-18	PSS	Floodflow Alteration, Sediment/Toxica nt Retention, Nutrient Removal, Wildlife Habitat, Uniqueness/Heri tage	Good	Security fence	-	<0.01
WB-18	PEM	Floodflow Alteration, Sediment/Toxica nt Retention, Nutrient Removal, Wildlife Habitat, Uniqueness/Heri tage	Good	Security fence	<0.01	<0.01
WB-18	PEM	Floodflow Alteration, Sediment/Toxica nt Retention, Nutrient Removal, Wildlife Habitat, Uniqueness/Heri tage	Good	Clearing and manipulation of undisturbed herbaceous vegetation	-	0.08
WB-19	PFO	Floodflow Alteration, Sediment/Toxica nt Retention, Nutrient	Good	Security fence	-	<0.01



Wetland ID	Cowardin Class ¹	Principal Functions	Assessed Quality	Feature / Activity ²	Wetland Area Activity (acres)	Adjacent Area Activity (acres)
		Removal, Wildlife Habitat, Uniqueness/Heri tage				
			Minor Activi	ty		
WA-3A	PFO			Grading and manipulation of disturbed areas	-	0.03
WA-3B	PFO	Floodflow Alteration, Sediment/Toxica nt Retention, Nutrient Removal, Wildlife Habitat, Uniqueness/Heri tage	Good	Grading and manipulation of disturbed areas	-	0.34
WA-5	PFO	Sediment/Toxica nt Retention, Nutrient Removal, Production Export, Wildlife Habitat, Uniqueness/Heri tage	Good	Grading and manipulation of disturbed areas	-	1.82
WA-12	PFO	Sediment/Toxica nt Retention, Nutrient Removal, Production Export, Wildlife Habitat, Uniqueness/Heri tage	Good	Grading and manipulation of disturbed areas	-	0.41
WB-13	PFO	Floodflow Alteration, Sediment/Toxica nt Retention, Nutrient Removal, Wildlife Habitat, Uniqueness/Heri tage	Good	Grading and manipulation of disturbed areas	-	1.18



Wetland ID	Cowardin Class ¹	Principal Functions	Assessed Quality	Feature / Activity ²	Wetland Area Activity (acres)	Adjacent Area Activity (acres)
WB-13	PFO	Floodflow Alteration, Sediment/Toxica nt Retention, Nutrient Removal, Wildlife Habitat, Uniqueness/Heri tage	Good	Selective tree/shrub cutting	-	2.02
WB-18	PEM	Floodflow Alteration, Sediment/Toxica nt Retention, Nutrient Removal, Wildlife Habitat, Uniqueness/Heri tage	Good	Grading and manipulation of disturbed areas	-	1.03
WB-18	PSS	Floodflow Alteration, Sediment/Toxica nt Retention, Nutrient Removal, Wildlife Habitat, Uniqueness/Heri tage	Good	Grading and manipulation of disturbed areas	-	1.09
WB-19	PFO	Floodflow Alteration, Sediment/Toxica nt Retention, Nutrient Removal, Wildlife Habitat, Uniqueness/Heri tage	Good	Grading and manipulation of disturbed areas	-	0.21
WB-20A	PFO	Floodflow Alteration, Sediment/Toxica nt Retention, Nutrient Removal, Wildlife Habitat, Uniqueness/Heri tage	Good	Grading and manipulation of disturbed areas	-	0.02



Wetland ID	Cowardin Class ¹	Principal Functions	Assessed Quality	Feature / Activity ²	Wetland Area Activity (acres)	Adjacent Area Activity (acres)
WB-25	PEM	Floodflow Alteration, Sediment/Toxica nt Retention, Nutrient Removal, Wildlife Habitat, Uniqueness/Heri tage	Good	Grading and manipulation of disturbed areas	-	0.14
		Total				12.87

- 1 PEM palustrine emergent wetland, PSS palustrine scrub shrub, PFO palustrine forested, POW palustrine open water.
- 2 Grading and manipulation of disturbed areas includes manipulation within the agricultural fields for placement and temporary storage of materials/equipment and general activities and foot traffic in the limit of disturbance area.

Functions and Values

The United States Army Corps of Engineers (USACE) Highway Methodology Workbook Supplement: Wetland Functions and Values (Supplement) (USACE 1999) was utilized to evaluate the functions and values of the wetlands directly impacted by the Facility. These functions and values are summarized in Exhibit 14, Section 14(c) of the Application, and completed functions and values forms for impacted wetland are provided in Appendix 14-B of the Application. All wetlands in which activities will occur were assessed as "good" quality and associated with "Unmapped >12.4 acres" wetlands. These wetlands vary in size and are generally not heavily impacted by human activities, with a high potential to absorb sediments and toxicants from surrounding agricultural lands and impervious surfaces. Some are associated with deep organic soils and dense vegetation, with water presence having seasonal variation. Dense vegetation provides cover and multiple habitats for wildlife species, with food sources occurring within and adjacent to the wetland complexes.

Calculation of Required Mitigation

As stated previously, it is anticipated that a total of 0.09 acre of major and intermediate activity within NYS-jurisdictional wetlands and 12.87 acres of other activity to NYS-regulated adjacent areas will occur. Appropriate mitigation for the proposed activity was determined through the examination of activity acreage (as noted above), the type of activity, and current condition of affected wetlands. The mitigation ratio for the activity was determined to be 1:1 for the "Unmapped >12.4 acres" wetlands, resulting in the need for approximately 0.09 acre of compensatory mitigation area. The major, intermediate and minor activity within



NYS-regulated adjacent areas are allowed and mitigation is not required (see Table 1 in §94-c regulations, §900-2.15(g)).

The proposed conceptual mitigation plan involves wetland creation consisting of grading the mitigation area to the adjacent wetland grade, planting native trees, and seeding of herbaceous hydrophytic species in 0.09 acre of wetland on the Project Site, most of which is currently in successional upland. These plantings will create, be contiguous with, and expand an existing area of palustrine forested/palustrine emergent (PFO) wetland (Wetland WA-3A). This mitigation area will be protected within a deed restricted area. Combined, these activities will compensate for the major activity proposed by creating a permanent wetland of equivalent (or greater) acreage through plantings and protections achieved with monitoring the growth and stabilization of the wetland. To mitigate for the activity within NYS-regulated adjacent areas, the 100-foot adjacent area of the newly created wetland will be protected and allowed to have successional growth of natural species. This will allow for a natural hydrological buffer and reduce sedimentation and pesticide runoff from agricultural areas within the vicinity.

Table 2: Wetland Mitigation Requirements

	Class III & IV U	nmapped >12.4 acres
Activity ¹	Freshwater Wetland (Acres)	Regulated Adjacent Area (100 feet) (Acres)
Major Activity		
Solar Panels	-	1.95 ³
Access Roads	0.05 ²	0.65 ³
Clearing of Forest	0.012	0.833
Power interconnections (including clearing for interconnections)	0.003	0.51 ³
Intermediate Activities		
Security fence	<0.01 ³	<0.01 ³
Other activities integral to the project involving grading	0.022	-
Clearing and Manipulation of Undisturbed Herbaceous Vegetation	-	0.643
Minor Activities		
Grading and Manipulation of Disturbed Areas (active hay/row crops; existing commercial/industrial development areas)	-	6.27³
Selective Cutting of Trees and Shrubs	-	2.02 ³
Total Mitigation Required	0.09	-

^{1.} Grading and manipulation of disturbed areas includes manipulation within the agricultural fields for placement and temporary storage of materials/equipment and general activities and foot traffic in the limit of disturbance area.



^{2.} Listed as A (M3): Allowed, mitigation required (1:1 mitigation ratio by area of impact – creation, restoration, and enhancement)

^{3.} Listed as A: Allowed; no mitigation or enhancement required.

Site Selection

Identification of the proposed compensatory mitigation area is in a preliminary stage, and subject to determining that it qualifies as an appropriate location within deed restricted land under lease or land control by the Applicant. On-site wetland mitigation was chosen as wetland mitigation banks for Niagara County are not available. There are several NYS-regulated wetlands delineated within the Project Site. The mitigation site was selected as it expands on an existing PFO wetland area of similar quality to the wetland affected by the activity. The selected wetland has similar native vegetation with limited nuisance vegetation and the influence of ground water to aid in propagation of wetland plantings. The initial mitigation area identified for this Conceptual WRMP is located in the eastern portion of the Project Site near wetlands WA-3A and WA-3B (Figure 2). Wetland WA-3A has a PFO community. Vegetation within this community includes green ash (*Fraxinus pennsylvanica*), black willow (*Salix nigra*), eastern cottonwood (*Populus deltoides*), silver maple (*Acer saccharinum*) and reed canary grass (*Phalaris arundinacea*) located adjacent to the southeastern landfill (Solid Waste Disposal Area II) and successional fields containing a mix of native and non-native forbs and shrubs. The landfill will be closed and allowed to have successional upland vegetation persist. The proposed mitigation site has been approved by the landowners and will be subject to approval by ORES as part of the Siting Permit and compliance filing process.

Preliminary Wetland Mitigation Siting

The proposed mitigation site was selected based on a lack of existing infrastructure or proposed Facility Site components as well as having similar native vegetation present and wetland quality. Wetland creation activities will include excavating the mitigation area to match adjacent wetland grade so there is adequate hydrology for the created wetland. While Wetland WA-3A is mainly sourced from overland flow of precipitation from upland areas, grading will create hydrology such that the wetland receives saturation or inundation from groundwater as well. Once an appropriate grade has been established there will be planting of tree species in approximately 0.09 acre of contiguous adjacent area of PFO wetland WA-3A and in proximity to PFO wetland WA-3B. Wetlands WA-3A and 3B and adjacent areas occupy several soils consisting of Claverack loamy fine sand, 2-6% slopes (CmA); Niagara silt loam, 0-2% slopes; and Rhinebeck silt loam, 2-6% slopes (RbA). The wetland is comprised of a variety of common northeastern hydric vegetation that should be easily obtained for plantings. Areas of this wetland that contain dominant invasive species of reed canary grass will be monitored to ensure it does not overtake and/or replace the native species used for herbaceous seeding in wetland creation area. If additional soil is needed it will be obtained from areas of similar hydric soil composition and could potentially be obtained from grading areas located within the Facility Site, that do not have invasive species present, or if feasible, soil for seeding the new wetland area could be obtained from wetland impact area of Wetland WA-5 before it is filled for construction of the access road. However, careful selection of the source of soils to be reused from excavation during construction will be considered since soil originating from areas that contain invasive species, are also likely to contain invasive species within the soil's seed bank.



Planting Plan

Wetland creation activities will include planting trees and seeding in approximately 0.09 acre of wetland contiguous with the existing area of PFO wetland. Furthermore, an appropriate seed mix containing an appropriate, wetland herbaceous species will be broadcast in the remainder of the created wetland area to establish an understory and not have loose soil established by unfavorable species and support the potential seedbank in transported wetland soils. Native tree species that are suitable to the site conditions include eastern cotton wood, green ash, and silver maple. Plantings will include whip/container trees that are 2–3 feet tall to be installed in the fall, before cold weather can limit access to the wetland. All trees will be drawn from an even distribution of the species listed above, depending on availability and quality of procurable plants. All whip plantings will be placed in an irregular manner within and immediately adjacent to the PFO planting section, to ensure a natural appearance. All plants will have deer (i.e., white-tailed deer [Odocoileus virginianus]) protection measures in place (e.g., tree tubes or cages) to support longevity.

The mitigation wetland 100-foot adjacent area will be allowed to re-establish with native vegetation. This will promote a natural buffer to protect the mitigation wetland from detrimental effects such as runoff from the surrounding impervious surfaces (i.e., former railroad line, paved roads). The use of an appropriate, native, naturalized, non-invasive upland herbaceous seed mix will be used to stimulate new growth within this adjacent area.

Monitoring

The Applicant will monitor the on-site mitigation area annually for a period of 5 years to ensure adequate survivorship of planted individuals, successful establishment of hydrophytic vegetation, and to monitor for invasive species populations. For each of the five full growing seasons following construction, the site shall be monitored by a qualified wetland specialist and a monitoring report will be submitted to ORES following each inspection. All observations will occur during the growing season, from late spring/early summer to late summer/early fall. Each monitoring report will include, at a minimum, a discussion of success to date including percent survival of planted stems, overall percent cover of native hydrophytic vegetation, and overall cover of invasive species. Reports also will include a discussion of problems that have been encountered, photographs of the site from established photo-points as well as photographs of problem areas and recommended remedial actions (if necessary). Monitoring reports will be submitted annually to ORES by December 31 of each monitoring year, following planting.

Performance Standards

A detailed evaluation of mitigation activities will be performed annually, starting the first full growing season and continuing for 5 years. The survey will assess vegetative cover of the entire mitigation area, with the following goals:



- 80% vegetative cover across all disturbed soil areas by the end of the first full growing season following construction;
- 80% or better survival rate of planted native woody species; or
- 85% or better overall coverage by native hydrophytic plant species (i.e., those with a regional indicator status of facultative, facultative wetland, or obligate wetland plants; and
- No more than 20% areal coverage of common reed (*Phragmites australis*), purple loosestrife (*Lythrum salicaria*), Japanese knotweed (*Polygonum cuspidatum*), Tartarian honeysuckle (*Lonicera tatarica*), and/or other invasive species based on invasive species baseline survey.

If these criteria are not met, additional plantings, seeding, and/or invasive species control measures will be implemented to ensure successful establishment by Year 5 of post-mitigation establishment. If the success criteria have not been met at Year 5, then additional remedial activities may be implemented, in consultation with ORES, and monitoring will continue on a yearly basis until success is achieved.

Adaptive Management Plan

An adaptive management plan including contingency and remedial responsibilities will be implemented in the event monitoring reveals that certain performance standards have not been met. In the event of deficiency, the Applicant will provide notice to ORES. This notice will include an explanation for the deficiency, proposed remedial actions, an assessment of risks, and an assessment of any adjustments that must be made to monitoring timeframes.

Due to the multitude of factors that have the potential to affect a wetland creation project, the qualified wetland scientist needs to assess the mitigation area often and react to changing conditions as the site develops. Minor remedial actions may be necessary to address small deviations. Rarely, instances arise which bring a site well outside of the defined range of its performance standards and more intensive remedial action may be required. Some potential situations the aforementioned deficiencies may include are drought, invasive species growth, wildlife foraging and activity, insect infestation and disease, and flooding. Any of these influences could cause significant deficiencies to a mitigation site.

Site Protection

The mitigation area and some adjacent sections of Wetlands WA-3A and WA-3B and adjacent areas will be placed under a deed restriction to protect the area in perpetuity. After discussions with the landowner, the mitigation area under deed restriction will be limited to 0.09 acre and a 100-foot buffer to encompass the wetland mitigation area and adjacent area. The deed restriction will be finalized upon approval of this mitigation plan by ORES.



References

United States Army Corps of Engineers (USACE). 1999. The Highway Methodology Workbook Supplemental. US Army Corps of Engineers New England Division. 39 pp. NAEEP-360-1-30a.



Figures





