# Appendix H



## WETLAND & WATERWAY DELINEATION REPORT

### SYRACUSE REGIONAL AIRPORT AUTHORITY SYRACUSE HANCOCK INTERNATIONAL AIRPORT LAND RELEASE FOR FUTURE DEVELOPMENT TOWN OF CICERO, ONONDAGA COUNTY, NEW YORK

May 2019

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#### **1.0** INTRODUCTION

An Environmental Assessment (EA) for the release of airport property at Syracuse Hancock International Airport (SYR) in Syracuse, Onondaga County, New York is being prepared for the Syracuse Regional Airport (SRAA). The EA will evaluate the environmental impacts associated with the proposed project in order to comply with Federal Aviation Administration (FAA) requirements to assess impacts associated with airport development projects. Since the proposed project will involve approvals from federal agencies, National Environmental Policy Act (NEPA) review is necessary. The FAA is the NEPA lead agency for the proposed project. C&S Engineers, Inc. (C&S) has conducted a wetland and waterways delineation as part of the EA. The Area of Interest (AOI) for delineation totals 99.1-acres and is depicted in Figure 1 – Project Location Map. The delineation is prepared consistent with the United States Army Corps of Engineers (USACE) and New York State Department of Environmental Conservation (NYSDEC) guidelines. This report includes the review of published resource materials, existing site conditions, and the results of field investigation.

#### **1.1 Project Description**

The proposed project involves the release of land currently located on SYR property for future development of a non-aeronautical related business. It is anticipated that future development on the proposed project site may include construction of multiple light manufacturing buildings and parking for approximately 300 employees. The lands proposed for release include portions of the Town of Cicero tax map number 057-02-23.0 and tax map number 057-02-22.1. A portion of the project site was previously occupied by U.S. Air Force housing units and is currently vacant. SYR intends to subdivide the parcels so that they can retain land associated with the Airport's future airside development.

#### **1.2 Project Location**

The 99.1-acre AOI is located north of the airfield, along the south side of Taft Road in the Town of Cicero, New York (See Figure 1). The site occurs within the Seneca Watershed (USGS Cataloging Unit: 04140201).

#### 2.0 METHODS

#### 2.1 Desktop Evaluation

Prior to field survey, C&S reviewed various maps and other sources of information to determine onsite areas that contain aquatic resources. These include:

- United States Geological Survey (USGS) topographic maps
- National Wetlands Inventory (NWI) Maps prepared by the U.S. Fish and Wildlife Service (USFWS)
- Freshwater Wetland Maps prepared by the NYSDEC
- Stream Classification Maps prepared by the NYSDEC



- Soil Survey Geographic Database (SSURGO) Soils Map prepared using U.S. Department of Agriculture (USDA) Natural Resources Conservation Service (NRCS) Soil Survey Geographic Database
- Federal Emergency Management Agency (FEMA) Floodplain Maps

The above references are used initially to identify areas with potential to contain wetlands and streams.

#### 2.2 Field Surveys

#### 2.2.1 Wetlands

C&S completed wetland delineations within the AOI on April 23, May 1, May 9, and May 14, 2019. During field surveys, dominant flora species, hydrologic features, and soil conditions were recorded.

Wetlands boundaries are delineated using criteria for vegetation, soils, and hydrology as specified in the 1987 Corps of Engineers Wetland Delineation Manual (USACE 1987) (hereinafter referred to as the USACE Manual) and the 2012 Regional Supplement to the Corps of Engineers Wetland Delineation Manual: Northcentral and Northeast Region, Version 2.0 (Regional Supplement) (USACE 2012). New York State regulated wetlands are mapped within the AOI, therefore the aquatic resource delineation is completed consistent with the 1995 NYSDEC Freshwater Wetlands Delineation Manual (NYSDEC 1995).

Locations of wetland delineation flags are mapped in the field using a Trimble Global Positioning System (GPS). Wetland flags/points are placed and coordinates recorded via GPS along the wetland boundaries based on observations of hydrophytic vegetation, hydric soils, and hydrology conditions. These observations are made throughout the hydrologic condition continuum to verify the wetland boundary is sufficiently identified. Each wetland is assigned a letter designation, and each wetland flag is labeled with the letter assigned to the wetland and numbered consecutively. All GPS code phase data captured in the field are post-processed (differential correction) using Trimble's Pathfinder Office software. Wetland polygons are created in Geographic Information System (GIS) shapefiles and incorporated on Project base maps for the preparation of report figures. Wetland areas are calculated using Environmental Systems Research Institute ARCGIS ARCView.

Formal wetland determination data forms are completed in the field to document justification for the wetland boundary as delineated (Appendix A). These forms are prepared consistent with the Regional Supplement, and include information pertaining to hydrology, vegetation, and soils for each wetland within the Project AOI.

Vegetation is characterized consistent with the Regional Supplement, and recorded in plots as required by the USACE. Scientific nomenclature for plant species and the indicator status for each plant species occurring within the wetland sampling plot is determined using National Wetland Plant List: 2016 Update of Wetland Ratings (Lichvar et al. 2016). Soil characteristics and hydrology data are observed and collected at test pits within the vegetative plots. The pits are excavated by hand to a depth of 20 inches below grade consistent with the USACE Manual.

The presence of hydric soil indicators is determined by describing pertinent characteristics of the soil sample. Soil colors are determined using the Munsell® soil color charts (2000 Edition, Gretag Macbeth, Division of Kollmorgen Instruments Corporation, New Windsor, New York). Hydric soil characteristics such as organic soil layers, reducing conditions, gleying, low-chroma mottles, and concretions are noted. Primary and secondary indicators of hydrology are also noted at each sample plot.

A wetland determination is made at each sample plot after characterizing vegetation, hydrology, and soil. If the vegetation, hydrology, and hydric soil criteria are met, the area is deemed a wetland. If one or more of the criteria are not met, the area is determined to be non-wetland. Completed wetland determination sheets for each representative soil pit are included in Appendix A.

Wetlands identified are further classified consistent with the *Classification of Wetlands and Deepwater Habitats of the United States* (Cowardin et al. 1979). The jurisdictional status of delineated features consistent with the 2015 Clean Water Rule as described in 40 Code of Federal Regulation Parts 110, 112, 116, et al.

#### 2.2.2 Wetland Manual Differences

The NYSDEC manual and the USACE Manual/Regional Supplement are similar with regard to identifying wetland boundaries; however there are a few significant differences. The first difference is that the NYSDEC Manual states that if an area meets certain requirements regarding prevalence of wetland vegetation, the area can be considered a wetland without detailed investigation of hydrology and soils. If the wetland vegetation requirements are not met, but more than 50 percent of the dominant species prefer wetland habitats; then an investigation and verification of hydrology and/or hydric soils is required to locate a wetland boundary. The second difference is that the Regional Supplement has established additional methods for determining the dominance of hydrophytic vegetation, additional indicators of wetland hydrology, and additional hydric soils criteria that exceed those identified in the USACE and NYSDEC Manuals. These additional indicators could result in differences of wetland boundaries. In the instance the two wetland boundaries are not consistent as a result of the differences in manuals; the discrepancy between the two will be described within the results section of this report. This summary will include a discussion of the reason for the different boundaries.

#### 2.2.3 Streams

Stream delineations were completed within and immediately adjacent the AOI. The federally regulated Ordinary High Water (OHW) mark of streams within the Project AOI are delineated using the definitional criteria as presented in Title 33, Code of Federal Regulations, Part 328, and the USACE Regulatory Guidance Letter 05-05 – Guidance on Ordinary High Water Mark Identification. Each stream is categorized in regard to its flow regime as perennial, intermittent, or ephemeral, as defined by the USACE. The OHW mark for each stream is mapped using the Trimble GPS.

Streams in the State of New York are protected by Article 15 Use and Protection of Waters. Streams are given classifications that designate the level of protection afforded to each

waterbody. Each waterbody identified within the AOI is classified according to Article 15. The waterbody classification categories are AA, A, B, C or D depending on their designated level of protection. Waters with classifications A, B, and C may also have a standard of (T), indicating that it may support a trout population, or (TS), indicating that it may support trout spawning (TS). Streams with a designation of C (T) or higher are considered "protected" waters of New York State.

Stream boundaries are mapped using Trimble GPS units with sub-meter accuracy. Stream lengths are calculated in linear feet using Environmental Systems Research Institute ARCGIS ARCView. The jurisdictional status of delineated features consistent with the 2015 Clean Water Rule.

#### 2.2.4 Ditches – Federal Jurisdiction

Ditches were delineated within and immediately adjacent the AOI. For ditches to be protected under the 2015 Clean Water Rule, they must meet the definition of a tributary, having a bed and banks, an ordinary high water mark and contribute flow directly or indirectly through another water to a traditional navigable water. However, the 2015 Clean Water Rule excludes certain ditches if specific criteria are met; the following ditch types *are not considered* waters of the US:

- Ditches with ephemeral flow that are not a relocated tributary or excavated in a tributary.
- Ditches with intermittent flow that are not a relocated tributary, excavated in a tributary, or drain wetlands.
- Ditches that do not flow, either directly or through another water, into a tidal waterway, interstate water, or territorial seas.

The federally regulated OHW mark of ditches within the AOI are delineated using the definitional criteria as presented in Title 33, Code of Federal Regulations, Part 328, 40 CFR Parts 110, 112, 116, et al. Clean Water Rule: Definition of "Waters of the United States" Final Rule and the USACE Regulatory Guidance Letter 05-05 – Guidance on Ordinary High Water Mark Identification. Ditch boundaries are mapped using Trimble GPS units with sub-meter accuracy; lengths are calculated in linear feet using Environmental Systems Research Institute ARCGIS ARCView.

#### 3.0 **RESULTS**

#### 3.1 Desktop Evaluation

Resource mapping used during the desktop review are provided in Figures 1 through 5. Figure 1 depicts the AOI on USGS topographic mapping. Figure 2 provides NYSDEC mapped resources within the AOI. Figure 3 provides NWI mapping, and Figure 4 provides soil survey information. Figure 5 depicts FEMA mapped floodplains within the vicinity of the AOI. A summary of information gathered during the desktop analysis is provided herein.

#### **3.2** Topography and Drainage

The Project site appears on both the Cicero and Syracuse East U.S. Geological Survey (USGS) 7.5-minute topographic quadrangle maps (See Figure 1). The AOI is located along Taft Road

in the Town of Cicero, Onondaga County within the USGS topographic map. Elevations range from 390 to 440 feet (North American Vertical Datum of 1988 [NAVD 88]).

#### **3.3** New York State Mapped Resources

Article 24 of the Environmental Conservation Law requires the NYSDEC to map freshwater wetlands subject to jurisdiction of the law. Article 24 Freshwater Wetland Maps show the approximate location of the wetland boundary and the unique alpha numeric wetland identification number assigned to each resource. Due to the scale of the mapping and aerial photography used to produce the wetland boundaries, they are suitable for general planning purposes only. Based on the Freshwater Wetland Maps and the field review, there is a NYSDEC mapped wetland within the AOI (See Figure 2). NYSDEC wetland SYE-2 occurs on site. No NYSDEC classified streams are mapped on site (Figure 2).

#### 3.4 National Wetlands Inventory Map

Based on the NWI map there is an NWI mapped resource within the AOI (See Figure 3). Note that NWI maps were derived from aerial photo interpretation and are suitable for general planning purposes only; they typically do not show all the wetland or watercourse resources within any given area. The wetland is labeled PFO1C. PFO1C are palustrine forested, broad-leaved deciduous, seasonally flooded wetlands.

#### 3.5 Soil Survey

Eight unique soil series are mapped within the AOI as depicted in Figure 4. Six of the eight soils contain hydric components. Table 1 provides the hydric rating, and acreage of the soils mapped on site. The hydric rating by map unit provided by the USDA NRCS Web Soil Survey is provided as Appendix B.

Soil map unit	Hydric rating	Acres of soil within AOI	Percent of soil within AOI
Cut and Fill Land	10	2.5	2.5%
Collamer silt loam	0	3.9	3.9%
Croghan loamy fine sand	0	7.6	7.6%
Lamson very fine sandy loam	90	1.8	1.8%
Made land	10	0.5	0.5%
Minoa find sandy loam	12	4.4	4.4%
Niagara silt loam	7	66.9	67.1
Palms muck	100	12.2	12.3

Table 1.	Web	Soil	<b>Summary</b>	in	the A	OI
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#### **3.6 FEMA Floodplain Map**

The FEMA floodplain map depicts a 100-year regulated floodplain area within the southeast portion of the AOI (Figure 5).

#### 3.7 Field Surveys

#### 3.7.1 Wetlands

C&S delineated eight wetlands within and immediately adjacent the AOI. The boundary of the delineated wetlands are included in Figure 6. Wetlands A, C, D, E, F, G, and H are categorized as palustrine forested (PFO) wetlands consistent with the *Classification of Wetlands and Deepwater Habitats of the United States* (Cowardin et al. 1979) (hereinafter referred to as Cowardin). Wetland B is categorized as a combination of PFO and palustrine scrub-shrub (PSS) wetland per Cowardin (Cowardin et al. 1979). The boundary of wetlands A-H within the AOI are delineated consistent with the USACE manual; wetlands A, D, E, and H are also delineated consistent with the NYSDEC Manual. Table 2 provides a summary of the wetland identified during the field investigation. Photographs of each wetland identified are provided in Appendix C.

Wetland Id	Cowardin Community Type	Agency Jurisdiction	NWI Wetland	Acreage in AOI
А	PFO	USACE N/A		2.25
В	PFO	USACE	N/A	5.30
С	PFO	USACE	N/A	0.19
D	PFO	USACE & NYSDEC	PFO1C	1.43
Е	PFO	USACE & NYSDEC	PFO1C	14.53
F	PFO	USACE	N/A	1.28
G	PFO	USACE	N/A	1.63
Н	PFO	USACE & NYSDEC	N/A	0.59
			TOTAL:	27.20

Table 2. Wetland Delineation Summary in the AOI

The PFO and PSS Cowardin classes are defined below:

**PFO-** This aquatic resource is a palustrine forested wetland. The wetland is characterized by broad-leaved deciduous woody trees and shrubs.





**PSS** – This aquatic resource is a palustrine scrub-shrub wetland. The wetland is characterized woody vegetation less than 20 feet tall. The species include true shrubs, young trees, and trees or shrubs that are small or stunted because of environmental conditions.

Below are a description of wetlands that occur within the AOI:

Wetland A (PFO): The wetland tree stratum is dominated by green ash (*Fraxinus pennsylvanica*). Shrubs noted include silky dogwood (*Cornus amomum*). Saplings of green ash were also observed in this wetland. The herbaceous stratum is dominated by Canada goldenrod (*Solidago canadensis*), and tall goldenrod (*Solidago gigantea*). Jewelweed (*Impatiens capansis*) is also noted in the herbaceous layer. Primary hydrologic indicators observed include presence of high water table, soil saturation, and oxidized rhizospheres. Secondary hydrologic indicators observed include drainage patterns and a positive FAC-neutral test. The soil hydric indicator F3 was observed and met.

Wetland B (PFO/PSS): The wetland tree stratum is dominated by red maple (*Acer rubrum*), American elm (*Ulmus americana*), and green ash. The shrub layer consists of Morrow's honeysuckle (*Lonicera morrowii*) and buckthorn (*Rhamnus cathartica*). The herbaceous stratum is dominated by poison ivy (*Toxicodendron radicans*), sensitive fern (*Onoclea sensibilis*), and tall goldenrod. Field horsetail (*Equisetum arvense*) and sedges (*Carex spp.*) were also noted. Primary hydrologic indicators observed include presence of surface water, high water table, soil saturation, and oxidized rhizospheres. Secondary hydrologic indicators observed and met.

The PSS portion of Wetland B is dominated by green ash saplings, grey dogwood (*Cornus racemosa*), and silky dogwood shrubs. Herbaceous plants noted include Canada goldenrod, grey dogwood saplings, teasel (*Cirsium vulgare*), and purple loosestrife (*Lythrum salicaria*). Primary hydrologic indicators observed include presence of high water table, and soil saturation. Secondary hydrologic indicators observed include a positive FAC-neutral test. The soil hydric indicator F3 was observed and met.

Wetland C (PFO): The wetland tree stratum is dominated by green ash, and red oak (*Quercus rubra*), and green ash. Shrubs noted include gray dogwood and Morrow's honeysuckle. Red oak saplings were also noted. The herbaceous stratum is dominated by tall goldenrod, and white avens (*Geum canadense*). Canada goldenrod was also observed. No primary hydrologic indicators were observed; secondary hydrologic indicators observed include drainage patterns and a positive FAC-neutral test. The soil hydric indicator F3 was observed and met.

**Wetland D (PFO):** The wetland tree stratum is dominated by green ash and red maple. Shrubs noted consisted of buckthorn and Morrow's honeysuckle. The herbaceous stratum is dominated by poison ivy and sedges. No primary hydrologic indicators were observed; secondary hydrologic indicators observed include drainage patterns and a positive FAC-neutral test. The soil hydric indicators F3 and A11 were observed and met.

Wetland E (PFO): The wetland tree stratum is dominated by red maple, American elm, and green ash. Green ash saplings were also observed. No herbaceous plants were observed, this is assumed to be a result of the standing water noted throughout this wetland. Primary hydrologic indicators observed include presence of surface water, high water table, soil saturation, inundation visible on aerial imagery, and water marks. Secondary hydrologic indicators observed and met.

**Wetland F (PFO):** The wetland tree stratum is dominated by red maple and green ash. Shrubs noted include buckthorn, gray dogwood and Morrow's honeysuckle. The herbaceous stratum is dominated by soft rush (*Juncus effuses*), and green bulrush (*Scirpus atrovirens*). American elm saplings were also noted. High water table, saturation, and presence of oxidized rhizospheres are the primary hydrology indicators observed. Secondary hydrologic indicators observed include drainage patterns and a positive FAC-neutral test. The soil hydric indicator F3 was observed and met.

Wetland G (PFO): The wetland tree stratum is dominated by red maple, green ash, and cottonwood (*Populus deltoides*). Shrubs noted include silky dogwood and Morrow's honeysuckle. Green ash saplings were also noted. The herbaceous stratum is dominated by jewelweed, and Allegheny blackberry (*Rubus allegheniensis*). Surface water, high water table, saturation, and presence of oxidized rhizospheres are the primary hydrology indicators observed. Secondary hydrologic indicators observed include a positive FAC-neutral test. The soil hydric indicator F3 was observed and met.

Wetland G (PFO): The wetland tree stratum is dominated by green ash. Shrubs noted include buckthorn and Morrow's honeysuckle. The herbaceous stratum is dominated by jewelweed; spotted lady's thumb (*Persicaria maculosa*), and tall goldenrod were also present. Surface water, high water table, and saturation are the primary hydrology indicators observed. Secondary hydrologic indicators observed include a positive FAC-neutral test and microtopographic relief. The soil hydric indicator F1 was observed and met.

#### 3.7.2 Streams and Open Waters

Desktop review of available materials revealed a tributary to the North Branch of Ley Creek within the AOI. The field survey resulted in two streams, stream A (unnamed tributary to the North Branch of Ley Creek) and stream C (unnamed tributary to the North Branch of Ley Creek) being located within the AOI. Table 3 provides a summary of the stream identified during the field investigation. Photographs of the streams identified are provided in Appendix C. The boundaries of the delineated streams is included in Figure 6.

Stream Id	Stream Classification	Agency Jurisdiction	NYSDEC Stream Class.	Length and Width in AOI	Acreage in AOI
А	Perennial	USACE	D	Length – 999 ft. OHWM – 15 ft. (avg.)	0.34

#### Table 3. Stream Delineation Summary in the AOI

Stream Id	Stream Classification	Agency Jurisdiction	NYSDEC Stream Class.	Length and Width in AOI	Acreage in AOI
С	Perennial	USACE	С	Length – 3,639 ft. OHWM – 17.6 ft. (avg.)	1.47
		•	TOTAL	4,638	1.81

No open water areas were delineated during the field surveys.

#### 3.7.3 Ditches

The field survey resulted in seven ditches located within the AOI. Table 4 provides a summary of each. Photographs of the ditches identified are provided in Appendix C. The boundaries of the delineated ditches are included in Figure 6.

Ditch Id	Waters of the US Classification	Agency Jurisdiction	Average Width in AOI (ft)	Length in AOI (ft)	Acreage in AOI	
٨	b(3)	None	7 0	389	0.00	
A	a(6)	USACE	1.0	136	0.09	
р	b(3)	None	17.2	235	0.12	
В	a(6)	USACE	17.5	106	0.13	
B2	b(3)	None	12.3	784	0.22	
С	b(3)	None	5.8	1,139	0.15	
C2	b(3)	None	8.4	1,505	0.29	
C3	b(3)	None	3.8	626	0.05	
C4	b(3)	None	14.97	259	0.09	
			TOTAL	5,179	1.02	

Table 4. Ditch Delineation Summary in the AOI

#### 4.0 CONCLUSION

C&S was retained by the Syracuse Regional Airport Authority to complete a wetland and waterway survey for the proposed Land Release for a future development project. Wetlands were assessed as waters of the U.S. subject to USACE jurisdiction, and as freshwater wetlands subject to NYSDEC regulation. These features are also classified consistent with the *Classification of Wetlands and Deepwater Habitats of the United States* (Cowardin et al. 1979).

Eight wetlands within the Seneca Watershed (USGS Cataloging Unit: 04140201) were delineated by C&S within and immediately adjacent the AOI. The wetlands include a PFO/PSS wetland totaling 5.3 acres, and seven PFO wetlands totaling 21.9 acres. These wetlands are potentially regulated waters of the United States afforded protection under Section 404 of the Clean Water Act. The wetlands described herein satisfy the criteria to be a wetland pursuant to the Army Corps of Engineers' 1987 Manual (and Regional Supplement) with subsequent clarification memoranda and pursuant to confirmation by the USACE. Wetlands D, E, and H

are also subject to jurisdiction by the NYSDEC under Article 24 of the Freshwater Wetlands Act. The determination of regulatory status is dependent upon confirmation by both the USACE and NYSDEC.

Two streams were delineated within the AOI; Stream C is a perennial stream whereas Stream A is intermittent. The streams total 4,638 linear feet, and are subject to jurisdiction by the USACE under Section 404 of the Clean Water Act. Stream A is classified by NYSDEC as a Class D stream; Stream C is designated as a Class C with Class C water quality standards. Neither stream is considered protected under Article 15 Use and Protection of Waters.

Seven ditches were delineated within the AOI. The ditches total 5,179 linear feet and are subject to jurisdiction by the USACE under Section 404 of the Clean Water Act. In our opinion, on site ditches are not considered waters of the United States consistent with the 2015 Clean Water Rule and pursuant to confirmation by the USACE. The ditches are not protected under Article 15 Use and Protection of Waters.

No open waters were identified during the field surveys.

#### 5.0 LITERATURE CITED

- Cowardin, L. M., V. Carter, F. C. Golet, and E. T. LaRoe. 1979. Classification of wetlands and deepwater habitats of the United States. U. S. Department of the Interior, Fish and Wildlife Service, Washington, D.C. (available at: Northern Prairie Wildlife Research Center, Jamestown, North Dakota website http://www.npwrc.usgs.gov/resource/1998/classwet/classwet.htm).
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- USACE. 2012. Regional Supplement to the Corps of Engineers Wetland Delineation Manual: Northcentral and Northeast Region, ERDC/EL TR-12-1 (Version 2.0). U.S. Army Engineer Research and Development Center, Vicksburg, Mississippi.

#### APPENDIX A USACE WETLAND DATA FORMS

#### WETLAND DETERMINATION DATA FORM – Northcentral and Northeast Region

Project/Site: Land Release for Future Development	ent City/County: Cicero/Onondaga Sampling Date:			
Applicant/Owner: Syracuse Regional Airport A	Authority State: NY Sampling Point: A			
Investigator(s): Bayer, Bryan	Section, Township, Range:			
Landform (hillside, terrace, etc.): Terrace	Local re	elief (concave, convex, none): <u>None</u>	Slope %: 1-3	
Subregion (LRR or MLRA): LRR L	Lat: 43° 7' 18.06"	Long: <u>76° 5' 3.77"</u>	Datum: WGS 84	
Soil Map Unit Name: Croghan fine sandy loam		NWI classifica	ation:	
Are climatic / hydrologic conditions on the site typic	al for this time of year?	Yes <u>X</u> No(If	no, explain in Remarks.)	
Are Vegetation, Soil, or Hydrology	significantly disturb	ed? Are "Normal Circumstances"	present? Yes X No	
Are Vegetation, Soil, or Hydrology	naturally problemat	ic? (If needed, explain any answe	ers in Remarks.)	
SUMMARY OF FINDINGS – Attach site	map showing samp	bling point locations, transects	s, important features, etc.	
Hydrophytic Vegetation Present? Yes	No X	Is the Sampled Area		

Hydric Soil Present? Wetland Hydrology Present?	Yes Yes		within a Wetland?     Yes     No     X       If yes, optional Wetland Site ID:
Remarks: (Explain alternative procedu	res here or in a	separate report.)	

#### HYDROLOGY

Wetland Hydrology Indicators:			Secondary Indicators (minimum of two required)
Primary Indicators (minimum of one is requi	red; check all that apply)		Surface Soil Cracks (B6)
Surface Water (A1)	Water-Stained Leaves (B9)		Drainage Patterns (B10)
High Water Table (A2)	Aquatic Fauna (B13)		Moss Trim Lines (B16)
Saturation (A3)	Marl Deposits (B15)		Dry-Season Water Table (C2)
Water Marks (B1)	Hydrogen Sulfide Odor (C1)		Crayfish Burrows (C8)
Sediment Deposits (B2)	Oxidized Rhizospheres on Living Ro	oots (C3)	Saturation Visible on Aerial Imagery (C9)
Drift Deposits (B3)	Presence of Reduced Iron (C4)		Stunted or Stressed Plants (D1)
Algal Mat or Crust (B4)	Recent Iron Reduction in Tilled Soil	s (C6)	Geomorphic Position (D2)
Iron Deposits (B5)	Thin Muck Surface (C7)		Shallow Aquitard (D3)
Inundation Visible on Aerial Imagery (B	7) Other (Explain in Remarks)		Microtopographic Relief (D4)
Sparsely Vegetated Concave Surface (I	38)		FAC-Neutral Test (D5)
Field Observations:			
Surface Water Present? Yes	No X Depth (inches):		
Water Table Present? Yes	No X Depth (inches):		
Saturation Present? Yes	No X Depth (inches):	Wetlan	hd Hydrology Present? Yes <u>No X</u>
(includes capillary fringe)			
Describe Recorded Data (stream gauge, mo	onitoring well, aerial photos, previous inspe	ctions), if	available:
Remarks:			

#### **VEGETATION** – Use scientific names of plants.

Sampling Point: A-U

Tree Stratum (Plot size: 30 )	Absolute % Cover	Dominant Species?	Indicator Status	Dominance Test worksheet:					
1.       2.				Number of Dominant Species That Are OBL, FACW, or FAC:2 (A)					
3 4				Total Number of Dominant Species Across All Strata: <u>4</u> (B)					
5 6				Percent of Dominant Species That Are OBL, FACW, or FAC: <u>50.0%</u> (A/B)					
7				Prevalence Index worksheet:					
		=Total Cover		Total % Cover of: Multiply by:					
Sapling/Shrub Stratum (Plot size: 15 )				OBL species 0 x 1 = 0					
1. Quercus rubra	5	No	FACU	FACW species 15 x 2 = 30					
2. Fraxinus pennsylvanica	15	Yes	FACW	FAC species 15 x 3 = 45					
3. Rhamnus cathartica	15	Yes	FAC	FACU species95 x 4 =380					
4				UPL species x 5 =0					
5				Column Totals: 125 (A) 455 (B)					
6.				Prevalence Index = B/A = 3.64					
7				Hydrophytic Vegetation Indicators:					
	35	=Total Cover		1 - Rapid Test for Hydrophytic Vegetation					
Herb Stratum (Plot size: 5 )				2 - Dominance Test is >50%					
1. Rubus allegheniensis	30	Yes	FACU	3 - Prevalence Index is ≤3.0 <sup>1</sup>					
2. Solidago canadensis	10	No	FACU	4 - Morphological Adaptations <sup>1</sup> (Provide supporting					
3. Poa pratensis	50	Yes	FACU	data in Remarks or on a separate sheet)					
4				Problematic Hydrophytic Vegetation <sup>1</sup> (Explain)					
5				<sup>1</sup> Indicators of hydric soil and wetland hydrology must					
6				be present, unless disturbed or problematic.					
7.				Definitions of Vegetation Strata:					
8 9				<b>Tree</b> – Woody plants 3 in. (7.6 cm) or more in diameter at breast height (DBH), regardless of height.					
10 11				<b>Sapling/shrub</b> – Woody plants less than 3 in. DBH and greater than or equal to 3.28 ft (1 m) tall.					
12	90	=Total Cover		<b>Herb</b> – All herbaceous (non-woody) plants, regardless of size, and woody plants less than 3.28 ft tall.					
Woody Vine Stratum         (Plot size:)           1.				<b>Woody vines</b> – All woody vines greater than 3.28 ft in height.					
23.				Hydrophytic					
4.				Present? Yes No X					
		=Total Cover							
Remarks: (Include photo numbers here or on a sepa	arate sheet.)								
-									

Profile Desc	cription: (Describe	to the dept	th needed to docu	ument t	he indica	tor or co	onfirm the ab	sence of indic	ators.)	
Depth	Matrix		Redo	Redox Features						
(inches)	Color (moist)	%	Color (moist)	%	Type'	Loc <sup>2</sup>	Texture	·	Remarks	
0-18	10YR 3/2	100					Loamy/Cla	yey		
								<u> </u>		
1										
'Type: C=C	oncentration, D=Depl	etion, RM=	Reduced Matrix, N	/IS=Mas	ked Sand	Grains.	<sup>2</sup> Loc	ation: PL=Pore	e Lining, M=M	atrix.
Hydric Soil	Indicators:						Indi	cators for Prob	plematic Hyd	ric Soils':
Histosol	(A1)	_	Polyvalue Belo	w Surfa	ce (S8) (I	LRR R,		2 cm Muck (A1	0) ( <b>LRR K, L,</b>	MLRA 149B)
Histic Ep	pipedon (A2)		MLRA 149B	5)				Coast Prairie R	edox (A16) (L	RR K, L, R)
Black Hi	stic (A3)	_	Thin Dark Surf	ace (S9	) (LRR R	, MLRA 1	149B)	5 cm Mucky Pe	at or Peat (S3	B) (LRR K, L, R)
Hydroge	en Sulfide (A4)	_	High Chroma S	Sands (S	611) ( <b>LRF</b>	R K, L)		Polyvalue Belov	w Surface (S8	) (LRR K, L)
Stratified	d Layers (A5)	_	Loamy Mucky	Mineral	(F1) ( <b>LRI</b>	R K, L)		Thin Dark Surfa	ace (S9) (LRR	<b>K, L</b> )
Depleted	d Below Dark Surface	e (A11)	Loamy Gleyed	Matrix (	(F2)			Iron-Manganes	e Masses (F1	2) ( <b>LRR K, L, R</b>
Thick Da	ark Surface (A12)	_	Depleted Matri	x (F3)				Piedmont Flood	lplain Soils (F	19) ( <b>MLRA 149</b>
Sandy M	lucky Mineral (S1)	_	Redox Dark Su	urface (F	-6)			Mesic Spodic (	TA6) ( <b>MLRA</b> 1	44A, 145, 149E
Sandy G	Bleyed Matrix (S4)	_	Depleted Dark	Surface	e (F7)			Red Parent Ma	terial (F21)	
Sandy Redox (S5) Redox Depressions (F8			8)		Very Shallow Dark Surface (F22)					
Stripped Matrix (S6) Marl (F10) (LRR K, L)							Other (Explain i	in Remarks)		
Dark Su	rface (S7)									
<sup>3</sup> Indicators o	f hydrophytic vegetat	ion and we	tland hydrology mι	ust be pi	resent, ur	nless dist	urbed or prob	ematic.		
Restrictive	Layer (if observed):									
Type:										
Depth (ir	nches):						Hydric So	il Present?	Yes	No X
Pomarke:										
This data for	m is revised from No	rthcentral a	and Northeast Reg	ional Su	Innlemen	t Version	2.0 to include	the NRCS Fiel	d Indicators o	f Hydric Soils
Version 7.0,	2015 Errata. (http://w	/ww.nrcs.us	sda.gov/Internet/F	SE_DO	CUMENT	S/nrcs14	2p2_051293.c	locx)		
			-							
Project/Site: Land R	elease for Future Deve	lopment	City/County: Cicero/	Onondaga		Sampling Date: <u>N</u>	<i>I</i> lay 9, 2019			
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Applicant/Owner:	Syracuse Regional Air	rport Authority		State:	NY	Sampling Point:	A-W			
Investigator(s): Baye	r, Bryan		Section, To	wnship, Range:						
Landform (hillside, ter	race, etc.): Depressi	on Loc	al relief (concave, conve:	x, none): <u>Conca</u>	/e	Slope '	%: <u>1-3</u>			
Subregion (LRR or M	LRA): LRR L	Lat: 43° 7' 17.79"	Long:	76° 5' 3.96"		Datum: V	NGS 84			
Soil Map Unit Name:	Croghan loamy fine sa	and		NWI classif	ication:					
Are climatic / hydrolog	jic conditions on the sit	e typical for this time of year	? Yes X	No	(If no, e	explain in Remarks.	.)			
Are Vegetation	, Soil , or Hydr	ology significantly dis	turbed? Are "Norn	nal Circumstance	es" pres	ent? Yes X	No			
Are Vegetation	, Soil , or Hydr	ology naturally proble	matic? (If needed	វ, explain any an៖	swers ir	Remarks.)				
SUMMARY OF F	INDINGS – Attach	site map showing sa	mpling point locat	ions, transec	ts, im	portant feature	es, etc.			
Hydrophytic Vegetat	ion Present?	Yes X No	Is the Sampled A	rea						
Hydric Soil Present?		Yes X No	within a Wetland	? Yes	Х	No				
Wetland Hydrology	resent?	Yes X No	If yes, optional We	tland Site ID:						
Remarks: (Explain a	iternative procedures n	ere or in a separate report.)								
HYDROLOGY										
Wetland Hydrology	Indicators:			Secondary Indic	cators (r	ninimum of two req	<u>uired)</u>			
Primary Indicators (r	ninimum of one is requi	red; check all that apply)		Surface Soi	il Crack	s (B6)				
Surface Water (	41)	Water-Stained Leaves	s (B9)	X Drainage Pa	atterns	(B10)				
X High Water Tab	e (A2)	Aquatic Fauna (B13)		Moss Trim I	Lines (E	316)				
X Saturation (A3)		Marl Deposits (B15)		Dry-Season	ı Water	Table (C2)				
Water Marks (B	1)	Hydrogen Sulfide Odd	or (C1)	Crayfish Bu	rrows (0	C8)				
Sediment Depos	sits (B2)	X Oxidized Rhizosphere	es on Living Roots (C3)	Saturation \	√isible c	on Aerial Imagery (C	C9)			
Drift Deposits (B	3)	Presence of Reduced	I Iron (C4)	Stunted or St	Stresse	d Plants (D1)				

Water Marks (B1)			I	Hydro	gen Sulfide Odor (C1	)		Crayfish Burrows (C8	3)		
Sediment Deposits (B2)			X	Oxidiz	ed Rhizospheres on	Saturation Visible on	Visible on Aerial Imagery (C9)				
Drift Deposits (B3)				Presence of Reduced Iron (C4) Stunted or Stressed Pla							
Algal Mat or Crust (B4)				Recer	nt Iron Reduction in T	illed Soils	s (C6)	Geomorphic Position	(D2)		
Iron Deposits (B5)				Thin N	/luck Surface (C7)			Shallow Aquitard (D3	3)		
Inundation Visible on A	erial Ima	agery (E	B7) 0	Other	(Explain in Remarks)	)		Microtopographic Re	lief (D4)		
Sparsely Vegetated Cor	ncave S	Surface	(B8)					X FAC-Neutral Test (D	5)		
Field Observations:											
Surface Water Present?	Yes		No	Х	Depth (inches):	0					
Water Table Present?	Yes	Х	No		Depth (inches):	10					
Saturation Present?	Yes	Х	No		Depth (inches):	8	Wetland	d Hydrology Present?	Yes	X No	
(includes capillary fringe)											
(includes capillary fringe) Describe Recorded Data (st	ream ga	auge, n	nonitorin	g well	, aerial photos, previo	ous inspe	ctions), if a	vailable:			
(includes capillary fringe) Describe Recorded Data (st	ream ga	auge, n	nonitorin	g well	, aerial photos, previo	ous inspe	ctions), if a	vailable:			
(includes capillary fringe) Describe Recorded Data (st	ream ga	auge, n	nonitorin	g well	, aerial photos, previo	ous inspe	ctions), if a	vailable:			
(includes capillary fringe) Describe Recorded Data (st Remarks:	ream ga	auge, n	nonitorin	g well	, aerial photos, previo	ous inspe	ctions), if a	vailable:			
(includes capillary fringe) Describe Recorded Data (st Remarks:	ream ga	auge, n	nonitorin	g well	, aerial photos, previo	ous inspe	ctions), if a	wailable:			
(includes capillary fringe) Describe Recorded Data (st Remarks:	ream ga	auge, n	nonitorin	g well	, aerial photos, previo	ous inspe	ctions), if a	vailable:			
(includes capillary fringe) Describe Recorded Data (st Remarks:	ream ga	auge, n	nonitorin	g well	, aerial photos, previo	ous inspe	ctions), if a	vailable:			
(includes capillary fringe) Describe Recorded Data (st Remarks:	ream ga	auge, n	nonitorin	g well	, aerial photos, previo	pus inspe	ctions), if a	wailable:			
(includes capillary fringe) Describe Recorded Data (st Remarks:	ream ga	auge, n	nonitorin	g well	, aerial photos, previo	pus inspe	ctions), if a	wailable:			
(includes capillary fringe) Describe Recorded Data (st Remarks:	ream ga	auge, n	nonitorin	g well	, aerial photos, previo	pus inspe	ctions), if a	wailable:			
(includes capillary fringe) Describe Recorded Data (st Remarks:	ream ga	auge, n	nonitorin	g well	, aerial photos, previo	pus inspe	ctions), if a	wailable:			

Sampling Point: A-W

Tree Stratum (Plot size: 30 )	Absolute % Cover	Dominant Species?	Indicator Status	Dominance Test worksheet:
1. Fraxinus pennsvlvanica	25	Yes	FACW	
2				Number of Dominant Species That Are OBL_EACW, or EAC: 4 (A)
3				
4				Total Number of Dominant Species Across All Strata: 5 (B)
5.				()
6.				Percent of Dominant Species That Are OBL, FACW, or FAC: 80.0% (A/B)
7.				Prevalence Index worksheet:
	25	=Total Cover		Total % Cover of: Multiply by:
Sapling/Shrub Stratum (Plot size: 15 )				OBL species         20         x 1 =         20
1. Fraxinus pennsylvanica	30	Yes	FACW	FACW species 87 x 2 = 174
2. Cornus amomum	30	Yes	FACW	FAC species 0 x 3 = 0
3				FACU species 20 x 4 = 80
4				UPL species x 5 = 0
5				Column Totals: 127 (A) 274 (B)
6				Prevalence Index = B/A = 2.16
7				Hydrophytic Vegetation Indicators:
	60	=Total Cover		1 - Rapid Test for Hydrophytic Vegetation
Herb Stratum (Plot size: 5 )				X 2 - Dominance Test is >50%
1. Solidago canadensis	20	Yes	FACU	X _3 - Prevalence Index is $\leq 3.0^1$
2. Solidago gigantea	20	Yes	OBL	4 - Morphological Adaptations <sup>1</sup> (Provide supporting
3. Impatiens capensis	2	No	FACW	data in Remarks or on a separate sheet)
4				Problematic Hydrophytic Vegetation <sup>1</sup> (Explain)
5				<sup>1</sup> Indicators of hydric soil and wetland hydrology must
6				be present, unless disturbed or problematic.
7				Definitions of Vegetation Strata:
8				Tree – Woody plants 3 in. (7.6 cm) or more in
9				diameter at breast height (DBH), regardless of height.
10				Sapling/shrub – Woody plants less than 3 in. DBH
11				and greater than or equal to 3.28 ft (1 m) tall.
12				Herb – All herbaceous (non-woody) plants, regardless
	42	=Total Cover		of size, and woody plants less than 3.28 ft tall.
Woody Vine Stratum (Plot size:)				Woody vines – All woody vines greater than 3.28 ft in
1				height.
2				Hydrophytic
3				Vegetation
4				Present? Yes <u>X</u> No
		=Total Cover		
Remarks: (Include photo numbers here or on a sepa	arate sheet.)			

# SOIL

Profile Des	cription: (Describe	to the de	pth needed to docu	ument th	ne indica	ator or c	onfirm the absence o	f indicators.)
Depth	Matrix		Redo	x Featur	es			
(inches)	Color (moist)	%	Color (moist)	%	Type <sup>1</sup>	Loc <sup>2</sup>	Texture	Remarks
0-8	10YR 4/2	95	7.5YR 4/6	5	С	PL	Loamy/Clayey	Prominent redox concentrations
8-18	10YR 4/2	90	7.5YR 4/6	10	C	M	Loamy/Clayey	Prominent redox concentrations
							·	
	oncontration D-Don	otion PA					<sup>2</sup> Location: P	I – Poro Lining M-Motrix
Hydric Soil	Indicators:			10=111851	keu Sand	i Grains.	Indicators f	or Problematic Hydric Soils <sup>3</sup>
Histosol Histic E Black H Hydroge Stratifier Depleter Thick D Sandy N Sandy R Sandy F Stripped Dark Su	(A1) pipedon (A2) istic (A3) en Sulfide (A4) d Layers (A5) d Below Dark Surface ark Surface (A12) Mucky Mineral (S1) Gleyed Matrix (S4) Redox (S5) I Matrix (S6) rface (S7) f hydrophytic vegetat	e (A11) ion and w	Polyvalue Belo MLRA 149B Thin Dark Surf High Chroma S Loamy Mucky Loamy Gleyed X Depleted Matri Redox Dark Su Depleted Dark Redox Depress Marl (F10) (LR	w Surface (S9) Sands (S Mineral ( Matrix (I (K (F3)) urface (F Surface Sions (F8 (R K, L)) ust be pr	ce (S8) ( (LRR R (11) (LRI (F1) (LRI (F1) (LRI (F2) (6) (F7) 3) esent, ui	LRR R, , MLRA <sup>,</sup> R K, L) R K, L)	149B) 2 cm Mu Coast Pi 5 cm Mu Polyvalu Thin Dar Iron-Mar Mesic S Red Par Very Sha Other (E	ack (A10) ( <b>LRR K, L, MLRA 149B</b> ) rairie Redox (A16) ( <b>LRR K, L, R</b> ) acky Peat or Peat (S3) ( <b>LRR K, L, R</b> ) the Below Surface (S8) ( <b>LRR K, L</b> ) rk Surface (S9) ( <b>LRR K, L</b> ) rk Surface (S9) ( <b>LRR K, L</b> ) nganese Masses (F12) ( <b>LRR K, L, R</b> ) not Floodplain Soils (F19) ( <b>MLRA 149B</b> ) podic (TA6) ( <b>MLRA 144A, 145, 149B</b> ) ent Material (F21) allow Dark Surface (F22) explain in Remarks)
Restrictive	Layer (if observed):							
Type: Depth (i	nches):						Hydric Soil Prese	nt? Yes_X_No
Remarks: This data for Version 7.0,	rm is revised from No 2015 Errata. (http://w	rthcentra /ww.nrcs.	l and Northeast Reg usda.gov/Internet/F	ional Su SE_DOC	pplemen CUMENT	t Version S/nrcs14	L 2.0 to include the NR( 22p2_051293.docx)	CS Field Indicators of Hydric Soils,

Project/Site: Land F	Release for Fu	uture Developmer	nt	City	/County: Cicero/	Onondaga		Sampling Date:	May 9, 2019
Applicant/Owner:	Syracuse R	egional Airport A	uthorit	ty		State:	NY	Sampling Point:	B-U
Investigator(s): Baye	ər, Bryan				Section, Tov	wnship, Range:			
Landform (hillside, te	rrace, etc.):	Terrace		Local relief	(concave, conve	x, none): None		Slope	%: <u>1-3</u>
Subregion (LRR or M	LRA): LRR	L	Lat:	43° 7' 32.39"	Long:	76° 5' 16.85"		Datum:	WGS 84
Soil Map Unit Name:	Niagara silt	loam				NWI classi	fication:	: 	
Are climatic / hydrolo	gic conditions	on the site typic	al for t	this time of year?	Yes X	No	(If no,	explain in Remarks	)
Are Vegetation	, Soil	, or Hydrology		significantly disturbed?	Are "Norm	nal Circumstance	es" pres	ent? Yes X	No
Are Vegetation	, Soil	, or Hydrology		naturally problematic?	(If needed	۱, explain any an	iswers ir	n Remarks.)	
SUMMARY OF F	INDINGS -	- Attach site	map	showing samplin	g point locat	ions, transe	cts, in	nportant featur	es, etc.

Hydrophytic Vegetation Present?	Yes	No X	Is the Sampled Area
Hydric Soil Present?	Yes	No X	within a Wetland? Yes No X
Wetland Hydrology Present?	Yes	No X	If yes, optional Wetland Site ID:
Remarks: (Explain alternative procedures	here or in a s	separate report.)	

Wetland Hydrology Indicators:		Secondary Indicators (minimum of two required)
Primary Indicators (minimum of one is r	equired; check all that apply)	Surface Soil Cracks (B6)
Surface Water (A1)	Water-Stained Leaves (B9)	Drainage Patterns (B10)
High Water Table (A2)	Aquatic Fauna (B13)	Moss Trim Lines (B16)
Saturation (A3)	Marl Deposits (B15)	Dry-Season Water Table (C2)
Water Marks (B1)	Hydrogen Sulfide Odor (C1)	Crayfish Burrows (C8)
Sediment Deposits (B2)	Oxidized Rhizospheres on Living Ro	oots (C3) Saturation Visible on Aerial Imagery (C9)
Drift Deposits (B3)	Presence of Reduced Iron (C4)	Stunted or Stressed Plants (D1)
Algal Mat or Crust (B4)	Recent Iron Reduction in Tilled Soils	s (C6) Geomorphic Position (D2)
Iron Deposits (B5)	Thin Muck Surface (C7)	Shallow Aquitard (D3)
Inundation Visible on Aerial Imager	y (B7) Other (Explain in Remarks)	Microtopographic Relief (D4)
Sparsely Vegetated Concave Surfa	ce (B8)	FAC-Neutral Test (D5)
Field Observations:		
Surface Water Present? Yes	No X Depth (inches):	
Water Table Present? Yes	No X Depth (inches):	
Saturation Present? Yes	No X Depth (inches):	Wetland Hydrology Present? Yes No X
(includes capillary fringe)		
Describe Recorded Data (stream gauge	e, monitoring well, aerial photos, previous inspec	ections), if available:
Remarks:		

Sampling Point: B-U

Tree Stratum (Plot size: 30 )	Absolute % Cover	Dominant Species?	Indicator Status	Dominance Test worksheet:
1.       2.				Number of Dominant Species That Are OBL, FACW, or FAC:0 (A)
3				Total Number of Dominant Species Across All Strata: 1 (B)
5.           6.				Percent of Dominant Species That Are OBL, FACW, or FAC:(A/B)
7				Prevalence Index worksheet:
		=Total Cover		Total % Cover of: Multiply by:
Sapling/Shrub Stratum (Plot size: 15 )				OBL species 0 x 1 = 0
1.				FACW species 0 x 2 = 0
2.				FAC species $0   x 3 = 0$
3.				FACU species 90 x 4 = $360$
4.				UPL species $0 \times 5 = 0$
5.				Column Totals: 90 (A) 360 (B)
6.				Prevalence Index = $B/A = 4.00$
7.				Hydrophytic Vegetation Indicators:
		=Total Cover		1 - Rapid Test for Hydrophytic Vegetation
Herb Stratum (Plot size: 5)	·			2 - Dominance Test is >50%
1 Solidado canadensis	90	Ves	FACU	$3 - $ Prevalence Index is $< 3.0^{1}$
2		100	17100	4 - Morphological Adaptations <sup>1</sup> (Provide supporting
2				data in Remarks or on a separate sheet)
	·			Problematic Hydrophytic Vegetation <sup>1</sup> (Evaluin)
4			·	
5				<sup>1</sup> Indicators of hydric soil and wetland hydrology must
6				be present, unless disturbed or problematic.
/				Definitions of Vegetation Strata:
8 9				<b>Tree</b> – Woody plants 3 in. (7.6 cm) or more in diameter at breast height (DBH), regardless of height.
10				<b>Sapling/shrub</b> – Woody plants less than 3 in. DBH and greater than or equal to 3.28 ft (1 m) tall.
12	·			
	90	=Total Cover		<b>Herb</b> – All herbaceous (non-woody) plants, regardless of size, and woody plants less than 3.28 ft tall.
Woody Vine Stratum         (Plot size:)           1.        )				<b>Woody vines</b> – All woody vines greater than 3.28 ft in height.
2.				
3.				Hydrophytic
4.				Present? Yes No X
		=Total Cover		
Remarks: (Include photo numbers here or on a sepa	arate sheet.)			

Profile Desc	ription: (Describe	to the de	pth needed to doc	ument ti	he indica	ator or co	onfirm the absence of	indicators.)
Depth	Matrix		Redo	x Featur	es			
(inches)	Color (moist)	%	Color (moist)	%	Type <sup>1</sup>	Loc <sup>2</sup>	Texture	Remarks
0-14	10YR 3/3	100					Loamy/Clayey	
14-18	10YR 5/3	90	10YR 5/8	10	<u> </u>	M	Loamy/Clayey	Prominent redox concentrations
<sup>1</sup> Type: C=Co	oncentration, D=Depl	etion, RM	1=Reduced Matrix, N	/IS=Mas	ked Sand	d Grains.	<sup>2</sup> Location: Pl	L=Pore Lining, M=Matrix.
Hydric Soil I Histosol	ndicators: (A1)		Polyvalue Belo	w Surfa	ce (S8) (	LRR R,	Indicators fo 2 cm Mu	or Problematic Hydric Soils <sup>3</sup> : ck (A10) (LRR K, L, MLRA 149B)
Histic Ep	ipedon (A2)		MLRA 149B	)			Coast Pr	airie Redox (A16) ( <b>LRR K, L, R</b> )
Black His	stic (A3)		Thin Dark Surf	, ace (S9)	) (LRR R	, MLRA 1	149B) 5 cm Mu	cky Peat or Peat (S3) (LRR K, L, R)
Hvdroae	n Sulfide (A4)		High Chroma	Sands (S	511) ( <b>LRF</b>	, R K. L)	, Polvvalue	e Below Surface (S8) (LRR K. L)
Stratified	Lavers (A5)		Loamy Mucky	Mineral	(F1) (LRI	R K. L)	Thin Darl	k Surface (S9) (L <b>RR K</b> . L)
Depleter	Below Dark Surface	(A11)	Loamy Gleved	Matrix (	(· · / (=···	, _/	Iron-Man	ganese Masses (F12) (I RR K, I , R)
Thick Da	rk Surface (A12)	,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,	Depleted Matri	v (E3)	)		Riedmon	t Eloodolain Soils (E10) ( <b>MI BA 149B</b> )
Finick Da	ucky Minoral (S1)		Bodov Dork Si	x (1 0) urfaco (E	(C)		Mosio Sr	adia (TAG) (ML BA 144A 145 140B)
Sandy M	loved Matrix (S1)		Neuox Dark St					
Sanuy G				Sunace	( <i>Г1</i> )			Have Dark Over(and (F21)
Sandy R	edox (S5)		Redox Depres		8)		Very Sha	allow Dark Surface (F22)
Stripped	Matrix (S6)		Marl (F10) ( <b>LR</b>	R K, L)			Other (E)	xplain in Remarks)
Dark Sur	face (S7)							
<sup>3</sup> Indicators of	hydrophytic vegetat	ion and w	etland hydrology mu	ust be pr	resent, ur	nless dist	urbed or problematic.	
Type:	ayer (il observed).							
Depth (ir	iches):						Hydric Soil Presen	nt? Yes No X
Remarks:								
This data for	m is revised from No	rthcentra	l and Northeast Reg	ional Su	pplemen	t Version	2.0 to include the NRC	CS Field Indicators of Hydric Soils,
Version 7.0,	2015 Errata. (http://w	/ww.nrcs.	usda.gov/Internet/F	SE_DOC	CUMENT	S/nrcs14	2p2_051293.docx)	

Project/Site: Land Re	elease for Fi	uture Developmer	nt		City/County: Cicero/	Onondaga		Sampling Date:	May 9, 2019
Applicant/Owner:	Syracuse R	egional Airport A	uthori	ity		Stat	e: NY	Sampling Poir	nt: B-W
Investigator(s): Bayer	, Bryan				Section, To	wnship, Range	e:		
Landform (hillside, terr	ace, etc.):	Depression		Local re	elief (concave, conve	ex, none): <u>Con</u>	cave	Slop	e %: <u>1-3</u>
Subregion (LRR or ML	.RA): <u>LRR</u>	. L	Lat:	43° 7' 31.41"	Long:	76° 5' 17"		Datum:	WGS 84
Soil Map Unit Name:	Niagara silt	loam				NWI clas	sification	ו:	
Are climatic / hydrolog	ic conditions	s on the site typica	al for	this time of year?	Yes X	No	(If no,	, explain in Remarl	ks.)
Are Vegetation	, Soil	, or Hydrology		significantly disturb	ed? Are "Norm	nal Circumsta	nces" pre	sent? Yes X	No
Are Vegetation	, Soil	, or Hydrology		naturally problemat	ic? (If needed	d, explain any	answers	in Remarks.)	
SUMMARY OF FI	NDINGS	- Attach site	maŗ	showing samp	bling point locat	tions, trans	ects, ir	mportant featu	ures, etc.
Hydrophytic Vegetation	on Present?	Yes	x	No	Is the Sampled A	rea			
Hydric Soil Present?		Yes	Х	No	within a Wetland	? Y	es_X	No	
Wetland Hydrology P	resent?	Yes	Х	No	If yes, optional We	etland Site ID:			
Remarks: (Explain a	Iternative pro	ocedures here or	in a s	eparate report.)					
									ļ

Wetland Hydrology Indicators:			Secondary Indicators (minimum of two required)			
Primary Indicators (minimum of one is requ	uired; check all that apply)		Surface Soil Cracks (B6)			
X Surface Water (A1)	Water-Stained Leaves (B9)		Drainage Patterns (B10)			
X High Water Table (A2)	Aquatic Fauna (B13)		Moss Trim Lines (B16)			
X Saturation (A3)	Marl Deposits (B15)		Dry-Season Water Table (C2)			
Water Marks (B1)	Hydrogen Sulfide Odor (C1)	Crayfish Burrows (C8)				
Sediment Deposits (B2)	X Oxidized Rhizospheres on Living Re	oots (C3)	Saturation Visible on Aerial Imagery (C9)			
Drift Deposits (B3)	Presence of Reduced Iron (C4)	Presence of Reduced Iron (C4) Stunted or Stressed				
Algal Mat or Crust (B4)	Recent Iron Reduction in Tilled Soil	s (C6)	Geomorphic Position (D2)			
Iron Deposits (B5)	Thin Muck Surface (C7)		Shallow Aquitard (D3)			
Inundation Visible on Aerial Imagery (I	Inundation Visible on Aerial Imagery (B7) Other (Explain in Remarks)					
Sparsely Vegetated Concave Surface	Sparsely Vegetated Concave Surface (B8)					
Field Observations:		ſ				
Surface Water Present? Yes X	No Depth (inches): 4					
Water Table Present? Yes X	No Depth (inches): 0					
Saturation Present? Yes X	No Depth (inches): 0	Wetlan	d Hydrology Present? Yes X No			
Saturation Present? Yes X (includes capillary fringe)	No Depth (inches):0	Wetlan	d Hydrology Present? Yes X No			
Saturation Present?       Yes       X         (includes capillary fringe)	No Depth (inches): nonitoring well, aerial photos, previous inspe	Wetlan ections), if a	d Hydrology Present? Yes X No			
Saturation Present?       Yes       X         (includes capillary fringe)	No Depth (inches):	Wetlan ections), if a	d Hydrology Present? Yes X No			
Saturation Present? Yes X (includes capillary fringe) Describe Recorded Data (stream gauge, n	No Depth (inches):0	Wetlan	d Hydrology Present? Yes X No			
Saturation Present? Yes X (includes capillary fringe) Describe Recorded Data (stream gauge, n Remarks:	No Depth (inches):	Wetlan	d Hydrology Present? Yes X No			
Saturation Present?       Yes       X         (includes capillary fringe)	No Depth (inches):	Wetlan	d Hydrology Present? Yes X No			
Saturation Present?       Yes       X         (includes capillary fringe)	No Depth (inches):0	Wetlan	d Hydrology Present? Yes X No			
Saturation Present?       Yes       X         (includes capillary fringe)	No Depth (inches):	Wetlan	d Hydrology Present? Yes X No			
Saturation Present?       Yes X         (includes capillary fringe)	No Depth (inches):	Wetlan	d Hydrology Present? Yes X No			
Saturation Present? Yes X (includes capillary fringe) Describe Recorded Data (stream gauge, n Remarks:	No Depth (inches):0	Wetlan	d Hydrology Present? Yes X No			
Saturation Present? Yes X (includes capillary fringe) Describe Recorded Data (stream gauge, n Remarks:	No Depth (inches):	Wetlan	d Hydrology Present? Yes X No			
Saturation Present?       Yes X         (includes capillary fringe)	No Depth (inches):	Wetlan	d Hydrology Present? Yes X No			
Saturation Present? Yes X (includes capillary fringe) Describe Recorded Data (stream gauge, n Remarks:	No Depth (inches):0	Wetlan	d Hydrology Present? Yes X No			

Sampling Point: B-W

Tree Stratum (Plot size: 30)	Absolute % Cover	Dominant Species?	Indicator Status	Dominance Test worksheet
1. Acer rubrum	25	Yes	FAC	
2 Ulmus americana	20	Yes	FACW	Number of Dominant Species That Are OBL_EACW_or EAC: 7 (A)
3 Fraxinus pennsylvanica	15	Yes	FACW	
4	10		17.07	Total Number of Dominant Species Across All Strata: 8 (B)
5.				
6		·		Percent of Dominant Species That Are OBL_FACW_or FAC: 87.5% (A/B)
7.		·		Prevalence Index worksheet:
	60	=Total Cover		Total % Cover of: Multiply by:
Sapling/Shrub Stratum (Plot size: 15 )		•		OBL species 5 $x 1 = 5$
1. Lonicera morrowii	30	Yes	FACU	FACW species 95 $x 2 = 190$
2. Rhamnus cathartica	30	Yes	FAC	FAC species 90 $\times$ 3 = 270
3.				FACU species 30 x 4 = 120
4.				UPL species $0 \times 5 = 0$
5.				Column Totals: 220 (A) 585 (B)
6.				Prevalence Index = B/A = 2.66
7.				Hydrophytic Vegetation Indicators:
	60	=Total Cover		1 - Rapid Test for Hydrophytic Vegetation
Herb Stratum (Plot size: 5 )				X 2 - Dominance Test is >50%
1. Toxicodendron radicans	30	Yes	FAC	X_3 - Prevalence Index is ≤3.0 <sup>1</sup>
2. Onoclea sensibilis	30	Yes	FACW	4 - Morphological Adaptations <sup>1</sup> (Provide supporting
3. Equisetum arvense	5	No	FAC	data in Remarks or on a separate sheet)
4. Solidago gigantea	30	Yes	FACW	Problematic Hydrophytic Vegetation <sup>1</sup> (Explain)
5. Carex sp.	5	No	OBL	<sup>1</sup> Indicators of hydric soil and wetland hydrology must
6.				be present, unless disturbed or problematic.
7.				Definitions of Vegetation Strata:
8				<b>Tree</b> – Woody plants 3 in $(7.6 \text{ cm})$ or more in
9				diameter at breast height (DBH), regardless of height.
10				Sapling/shrub – Woody plants less than 3 in. DBH
11				and greater than or equal to 3.28 ft (1 m) tall.
12				Herb – All herbaceous (non-woody) plants, regardless
	100	=Total Cover		of size, and woody plants less than 3.28 ft tall.
Woody Vine Stratum (Plot size:)				Woody vines – All woody vines greater than 3.28 ft in
1				height.
2				
3				Hydrophytic Vegetation
4				Present? Yes <u>X</u> No
		=Total Cover		
Remarks: (Include photo numbers here or on a separation of the sep	ate sheet.)			

Profile Desc	ription: (Describe	to the de	epth needed to docu	ument t	he indica	tor or co	onfirm the absence o	f indicators.)	
Depth	Matrix		Redo	x Featur	es				
(inches)	Color (moist)	%	Color (moist)	%	Type <sup>1</sup>	Loc <sup>2</sup>	Texture	Remarks	
0-18	10YR 4/2	95	7.5YR 4/6	5	C	PL	Loamy/Clayey	Prominent redox conc	centrations
							·		
							·		
							·		
		etion R	M-Reduced Matrix	-Mas	ked Sand	Grains	<sup>2</sup> Location: P	1 - Pore Lining M-Matrix	
Hydric Soil I Histosol Histic Ep Black His Hydrogen Stratified Depleted Thick Da Sandy M Sandy G Sandy R Sandy R Stripped Dark Sur	ndicators: (A1) ipedon (A2) stic (A3) n Sulfide (A4) Layers (A5) Below Dark Surface rk Surface (A12) ucky Mineral (S1) leyed Matrix (S4) edox (S5) Matrix (S6) face (S7) hydrophytic vegetat	e (A11)	Polyvalue Belo MLRA 149B Thin Dark Surf: High Chroma S Loamy Mucky Loamy Gleyed X Depleted Matri Redox Dark Su Depleted Dark Redox Depress Marl (F10) (LR	w Surfa ) ace (S9) Sands (S Mineral Matrix ( x (F3) urface (F Surface sions (F <b>R K, L</b> ) ust be pr	ce (S8) (I (LRR R (F1) (LRF (F1) (LRF F2) (F7) (F7) B)	LRR R, , MLRA 1 R K, L) R K, L)	Indicators fo 2 cm Mu Coast Pu S cm Mu Polyvalu Thin Dar Iron-Mar Piedmor Mesic Sj Red Par Very Sha Other (E	or Problematic Hydric S ack (A10) (LRR K, L, MLF rairie Redox (A16) (LRR I acky Peat or Peat (S3) (LI the Below Surface (S8) (LF rk Surface (S9) (LRR K, L inganese Masses (F12) (L int Floodplain Soils (F19) ( podic (TA6) (MLRA 144A ent Material (F21) allow Dark Surface (F22) (xplain in Remarks)	:oils <sup>3</sup> : RA 149B) K, L, R) RR K, L, R) RR K, L) _) .RR K, L, R) (MLRA 149B) 145, 149B)
Type: Depth (in	.ayer (if observed):						Hydric Soil Preser	nt? Yes	No
Remarks: This data forr Version 7.0, 2	n is revised from No 2015 Errata. (http://w	rthcentra www.nrcs	al and Northeast Reg .usda.gov/Internet/FS	ional Su SE_DOC	pplement	t Version S/nrcs14	2.0 to include the NR( 2p2_051293.docx)	CS Field Indicators of Hyd	dric Soils,

Project/Site: Land Release for Future Development	City/County: Cicero/Onondaga Sampling Date: May 9, 2019
Applicant/Owner: Syracuse Regional Airport Author	rity State: NY Sampling Point: B-W2
Investigator(s): Bayer, Bryan	Section, Township, Range:
Landform (hillside, terrace, etc.): Depression	Local relief (concave, convex, none): Concave Slope %: 1-3
Subregion (LRR or MLRA): LRR L Lat:	: <u>43° 7' 28.97"</u> Long: <u>76° 5' 13.29"</u> Datum: <u>WGS 84</u>
Soil Map Unit Name: Niagara silt loam	NWI classification:
Are climatic / hydrologic conditions on the site typical for	r this time of year? Yes X No (If no, explain in Remarks.)
Are Vegetation, Soil, or Hydrology	_significantly disturbed? Are "Normal Circumstances" present? Yes X No
Are Vegetation, Soil, or Hydrology	naturally problematic? (If needed, explain any answers in Remarks.)
SUMMARY OF FINDINGS – Attach site ma	p showing sampling point locations, transects, important features, etc.
Hydrophytic Vegetation Present?     Yes     X       Hydric Soil Present?     Yes     X	No     Is the Sampled Area       No     within a Wetland?     Yes X     No
Wetland Hydrology Present? Yes X	No If yes, optional Wetland Site ID:
Remarks: (Explain alternative procedures here or in a	separate report.)
HYDROLOGY	

Wetland Hydrology Indicators:		Secondary Ind	cators (minimum of two required)		
Primary Indicators (minimum of one is require	Surface So	Surface Soil Cracks (B6)			
Surface Water (A1)	Water-Stained Leaves (B9)	Drainage I	Drainage Patterns (B10)		
X High Water Table (A2)	Aquatic Fauna (B13)	Moss Trim	Moss Trim Lines (B16)		
X Saturation (A3)	Marl Deposits (B15)	Dry-Seaso	n Water Table (C2)		
Water Marks (B1)	Hydrogen Sulfide Odor (C1)	Crayfish B	urrows (C8)		
Sediment Deposits (B2)	Oxidized Rhizospheres on Living Roo	s (C3) Saturation	Visible on Aerial Imagery (C9)		
Drift Deposits (B3)	Presence of Reduced Iron (C4)	Stunted or	Stressed Plants (D1)		
Algal Mat or Crust (B4)	Recent Iron Reduction in Tilled Soils	C6) Geomorph	ic Position (D2)		
Iron Deposits (B5)	Thin Muck Surface (C7)	Shallow A	quitard (D3)		
Inundation Visible on Aerial Imagery (B7	Other (Explain in Remarks)	Microtopog	graphic Relief (D4)		
Sparsely Vegetated Concave Surface (B	8)	X FAC-Neut	al Test (D5)		
Field Observations:					
Surface Water Present? Yes	No X Depth (inches): 0				
	Table Present? Yes X No Depth (inches): 5				
Water Table Present? Yes X	No Depth (Inches): 5				
Water Table Present?     Yes     X       Saturation Present?     Yes     X	No Depth (inches): 5 No Depth (inches): 3	Wetland Hydrology P	resent? Yes X No		
Water Table Present?     Yes     X       Saturation Present?     Yes     X       (includes capillary fringe)     X	No Depth (inches): 5	Wetland Hydrology P	resent? Yes <u>X</u> No		
Water Table Present?       Yes       X         Saturation Present?       Yes       X         (includes capillary fringe)       X         Describe Recorded Data (stream gauge, monotone)	No Depth (inches): No Depth (inches): nitoring well, aerial photos, previous inspec	Wetland Hydrology Pons), if available:	resent? Yes <u>X</u> No		
Water Table Present?       Yes       X         Saturation Present?       Yes       X         (includes capillary fringe)	No Depth (inches): No Depth (inches): nitoring well, aerial photos, previous inspec	Wetland Hydrology Ponos), if available:	resent? Yes <u>X</u> No		
Water Table Present?       Yes       X         Saturation Present?       Yes       X         (includes capillary fringe)	No Depth (inches): No Depth (inches): nitoring well, aerial photos, previous inspec	Wetland Hydrology Pronons), if available:	resent? Yes <u>X</u> No		
Water Table Present?       Yes       X         Saturation Present?       Yes       X         (includes capillary fringe)       Describe Recorded Data (stream gauge, modeling)         Remarks:       Remarks:	No Depth (inches): 5 No Depth (inches): 3 nitoring well, aerial photos, previous inspec	Wetland Hydrology Pronomerations), if available:	resent? Yes <u>X</u> No		
Water Table Present?       Yes       X         Saturation Present?       Yes       X         (includes capillary fringe)       Describe Recorded Data (stream gauge, monopole         Remarks:       Remarks:	No Depth (inches): <u>5</u> No Depth (inches): <u>3</u> nitoring well, aerial photos, previous inspec	Wetland Hydrology Propose (1997), if available:	esent? Yes <u>X</u> No		
Water Table Present?       Yes       X         Saturation Present?       Yes       X         (includes capillary fringe)       Image: Comparison of the co	No Depth (inches): <u>5</u> No Depth (inches): <u>3</u> nitoring well, aerial photos, previous inspec	Wetland Hydrology Propos), if available:	resent? Yes <u>X</u> No		
Water Table Present?       Yes X         Saturation Present?       Yes X         (includes capillary fringe)       X         Describe Recorded Data (stream gauge, monopole         Remarks:	No Depth (inches): No Depth (inches): nitoring well, aerial photos, previous inspec	Wetland Hydrology Propose (1997), if available:	resent? Yes <u>X</u> No		
Water Table Present?       Yes       X         Saturation Present?       Yes       X         (includes capillary fringe)	No Depth (inches): No Depth (inches): nitoring well, aerial photos, previous inspec	Wetland Hydrology Propose (1997), if available:	resent? Yes <u>X</u> No		
Water Table Present?       Yes       X         Saturation Present?       Yes       X         (includes capillary fringe)	No Depth (inches): <u>5</u> No Depth (inches): <u>3</u> nitoring well, aerial photos, previous inspec	Wetland Hydrology Propose (1997), if available:	resent? Yes <u>X</u> No		
Water Table Present?       Yes       X         Saturation Present?       Yes       X         (includes capillary fringe)	No Depth (inches): <u>5</u> No Depth (inches): <u>3</u> nitoring well, aerial photos, previous inspec	Wetland Hydrology Po	resent? Yes <u>X</u> No		
Water Table Present?       Yes X         Saturation Present?       Yes X         (includes capillary fringe)       Image: Comparison of the second of the seco	No Depth (inches): <u>5</u> No Depth (inches): <u>3</u> nitoring well, aerial photos, previous inspec	Wetland Hydrology Propose (1997), if available:	resent? Yes <u>X</u> No		
Water Table Present?       Yes X         Saturation Present?       Yes X         (includes capillary fringe)       Image: Comparison of the second of the seco	No Depth (inches): <u>5</u> No Depth (inches): <u>3</u> nitoring well, aerial photos, previous inspec	Wetland Hydrology Propose (1997), if available:	resent? Yes <u>X</u> No		

Sampling Point: B-W2

Tree Stratum (Plot size: 30 )	Absolute % Cover	Dominant Species?	Indicator Status	Dominance Test worksheet:
1				Number of Dominant Species That Are OBL, FACW, or FAC: 2 (A)
3				Total Number of Dominant Species Across All Strata: 3 (B)
5.				Percent of Dominant Species
7.				Prevalence Index worksheet:
		=Total Cover		Total % Cover of: Multiply by:
Sapling/Shrub Stratum (Plot size: 15 )				OBL species 5 $x 1 = 5$
1. Fraxinus pennsylvanica	40	Yes	FACW	FACW species $45 \times 2 = 90$
2. Cornus racemosa	50	Yes	FAC	FAC species 55 x 3 = 165
3. Cornus amomum	5	No	FACW	FACU species 25 x 4 = 100
4.				UPL species $0 \times 5 = 0$
5.				Column Totals: 130 (A) 360 (B)
6.				Prevalence Index = B/A = 2.77
7.				Hydrophytic Vegetation Indicators:
	95	=Total Cover		1 - Rapid Test for Hydrophytic Vegetation
Herb Stratum (Plot size: 5 )				X 2 - Dominance Test is >50%
1. Solidago canadensis	20	Yes	FACU	X 3 - Prevalence Index is ≤3.0 <sup>1</sup>
2. Cornus racemosa	5	No	FAC	4 - Morphological Adaptations <sup>1</sup> (Provide supporting
3. Cirsium vulgare	5	No	FACU	data in Remarks or on a separate sheet)
4. Lythrum salicaria	5	No	OBL	Problematic Hydrophytic Vegetation <sup>1</sup> (Explain)
5.				The directory of budging and unstand budgetery must
6.				be present, unless disturbed or problematic.
7.				Definitions of Vegetation Strata:
8.				<b>Tree</b> Weady plants 2 in (7.6 cm) or more in
9.				diameter at breast height (DBH), regardless of height.
10.				Sanling/chrub Woody plants loss than 3 in DRH
11				and greater than or equal to 3.28 ft (1 m) tall.
12	35	=Total Cover		<b>Herb</b> – All herbaceous (non-woody) plants, regardless of size, and woody plants less than 3.28 ft tall.
Woody Vine Stratum (Plot size:)				Woody vines – All woody vines greater than 3.28 ft in
1				height.
2				
3.				Hydrophytic Vegetation
4				Present? Yes X No
	:	=Total Cover		
Remarks: (Include photo numbers here or on a sepa	rate sheet.)			

Profile Desc	ription: (Describe	to the de	oth needed to docu	ument ti	ne indica	tor or c	onfirm the absence of	indicators.)
Depth	Matrix		Redo	x Featur	es			
(inches)	Color (moist)	%	Color (moist)	%	Type <sup>1</sup>	Loc <sup>2</sup>	Texture	Remarks
0-6	10YR 4/2	100					Loamy/Clayey	
6-18	10YR 5/2	90	10YR 5/8	10	С	Μ	Loamy/Clayey	Prominent redox concentrations
·								
<sup>1</sup> Type: C=Co	oncentration, D=Depl	etion, RM	=Reduced Matrix, N	/IS=Mas	ked Sand	Grains.	<sup>2</sup> Location: PL	=Pore Lining, M=Matrix.
Hydric Soil	Indicators:						Indicators fo	r Problematic Hydric Soils <sup>3</sup> :
Histosol	(A1)		Polyvalue Belo	w Surfa	ce (S8) (I	LRR R,	2 cm Muc	ck (A10) ( <b>LRR K, L, MLRA 149B</b> )
Histic Ep	pipedon (A2)		MLRA 149B	)			Coast Pra	airie Redox (A16) ( <b>LRR K, L, R</b> )
Black Hi	stic (A3)		Thin Dark Surf	, ace (S9)	(LRR R	MLRA	149B) 5 cm Muc	cky Peat or Peat (S3) (LRR K, L, R)
Hydroge	n Sulfide (A4)		High Chroma S	Sands (S	11) (LRF	, K. L)	,Polvvalue	Below Surface (S8) (LRR K, L)
Stratifier			Loamy Mucky	Minoral	(E1) (I DI	···, _,	Thip Dark	
	A Dalaw Dark Surface	(111)		Motrix (		<b>、 ∩, ∟</b> )		
		(ATT)	Loamy Gleyed		FZ)			
	ark Sufface (A12)		X Depleted Matri	x (F3)				Floodplain Solis (F19) (MLRA 149B)
Sandy M	lucky Mineral (S1)		Redox Dark Su	urface (F	6)		Mesic Sp	odic (TA6) ( <b>MLRA 144A, 145, 149B</b> )
Sandy G	ileyed Matrix (S4)		Depleted Dark	Surface	(F7)		Red Pare	nt Material (F21)
Sandy R	edox (S5)		Redox Depress	sions (F8	3)		Very Shal	llow Dark Surface (F22)
Stripped	Matrix (S6)		Marl (F10) (LR	R K, L)			Other (Ex	plain in Remarks)
Dark Su	rface (S7)							
<sup>3</sup> Indicators of	f hydrophytic vegetat	ion and w	etland hydrology mu	ust be pr	esent, ur	nless dist	urbed or problematic.	
Restrictive I	Layer (if observed):							
Type:							Ukudnia Cail Draaan	
Depth (Ir							Hydric Soll Present	t? res <u>x</u> no
Remarks:	m in rovined from No	rthoontrol	and Northaast Bag	ional Su	nnlomon	Worojop	2.0 to include the NPC	S Eield Indiantors of Hudria Saila
Version 7.0	2015 Errata (http://w		usda gov/Internet/FS	SF DOC	CUMENT	S/nrcs14	2.0 10 Include the NRC	S Field Indicators of Hydric Solis,
	2010 Endia. (http://h			02_000		0,1110011	2p2_001200.000x)	

Project/Site: Land Release for Fo	uture Development	Cit	y/County: Cicero/Onondaga		Sampling Date: May	9, 2019
Applicant/Owner: Syracuse R	egional Airport Author	ity	Sta	ate: NY	Sampling Point:	C-U
Investigator(s): Bayer, Bryan			Section, Township, Ran	ge:		
Landform (hillside, terrace, etc.):	Terrace	Local relie	f (concave, convex, none): <u>No</u>	ne	Slope %:	1-3
Subregion (LRR or MLRA): LRR	L Lat:	43° 7' 36.39"	Long: 76° 5' 14.02	2"	Datum: WG	S 84
Soil Map Unit Name: Niagara silt	loam		NWI cl	assification	ו:	
Are climatic / hydrologic conditions	s on the site typical for	this time of year?	Yes X No	(If no,	, explain in Remarks.)	
Are Vegetation, Soil	, or Hydrology	significantly disturbed	? Are "Normal Circumst	ances" pre	sent? Yes X No	
Are Vegetation, Soil	, or Hydrology	_naturally problematic?	(If needed, explain an	answers i	in Remarks.)	
SUMMARY OF FINDINGS	<ul> <li>Attach site map</li> </ul>	o showing sampling	ng point locations, tran	sects, ir	nportant features	, etc.
Hydrophytic Vegetation Present?	Yes X	NoI	s the Sampled Area			
Hydric Soil Present?	Yes	No X V	within a Wetland?	Yes	No X	

Hydric Soil Present? Wetland Hydrology Present?	Yes Yes	No X No X	within a Wetland?     Yes     No     X       If yes, optional Wetland Site ID:
Remarks: (Explain alternative proced	ures here or in a	separate report.)	·

Wetland Hydrology Indicators:			Secondary Indicators (minimum of two required)	
Primary Indicators (minimum of one is require		Surface Soil Cracks (B6)		
Surface Water (A1)	Drainage Patterns (B10)			
High Water Table (A2)	Aquatic Fauna (B13)	Moss Trim Lines (B16)		
Saturation (A3)	Marl Deposits (B15)		Dry-Season Water Table (C2)	
Water Marks (B1)	Hydrogen Sulfide Odor (C1)		Crayfish Burrows (C8)	
Sediment Deposits (B2)	Oxidized Rhizospheres on Living Ro	oots (C3)	Saturation Visible on Aerial Imagery (C9)	
Drift Deposits (B3)	Presence of Reduced Iron (C4)		Stunted or Stressed Plants (D1)	
Algal Mat or Crust (B4)	Recent Iron Reduction in Tilled Soil	s (C6)	Geomorphic Position (D2)	
Iron Deposits (B5)	Thin Muck Surface (C7)		Shallow Aquitard (D3)	
Inundation Visible on Aerial Imagery (B7	Other (Explain in Remarks)		Microtopographic Relief (D4)	
Sparsely Vegetated Concave Surface (E	38)		FAC-Neutral Test (D5)	
Field Observations:				
Surface Water Present? Yes	No X Depth (inches):			
Water Table Present? Yes	No X Depth (inches):			
Saturation Present? Yes	No X Depth (inches):	Wetlan	d Hydrology Present? Yes No X	
Saturation Present? Yes (includes capillary fringe)	No X Depth (inches):	Wetlan	d Hydrology Present? Yes <u>No X</u>	
Saturation Present?       Yes         (includes capillary fringe)         Describe Recorded Data (stream gauge, model)	No X Depth (inches):	Wetlan ections), if a	d Hydrology Present? Yes No X	
Saturation Present? Yes (includes capillary fringe) Describe Recorded Data (stream gauge, mo	No X Depth (inches):	Wetlan	d Hydrology Present? Yes <u>No X</u> available:	
Saturation Present? Yes (includes capillary fringe) Describe Recorded Data (stream gauge, mo Remarks:	No X Depth (inches):	Wetlan	d Hydrology Present? Yes <u>No X</u> available:	
Saturation Present? Yes (includes capillary fringe) Describe Recorded Data (stream gauge, mo Remarks:	No X Depth (inches):	Wetlan	d Hydrology Present? Yes <u>No X</u> available:	
Saturation Present? Yes (includes capillary fringe) Describe Recorded Data (stream gauge, mo Remarks:	No X Depth (inches):	Wetlan	d Hydrology Present? Yes <u>No X</u> available:	
Saturation Present? Yes (includes capillary fringe) Describe Recorded Data (stream gauge, mo Remarks:	No X Depth (inches):	Wetlan	d Hydrology Present? Yes <u>No X</u> available:	
Saturation Present? Yes (includes capillary fringe) Describe Recorded Data (stream gauge, mo Remarks:	No X Depth (inches):	Wetlan	d Hydrology Present? Yes <u>No X</u> available:	
Saturation Present? Yes (includes capillary fringe) Describe Recorded Data (stream gauge, mo Remarks:	No X Depth (inches):	Wetlan	d Hydrology Present? Yes <u>No X</u> available:	
Saturation Present? Yes (includes capillary fringe) Describe Recorded Data (stream gauge, mo Remarks:	No X Depth (inches):	Wetlan	d Hydrology Present? Yes <u>No X</u> available:	
Saturation Present? Yes (includes capillary fringe) Describe Recorded Data (stream gauge, mo Remarks:	No X Depth (inches):	Wetlan	d Hydrology Present? Yes <u>No X</u> available:	
Saturation Present? Yes (includes capillary fringe) Describe Recorded Data (stream gauge, mo Remarks:	No X Depth (inches):	Wetlan	d Hydrology Present? Yes <u>No X</u> available:	

Sampling Point: C-U

Tree Stratum (Plot size: 30 )	Absolute % Cover	Dominant Species?	Indicator Status	Dominance Test worksheet:
1				Number of Dominant Species That Are OBL, FACW, or FAC: 1 (A)
3.				Total Number of Dominant
4.				Species Across All Strata: 1 (B)
5				Percent of Dominant Species
7.				Prevalence Index worksheet:
		=Total Cover		Total % Cover of: Multiply by:
Sapling/Shrub Stratum (Plot size: 15 )				OBL species 0 $x 1 = 0$
1. Rhamnus cathartica	60	Yes	FAC	FACW species 10 $x 2 = 20$
2. Fraxinus pennsylvanica	10	No	FACW	FAC species 62 x 3 = 186
3. Lonicera morrowii	10	No	FACU	FACU species 10 x 4 = 40
4.				UPL species 0 x 5 = 0
5.				Column Totals: 82 (A) 246 (B)
6.				Prevalence Index = B/A = 3.00
7.				Hydrophytic Vegetation Indicators:
	80	=Total Cover		1 - Rapid Test for Hydrophytic Vegetation
Herb Stratum (Plot size: 5)				X 2 - Dominance Test is >50%
1. Rhamnus cathartica	2	No	FAC	3 - Prevalence Index is ≤3.0 <sup>1</sup>
2				4 - Morphological Adaptations <sup>1</sup> (Provide supporting
3.				data in Remarks or on a separate sheet)
4				Problematic Hydrophytic Vegetation <sup>1</sup> (Explain)
5				<sup>1</sup> Indicators of hydric soil and wetland hydrology must
6				be present, unless disturbed or problematic.
7				Definitions of Vegetation Strata:
8				<b>Tree</b> – Woody plants 3 in. (7.6 cm) or more in diameter at breast beight (DBH), regardless of beight
10				diameter at breast height (DDH), regardless of height.
11.				<b>Sapling/shrub</b> – Woody plants less than 3 in. DBH and greater than or equal to 3.28 ft (1 m) tall.
12				Herb - All herbaceous (non-woody) plants, regardless
	2	=Total Cover		of size, and woody plants less than 3.28 ft tall.
Woody Vine Stratum         (Plot size:)           1.        )				<b>Woody vines</b> – All woody vines greater than 3.28 ft in height.
2.				
3.				Hydrophytic Vegetation
4.				Present? Yes X No
		=Total Cover		
Remarks: (Include photo numbers here or on a sepa	rate sheet.)			

Profile Desc	cription: (Describe	to the de	pth needed to doc	ument t	he indica	tor or co	onfirm the absence of in	ndicators.)	
Depth	Matrix		Redo	x Featur	es				
(inches)	Color (moist)	%	Color (moist)	%	Type <sup>1</sup>	Loc <sup>2</sup>	Texture	Remarks	
0-12	10YR 3/3	100					Loamy/Clayey		
12-18	10YR 5/3	90	10YR 5/8	10	С	Μ	Loamy/Clayey	Prominent redox concentrations	
		·							
		·							
		·							
		·							
		·							
<sup>1</sup> Type: C=Ce	oncentration, D=Dep	letion, RM	I=Reduced Matrix, N	/IS=Mas	ked Sand	Grains.	<sup>2</sup> Location: PL=	Pore Lining, M=Matrix.	
Hydric Soil	Indicators:						Indicators for	Problematic Hydric Soils <sup>3</sup> :	
Histosol	(A1)		Polyvalue Belo	ow Surfa	ce (S8) (I	LRR R,	2 cm Muck	: (A10) ( <b>LRR K, L, MLRA 149B</b> )	
Histic Ep	pipedon (A2)		MLRA 149B	5)			Coast Prair	rie Redox (A16) ( <b>LRR K, L, R</b> )	
Black Hi	stic (A3)		Thin Dark Surf	ace (S9)	) (LRR R	, MLRA 1	1 <b>49B</b> ) 5 cm Muck	y Peat or Peat (S3) (LRR K, L, R)	
Hydroge	en Sulfide (A4)		High Chroma S	Sands (S	611) ( <b>LRF</b>	R K, L)	Polyvalue I	Below Surface (S8) (LRR K, L)	
Stratified	d Layers (A5)		Loamy Mucky	Mineral	(F1) ( <b>LRI</b>	R K, L)	Thin Dark	Surface (S9) (LRR K, L)	
Depleted	d Below Dark Surfac	e (A11)	Loamy Gleyed	Matrix (	F2)		Iron-Manga	anese Masses (F12) ( <b>LRR K, L, R</b> )	
Thick Da	ark Surface (A12)		Depleted Matri	ix (F3)			Piedmont F	Floodplain Soils (F19) ( <b>MLRA 149B</b> )	
Sandy M	lucky Mineral (S1)		Redox Dark Su	urface (F	6)		Mesic Spo	dic (TA6) ( <b>MLRA 144A, 145, 149B</b> )	
Sandy G	Gleyed Matrix (S4)		Depleted Dark	Surface	e (F7)		Red Parent Material (F21)		
Sandy R	Redox (S5)		Redox Depres	Redox Depressions (F8)				ow Dark Surface (F22)	
Stripped	l Matrix (S6)		Marl (F10) (LR	R K, L)			Other (Exp	lain in Remarks)	
Dark Su	rface (S7)								
3									
Indicators of	t hydrophytic vegeta	tion and w	retland hydrology mi	ust be pi	resent, ur	iless dist	urbed or problematic.		
Type:	Layer (il observed).								
Depth (ir	nches):						Hydric Soil Present?	Yes No X	
Remarks:									
This data for	m is revised from No	orthcentral	and Northeast Reg	ional Su	polemen	t Version	2.0 to include the NRCS	Field Indicators of Hydric Soils	
Version 7.0,	2015 Errata. (http://	www.nrcs.	usda.gov/Internet/F	SE_DOO	UMENT	S/nrcs14	2p2_051293.docx)	· · · · · · · · · · · · · · · · · · ·	

Project/Site: Land Release for Future Developmer	nt City/County: Cicero/Onondaga Sampling Date: May 9, 2019
Applicant/Owner: Syracuse Regional Airport Au	uthority State: NY Sampling Point: C-W
Investigator(s): Bayer, Bryan	Section, Township, Range:
Landform (hillside, terrace, etc.): Depression	Local relief (concave, convex, none): Concave Slope %: 1-3
Subregion (LRR or MLRA): LRR L	Lat:         43° 7' 36.36"         Long:         76° 5' 14.02"         Datum:         WGS 84
Soil Map Unit Name: Niagara silt loam	NWI classification:
Are climatic / hydrologic conditions on the site typica	al for this time of year? Yes X No (If no, explain in Remarks.)
Are Vegetation, Soil, or Hydrology _	significantly disturbed? Are "Normal Circumstances" present? Yes X No
Are Vegetation, Soil, or Hydrology _	naturally problematic? (If needed, explain any answers in Remarks.)
SUMMARY OF FINDINGS – Attach site	map showing sampling point locations, transects, important features, etc.
Hydrophytic Vegetation Present?YesHydric Soil Present?YesWetland Hydrology Present?Yes	X     No     Is the Sampled Area       X     No     within a Wetland?     Yes     X       X     No     If yes, optional Wetland Site ID:
Remarks: (Explain alternative procedures here or	in a separate report.)
HYDROLOGY	

Wetland Hydrology Indicators:		Secondary Indicators (minimum of two required)
Primary Indicators (minimum of one is re	Surface Soil Cracks (B6)	
Surface Water (A1)	Water-Stained Leaves (B9)	X Drainage Patterns (B10)
High Water Table (A2)	Aquatic Fauna (B13)	Moss Trim Lines (B16)
Saturation (A3)	Marl Deposits (B15)	Dry-Season Water Table (C2)
Water Marks (B1)	Crayfish Burrows (C8)	
Sediment Deposits (B2)	Oxidized Rhizospheres on Living Ro	Roots (C3) Saturation Visible on Aerial Imagery (C9)
Drift Deposits (B3)	Presence of Reduced Iron (C4)	Stunted or Stressed Plants (D1)
Algal Mat or Crust (B4)	Recent Iron Reduction in Tilled Soils	ils (C6) Geomorphic Position (D2)
Iron Deposits (B5)	Thin Muck Surface (C7)	Shallow Aquitard (D3)
Inundation Visible on Aerial Imagery	(B7) Other (Explain in Remarks)	X Microtopographic Relief (D4)
Sparsely Vegetated Concave Surfac	e (B8)	FAC-Neutral Test (D5)
Field Observations:		
Surface Water Present? Yes	No X Depth (inches): 0	
Water Table Present? Yes	No X Depth (inches): 12	
Saturation Present? Yes	No X Depth (inches): 14	Wetland Hydrology Present? Yes X No
(includes capillary fringe)		
Describe Recorded Data (stream gauge,	monitoring well, aerial photos, previous inspe	ections), if available:
Remarks:		

Sampling Point: C-W

Tree Stratum (Plot size: 30)	Absolute % Cover	Dominant Species?	Indicator Status	Dominance Test worksheet
1. Fraxinus pennsylvanica	35	Yes	FACW	Dominance rest worksheet.
2. Quercus rubra	20	Yes	FACU	Number of Dominant Species That Are OBL_FACW, or FAC: 4 (A)
3.				
4.				Total Number of Dominant Species Across All Strata: 7 (B)
5.				
6.				Percent of Dominant Species That Are OBL, FACW, or FAC: 57.1% (A/B)
7.				Prevalence Index worksheet:
	55	=Total Cover		Total % Cover of: Multiply by:
Sapling/Shrub Stratum (Plot size:15)				OBL species         0         x 1 =         0
1. Quercus rubra	5	Yes	FACU	FACW species 40 x 2 = 80
2. Lonicera morrowii	5	Yes	FACU	FAC species 15 x 3 = 45
3. Cornus racemosa	10	Yes	FAC	FACU species 32 x 4 = 128
4				UPL species x 5 =
5				Column Totals: 87 (A) 253 (B)
6				Prevalence Index = B/A = 2.91
7				Hydrophytic Vegetation Indicators:
	20	=Total Cover		1 - Rapid Test for Hydrophytic Vegetation
Herb Stratum (Plot size: 5 )				X 2 - Dominance Test is >50%
1. Geum canadense	5	Yes	FAC	X 3 - Prevalence Index is $\leq 3.0^{1}$
2. Solidago canadensis	2	No	FACU	4 - Morphological Adaptations <sup>1</sup> (Provide supporting
3. Solidago gigantea	5	Yes	FACW	data in Remarks or on a separate sheet)
4				Problematic Hydrophytic Vegetation <sup>1</sup> (Explain)
5				<sup>1</sup> Indicators of hydric soil and wetland hydrology must
6				be present, unless disturbed or problematic.
7				Definitions of Vegetation Strata:
8				<b>Tree</b> – Woody plants 3 in. (7.6 cm) or more in
9				diameter at breast height (DBH), regardless of height.
10				Sapling/shrub – Woody plants less than 3 in. DBH
11				and greater than or equal to 3.28 ft (1 m) tall.
12				Herb – All herbaceous (non-woody) plants, regardless
	12	=Total Cover		of size, and woody plants less than 3.28 ft tall.
Woody Vine Stratum (Plot size:)				Woody vines – All woody vines greater than 3.28 ft in
1				height.
2				Hudronhutio
3				Vegetation
4				Present? Yes X No
		=Total Cover		
Remarks: (Include photo numbers here or on a separ	ate sheet.)			

or (moist)     %       YR 4/2     100       YR 5/2     90	Color (moist)	% 10	Type <sup>1</sup>	Loc <sup>2</sup>	Texture Loamy/Clayey	Remarks
YR 4/2 100 YR 5/2 90	10YR 5/8	10	С	M	Loamy/Clayey	
YR 5/2 90	10YR 5/8	10	С	М		
					Loanty/Clayey	Prominent redox concentrations
					·	
	- <u></u>				·	
			_	_		
ion, D=Depletion, F	RM=Reduced Matrix, N	//S=Mas	ked Sand	d Grains.	<sup>2</sup> Location: P	L=Pore Lining, M=Matrix.
A2) (A4) (A5) Dark Surface (A11) ce (A12) heral (S1) atrix (S4) i) S6)	Polyvalue Beld MLRA 149E Thin Dark Surf High Chroma S Loamy Mucky Loamy Gleyed X Depleted Matr Redox Dark S Depleted Dark Redox Depres Marl (F10) (LR	ow Surfa j iace (S9) Sands (S Mineral Matrix ( Matrix ( race (F3) urface (F Surface sions (Fa sions (Fa <b>R K, L</b> )	ce (S8) ( ) (LRR R 611) (LRI (F1) (LRI F2) (6) (F7) 8)	LRR R, , MLRA 1 R K, L) R K, L)	2 cm Mu Coast Pr 5 cm Mu Polyvalu Thin Dar Iron-Mar Piedmor Mesic Sp Red Par Very Sha Other (E	ick (A10) ( <b>LRR K, L, MLRA 149B</b> ) rairie Redox (A16) ( <b>LRR K, L, R</b> ) icky Peat or Peat (S3) ( <b>LRR K, L, R</b> ) e Below Surface (S8) ( <b>LRR K, L</b> ) k Surface (S9) ( <b>LRR K, L</b> ) inganese Masses (F12) ( <b>LRR K, L, R</b> ) int Floodplain Soils (F19) ( <b>MLRA 149E</b> bodic (TA6) ( <b>MLRA 144A, 145, 149B</b> ent Material (F21) allow Dark Surface (F22) xplain in Remarks)
ytic vegetation and	wetland hydrology m	ust be pr	esent, ur	nless dist	urbed or problematic.	
observed):					Hydric Soil Preser	nt? Yes <u>X</u> No
sed from Northcent ata. (http://www.nrc	ral and Northeast Reg s.usda.gov/Internet/F	ional Su SE_DOC	pplemen CUMENT	t Version S/nrcs14	2.0 to include the NR( 2p2_051293.docx)	CS Field Indicators of Hydric Soils,
	tion, D=Depletion, F rs: A2) (A4) (A5) Dark Surface (A11) ce (A12) heral (S1) atrix (S4) 5) S6) ') hytic vegetation and observed): sed from Northcent rata. (http://www.nrc	tion, D=Depletion, RM=Reduced Matrix, M rs: A2) (A4) (A5) Dark Surface (A11) Loamy Mucky Dark Surface (A11) Loamy Mucky Dark Surface (A11) Loamy Gleyed (A5) Ce (A12) Needox Dark Surface (A11) Loamy Gleyed Ce (A12) Redox Dark Surface (A11) Redox Dark Surface (A11) Redox Dark Surface (A11) Marl (S1) Redox Dark Surface (A11) Redox Dark Surface (A11) Marl (F10) (LR Marl (F10) (LR Marl (F10) (LR Sed from Northcentral and Northeast Reg rata. (http://www.nrcs.usda.gov/Internet/F	tion, D=Depletion, RM=Reduced Matrix, MS=Mas rs: A2) Polyvalue Below Surfa A2) Thin Dark Surface (S9) (A4) High Chroma Sands (S (A5) Loamy Mucky Mineral Dark Surface (A11) Loamy Gleyed Matrix ( ce (A12) X Depleted Matrix (F3) neral (S1) Redox Dark Surface (F atrix (S4) Depleted Dark Surface (F S6) Marl (F10) (LRR K, L) ') nytic vegetation and wetland hydrology must be pr observed): sed from Northcentral and Northeast Regional Su rata. (http://www.nrcs.usda.gov/Internet/FSE_DOC	tion, D=Depletion, RM=Reduced Matrix, MS=Masked Sand rs: A2) Polyvalue Below Surface (S8) (I A2) MLRA 149B) Thin Dark Surface (S9) (LRR R 4(A4) High Chroma Sands (S11) (LRI (A5) Loamy Mucky Mineral (F1) (LRI Dark Surface (A11) Loamy Gleyed Matrix (F2) ce (A12) X Depleted Matrix (F3) neral (S1) Redox Dark Surface (F6) atrix (S4) Depleted Dark Surface (F7) 5) Redox Depressions (F8) S6) Marl (F10) (LRR K, L) ') nytic vegetation and wetland hydrology must be present, un observed): sed from Northcentral and Northeast Regional Supplement rata. (http://www.nrcs.usda.gov/Internet/FSE_DOCUMENT	tion, D=Depletion, RM=Reduced Matrix, MS=Masked Sand Grains.         rs:         A2)         Thin Dark Surface (S9) (LRR R, MLRA 1         A(A4)         High Chroma Sands (S11) (LRR K, L)         (A5)         Dark Surface (A11)         Loamy Mucky Mineral (F1) (LRR K, L)         Dark Surface (A11)         Loamy Gleyed Matrix (F2)         ce (A12)       X         Depleted Matrix (F3)         neral (S1)       Redox Dark Surface (F6)         atrix (S4)       Depleted Dark Surface (F7)         5)       Redox Depressions (F8)         S6)       Marl (F10) (LRR K, L)         '')       ''         nytic vegetation and wetland hydrology must be present, unless dist         observed):	ition, D=Depletion, RM=Reduced Matrix, MS=Masked Sand Grains. <sup>2</sup> Location: P         rs:       Indicators for         A2)       MLRA 149B)       Coast Pr

Project/Site: Land Release for Future Development	nt	City/C		Sampling Date: May 9, 2019	
Applicant/Owner: Syracuse Regional Airport A	uthori	ity	State:	NY	Sampling Point: D-U
Investigator(s): Bayer, Bryan			Section, Township, Range:		
Landform (hillside, terrace, etc.): Terrace		Local relief (c	oncave, convex, none): <u>None</u>		Slope %: <u>1-3</u>
Subregion (LRR or MLRA): LRR L	Lat:	43° 7' 16.74"	Long: 76° 5' 3.65"		Datum: WGS 84
Soil Map Unit Name: Croghan fine sandy loam			NWI classific	cation:	
Are climatic / hydrologic conditions on the site typic	al for	this time of year?	Yes <u>X</u> No(	(If no, e)	plain in Remarks.)
Are Vegetation, Soil, or Hydrology		significantly disturbed?	Are "Normal Circumstances	s" prese	nt? Yes X No
Are Vegetation, Soil, or Hydrology		naturally problematic?	(If needed, explain any answ	wers in l	Remarks.)
SUMMARY OF FINDINGS – Attach site	map	showing sampling	point locations, transect	ts, imp	portant features, etc.
Hydrophytic Vegetation Present? Yes		No X Is ti	ne Sampled Area		N- X

Hydric Soil Present?	Yes	No X	within a Wetland?     Yes     No _ X       If yes, optional Wetland Site ID:
Wetland Hydrology Present?	Yes	No X	
Remarks: (Explain alternative proced	lures here or in a	separate report.)	

Wetland Hydrology Indicators:		Secondary Indicators (minimum of two required)
Primary Indicators (minimum of one is required;	Surface Soil Cracks (B6)	
Surface Water (A1)	Water-Stained Leaves (B9)	Drainage Patterns (B10)
High Water Table (A2)	Aquatic Fauna (B13)	Moss Trim Lines (B16)
Saturation (A3)	Marl Deposits (B15)	Dry-Season Water Table (C2)
Water Marks (B1)	Hydrogen Sulfide Odor (C1)	Crayfish Burrows (C8)
Sediment Deposits (B2)	Oxidized Rhizospheres on Living Roots (C3	3) Saturation Visible on Aerial Imagery (C9)
Drift Deposits (B3)	Presence of Reduced Iron (C4)	Stunted or Stressed Plants (D1)
Algal Mat or Crust (B4)	Recent Iron Reduction in Tilled Soils (C6)	Geomorphic Position (D2)
Iron Deposits (B5)	Thin Muck Surface (C7)	Shallow Aquitard (D3)
Inundation Visible on Aerial Imagery (B7)	Other (Explain in Remarks)	Microtopographic Relief (D4)
Sparsely Vegetated Concave Surface (B8)		FAC-Neutral Test (D5)
Field Observations:		
Surface Water Present? Yes No	o X Depth (inches):	
Water Table Present? Yes No	o X Depth (inches):	
Saturation Present? Yes No	o X Depth (inches): Wetl	and Hydrology Present? Yes No X
(includes capillary fringe)		
(includes capillary fringe) Describe Recorded Data (stream gauge, monitor	ring well, aerial photos, previous inspections),	if available:
(includes capillary fringe) Describe Recorded Data (stream gauge, monitor	ring well, aerial photos, previous inspections),	if available:
(includes capillary fringe) Describe Recorded Data (stream gauge, monitor Remarks:	ring well, aerial photos, previous inspections),	if available:
(includes capillary fringe) Describe Recorded Data (stream gauge, monitor Remarks:	ring well, aerial photos, previous inspections),	if available:
(includes capillary fringe) Describe Recorded Data (stream gauge, monitor Remarks:	ring well, aerial photos, previous inspections),	if available:
(includes capillary fringe) Describe Recorded Data (stream gauge, monitor Remarks:	ring well, aerial photos, previous inspections),	if available:
(includes capillary fringe) Describe Recorded Data (stream gauge, monitor Remarks:	ring well, aerial photos, previous inspections),	if available:
(includes capillary fringe) Describe Recorded Data (stream gauge, monitor Remarks:	ring well, aerial photos, previous inspections),	if available:
(includes capillary fringe) Describe Recorded Data (stream gauge, monitor Remarks:	ring well, aerial photos, previous inspections),	if available:
(includes capillary fringe) Describe Recorded Data (stream gauge, monitor Remarks:	ring well, aerial photos, previous inspections),	if available:
(includes capillary fringe) Describe Recorded Data (stream gauge, monitor Remarks:	ring well, aerial photos, previous inspections),	if available:

Sampling Point: D-U

Tree Stratum (Plot size: 30 )	Absolute % Cover	Dominant Species?	Indicator Status	Dominance Test worksheet:
1. Carya ovata	70	Yes	FACU	Number of Dominant Species
2. Fraxinus pennsylvanica	20	Yes	FACW	That Are OBL, FACW, or FAC: (A)
3.				Total Number of Dominant
4.				Species Across All Strata: 5 (B)
5				Percent of Dominant Species
6				That Are OBL, FACW, or FAC: <u>40.0%</u> (A/B)
7				Prevalence Index worksheet:
	90	=Total Cover		Total % Cover of: Multiply by:
Sapling/Shrub Stratum (Plot size: 15 )				OBL species 0 x 1 = 0
1. Carya ovata	5	Yes	FACU	FACW species 20 x 2 = 40
2. Lonicera morrowii	2	Yes	FACU	FAC species 15 x 3 = 45
3				FACU species X 4 = 308
4.				UPL species 0 x 5 = 0
5.				Column Totals: 112 (A) 393 (B)
6				Prevalence Index = B/A = 3.51
7				Hydrophytic Vegetation Indicators:
	7	=Total Cover		1 - Rapid Test for Hydrophytic Vegetation
Herb Stratum (Plot size: 5 )				2 - Dominance Test is >50%
1. Toxicodendron radicans	15	Yes	FAC	3 - Prevalence Index is ≤3.0 <sup>1</sup>
2				4 - Morphological Adaptations <sup>1</sup> (Provide supporting
3				data in Remarks or on a separate sheet)
4				Problematic Hydrophytic Vegetation <sup>1</sup> (Explain)
5				<sup>1</sup> Indicators of hydric soil and wetland hydrology must
6				be present, unless disturbed or problematic.
7				Definitions of Vegetation Strata:
8				Tree – Woody plants 3 in. (7.6 cm) or more in
9				diameter at breast height (DBH), regardless of height.
10				Sapling/shrub – Woody plants less than 3 in. DBH
11				and greater than or equal to 3.28 ft (1 m) tall.
12				Herb – All herbaceous (non-woody) plants, regardless
	15	=Total Cover		of size, and woody plants less than 3.28 ft tall.
Woody Vine Stratum (Plot size:)				Woody vines – All woody vines greater than 3.28 ft in
1				height.
2				Hydrophytic
3				Vegetation
4			. <u></u>	Present? Yes <u>No X</u>
		=Total Cover		
Remarks: (Include photo numbers here or on a separ	ate sheet.)			

Depth	Matrix		Redo	x Featur	res					
(inches) Color	r (moist)	%	Color (moist)	%	Type <sup>1</sup>	Loc <sup>2</sup>	Texture		Rema	rks
0-18 10	(R 2/1	100					Loamv/Clavev			
		<u> </u>								
								_		
		<u> </u>								
<sup>1</sup> Tvpe: C=Concentrati	on. D=Deple	etion. RM	=Reduced Matrix.	∕IS=Mas	ked Sand	d Grains.	<sup>2</sup> Location	PL=Pore	Linina. M=Ma	atrix.
Hydric Soil Indicator	s:	,	,				Indicator	s for Prob	lematic Hydr	ic Soils <sup>3</sup> :
Histosol (A1)			Polyvalue Belo	ow Surfa	ice (S8) (	LRR R,	2 cm	Muck (A10	) (LRR K, L, I	MLRA 149B)
Histic Epipedon (A	(2)		MLRA 149B	5)			Coas	t Prairie Re	edox (A16) ( <b>Ll</b>	RR K, L, R)
Black Histic (A3)			Thin Dark Surf	ace (S9	) (LRR R	, MLRA 1	<b>49B</b> ) 5 cm	Mucky Pea	at or Peat (S3	) (LRR K, L, R)
Hydrogen Sulfide	(A4)		High Chroma S	Sands (S	511) ( <b>LRF</b>	R K, L)	Polyv	alue Belov	v Surface (S8)	(LRR K, L)
Stratified Layers (	A5)		Loamy Mucky	Mineral	(F1) ( <b>LR</b>	R K, L)	Thin	Dark Surfa	ce (S9) ( <b>LRR</b>	<b>K</b> , L)
Depleted Below D	ark Surface	(A11)	Loamy Gleyed	Matrix (	(F2)		Iron-N	langanese	e Masses (F12	2) ( <b>LRR K, L, R</b> )
Thick Dark Surfac	e (A12)		Depleted Matri	x (F3)			Piedr	nont Flood	plain Soils (F1	19) ( <b>MLRA 149</b>
Sandy Mucky Min	eral (S1)		Redox Dark Su	urface (F	F6)		Mesic	: Spodic (T	A6) (MLRA 1	44A, 145, 149B
Sandy Gleyed Ma	trix (S4)		Depleted Dark	Surface	e (F7)			Parent Mat	erial (F21)	200)
Sandy Redox (S5)	)		Redox Depres		8)		Very	Shallow Da	ark Surface (F	22)
Stripped Matrix (S	6)		Mari (F10) ( <b>LR</b>	( <b>R K, L</b> )			Othe	(Explain li	n Remarks)	
<sup>3</sup> Indicators of hydroph	tic vegetati	on and w	etland hydrology mi	ust be p	resent. ur	nless dist	urbed or problemat	ic.		
Restrictive Layer (if c	bserved):		enana nyarorogy m							
Type:	,									
Depth (inches):							Hvdric Soil Pre	sent?	Yes	No X
							,			
This data form is revis	ed from Nor	theontral	and Northeast Reg	ional Su	Innlemen	t Version	2.0 to include the M	IRCS Field	Indicators of	Hydric Soils
Version 7.0, 2015 Erra	ita. (http://w	ww.nrcs.u	usda.gov/Internet/F	SE_DO	CUMENT	S/nrcs14	2p2_051293.docx)			riyano cono,
			-							

Project/Site: Land Release for Fu	ture Development	City/County: Cicero/Onondaga	Sampling Date: May 9, 2019
Applicant/Owner: Syracuse Re	egional Airport Authority	State: NY	Sampling Point: D-W
Investigator(s): Bayer, Bryan		Section, Township, Range:	
Landform (hillside, terrace, etc.):	Depression Local	relief (concave, convex, none): Concave	Slope %: 1-3
Subregion (LRR or MLRA): LRR	L Lat: <u>43° 7' 14.45"</u>	Long: 76° 5' 4.15"	Datum: WGS 84
Soil Map Unit Name: Minoa fine s	andy loam	NWI classification	on: PFO1C
Are climatic / hydrologic conditions	on the site typical for this time of year?	Yes <u>X</u> No(If ne	o, explain in Remarks.)
Are Vegetation, Soil	, or Hydrology significantly distu	rbed? Are "Normal Circumstances" pr	resent? Yes X No
Are Vegetation, Soil	, or Hydrology naturally problem	atic? (If needed, explain any answers	s in Remarks.)
SUMMARY OF FINDINGS -	- Attach site map showing sam	pling point locations, transects,	important features, etc.
Hydrophytic Vegetation Present? Hydric Soil Present?	Yes X No Yes X No	Is the Sampled Area within a Wetland? Yes X	No
Wetland Hydrology Present?	Yes <u>X</u> No	If yes, optional Wetland Site ID:	
Remarks: (Explain alternative pro	cedures here or in a separate report.)		
HYDROLOGY			

Wetland Hydrology Indicat	ors:		Secondary I	ndicators (min	imum of two required)		
Primary Indicators (minimum	n of one is requir	Surface	Soil Cracks (E	36)			
Surface Water (A1)		Water-	Stained Leaves (B9)		X Drainage Patterns (B10)		
High Water Table (A2)		Aquatio	c Fauna (B13)		Moss Trim Lines (B16)		
Saturation (A3)		Marl D	eposits (B15)		Dry-Sea	son Water Ta	ble (C2)
Water Marks (B1)		Hydrog	gen Sulfide Odor (C1)		Crayfish	Burrows (C8)	)
Sediment Deposits (B2)		Oxidize	ed Rhizospheres on Living R	oots (C3)	Saturati	on Visible on <i>i</i>	Aerial Imagery (C9)
Drift Deposits (B3)		Preser	nce of Reduced Iron (C4)		Stunted	or Stressed P	Plants (D1)
Algal Mat or Crust (B4)		Recent	t Iron Reduction in Tilled Soi	ls (C6)	Geomor	phic Position	(D2)
Iron Deposits (B5)		Thin M	luck Surface (C7)		Shallow	Aquitard (D3)	
Inundation Visible on Ae	erial Imagery (B7	) Other (	(Explain in Remarks)		Microtop	ographic Reli	ef (D4)
Sparsely Vegetated Concave Surface (B8)						utral Test (D5	)
Field Observations:							
Surface Water Present?	Yes	No X	Depth (inches): 0				
			Death (inches):				
Water Table Present?	Yes	NO X	Depth (Inches): 0				
Water Table Present? Saturation Present?	Yes Yes	No <u>X</u> No X	Depth (inches): 0	Wetlan	d Hydrology	Present?	Yes X No
Water Table Present? Saturation Present? (includes capillary fringe)	Yes Yes	No <u>X</u> No <u>X</u>	Depth (inches): 0	Wetlan	d Hydrology	Present?	Yes X No
Water Table Present? Saturation Present? (includes capillary fringe) Describe Recorded Data (str	Yes Yes ream gauge, mo	No X No X	Depth (inches): 0 Depth (inches): 0 aerial photos, previous insp	Wetlan	d Hydrology available:	Present?	Yes X No
Water Table Present? Saturation Present? (includes capillary fringe) Describe Recorded Data (str	Yes Yes ream gauge, mo	No <u>X</u> No <u>X</u> nitoring well,	Depth (inches): 0 Depth (inches): 0 aerial photos, previous insp	Wetlan ections), if	d Hydrology available:	Present?	Yes <u>X</u> No
Water Table Present? Saturation Present? (includes capillary fringe) Describe Recorded Data (str	Yes Yes ream gauge, mo	No X No X nitoring well,	Depth (inches): 0 Depth (inches): 0 aerial photos, previous insp	Wetlan ections), if	d Hydrology available:	Present?	Yes <u>X</u> No
Water Table Present? Saturation Present? (includes capillary fringe) Describe Recorded Data (str Remarks:	Yes Yes ream gauge, mo	NO X NO X	Depth (inches): 0 Depth (inches): 0 aerial photos, previous insp	Wetlan ections), if	d Hydrology available:	Present?	Yes <u>X</u> No
Water Table Present? Saturation Present? (includes capillary fringe) Describe Recorded Data (str Remarks:	Yes Yes ream gauge, mo	NO X NO X	Depth (inches): 0 Depth (inches): 0 aerial photos, previous insp	Wetlan ections), if	d Hydrology available:	Present?	Yes <u>X</u> No
Water Table Present? Saturation Present? (includes capillary fringe) Describe Recorded Data (str Remarks:	Yes Yes ream gauge, mo	NO X No X	Depth (inches): 0 Depth (inches): 0 aerial photos, previous insp	Wetlan ections), if	d Hydrology available:	Present?	Yes <u>X</u> No
Water Table Present? Saturation Present? (includes capillary fringe) Describe Recorded Data (str Remarks:	Yes Yes ream gauge, mo	NO X NO X	Depth (inches): 0 Depth (inches): 0 aerial photos, previous insp	Wetlan ections), if	d Hydrology available:	Present?	Yes <u>X</u> No
Water Table Present? Saturation Present? (includes capillary fringe) Describe Recorded Data (str Remarks:	Yes Yes ream gauge, mo	NO X NO X	Depth (inches): 0 Depth (inches): 0 aerial photos, previous insp	Wetlan ections), if	d Hydrology available:	Present?	Yes <u>X</u> No
Water Table Present? Saturation Present? (includes capillary fringe) Describe Recorded Data (str Remarks:	Yes Yes ream gauge, mo	NO X NO X	Depth (inches): 0 Depth (inches): 0 aerial photos, previous insp	Wetlan ections), if	d Hydrology available:	Present?	Yes <u>X</u> No
Water Table Present? Saturation Present? (includes capillary fringe) Describe Recorded Data (str Remarks:	Yes Yes ream gauge, mo	NO X NO X nitoring well,	Depth (inches): 0 Depth (inches): 0 aerial photos, previous insp	Wetlan ections), if	d Hydrology available:	Present?	Yes <u>X</u> No
Water Table Present? Saturation Present? (includes capillary fringe) Describe Recorded Data (str Remarks:	Yes Yes ream gauge, mo	NO X NO X	Depth (inches): 0 Depth (inches): 0 aerial photos, previous insp	Wetlan ections), if	d Hydrology available:	Present?	Yes <u>X</u> No
Water Table Present? Saturation Present? (includes capillary fringe) Describe Recorded Data (str Remarks:	Yes Yes ream gauge, mo	NO X NO X	Depth (inches): 0 Depth (inches): 0 aerial photos, previous insp	Wetlan ections), if	d Hydrology available:	Present?	Yes <u>X</u> No

Sampling Point: D-W

I         Fractions         paramise         40         Yes         FACW           2.         Acer rubrum         40         Yes         FACW         Number of Dominant Species           3.	Tree Stratum (Plot size: 30)	Absolute % Cover	Dominant Species?	Indicator Status	Dominance Test worksheet:
2         Accurate with the second secon	1. Fraxinus pennsylvanica	40	Yes	FACW	
3	2 Acer rubrum	40	Yes	FAC	Number of Dominant Species That Are OBL_EACW_or EAC: 5 (A)
4.	3				
S.	4				Total Number of Dominant Species Across All Strata: 6 (B)
6	5				
7.	6				Percent of Dominant Species That Are OBL_EACW_or EAC: 83.3% (A/B)
80         =Total Cover         Total % Cover cf.         Multiply by:           Saping/Shrub Stratum (Plot size:15)         15         Yes         FAC         FACU species	7.				Prevalence Index worksheet:
Saping/Shrub Stratum (Plot size: 15)       15       Yes       FAC         1. Rhamnus cathartica       15       Yes       FACU         2. Lonicera morrowii       5       Yes       FACU         3		80	=Total Cover		Total % Cover of: Multiply by:
1       Rhammus cathartica       15       Yes       FAC       FACW species       40       x 2 =       80         2.       Lonicera morrowii       5       Yes       FACU       FACU species       70       x 3 =       210         3.	Sapling/Shrub Stratum (Plot size: 15 )				OBL species 5 $x 1 = 5$
2.       Lonicera morrowii       5       Yes       FACU       FAC species       70       x 3 =       210         3.	1. Rhamnus cathartica	15	Yes	FAC	FACW species $40   x^2 = 80$
3.	2. Lonicera morrowii	5	Yes	FACU	FAC species 70 $x 3 = 210$
4.	3.				FACU species 5 $x 4 = 20$
5.	4.				UPL species $0 \times 5 = 0$
6.	5.				Column Totals: 120 (A) 315 (B)
7.	6.				$\frac{1}{2.63}$
20       =Total Cover       1 - Rapid Test for Hydrophytic Vegetation         X       2 - Dominance Test is >50%       X - Dominance Test is >50%         2.       Carex sp.       5       Yes       OBL       4 - Morphological Adaptations' (Provide suppor data in Remarks or on a separate sheet)         4.	7.				Hydrophytic Vegetation Indicators:
Herb Stratum       (Plot size: 5 )         1.       Toxicodendron radicans         2.       Carex sp.         3.       5         4.		20	=Total Cover		1 - Rapid Test for Hydrophytic Vegetation
1.       Toxicodendron radicans       15       Yes       FAC         2.       Carex sp.       5       Yes       OBL       4.       Morphological Adaptations <sup>1</sup> (Provide suppor data in Remarks or on a separate sheet)         4.	Herb Stratum (Plot size: 5)				X 2 - Dominance Test is >50%
2.       Carex sp.       5       Yes       OBL       4	1. Toxicodendron radicans	15	Yes	FAC	X 3 - Prevalence Index is $\leq 3.0^1$
a.	2. Carex sp.	5	Yes	OBL	4 - Morphological Adaptations <sup>1</sup> (Provide supporting
4.	3.				data in Remarks or on a separate sheet)
5.	4.				Problematic Hydrophytic Vegetation <sup>1</sup> (Explain)
6.	5.				
7.	6.				Indicators of hydric soil and wetland hydrology must be present, unless disturbed or problematic.
8.	7				Definitions of Vegetation Strata:
main	8				
10.	9.				<b>Tree</b> – Woody plants 3 in. (7.6 cm) or more in diameter at breast height (DBH), regardless of height.
Sapling/shrub – Woody plants less than 3 in. DBH         11.	10.				
12.	11.				Sapling/shrub – Woody plants less than 3 in. DBH and greater than or equal to 3.28 ft (1 m) tall.
20       =Total Cover       Herb – All herbaceous (non-woody) plants, regardle of size, and woody plants less than 3.28 ft tall.         Woody Vine Stratum       (Plot size:)       .       Woody vines – All woody vines greater than 3.28 ft height.         2.       .       .       .       .       .         3.       .       .       .       .       .         4.       .       .       .       .       .         .       .       .       .       .       .         .       .       .       .       .       .         .       .       .       .       .       .         .       .       .       .       .       .         .       .       .       .       .       .         .       .       .       .       .       .         .       .       .       .       .       .         .       .       .       .       .       .         .       .       .       .       .       .         .       .       .       .       .       .         .       .       .       .       .	12.				
Woody Vine Stratum       (Plot size:)         1.		20	=Total Cover		<b>Herb</b> – All herbaceous (non-woody) plants, regardless of size, and woody plants less than 3.28 ft tall.
1.     height.       2.     .       3.     .       4.     .	Woody Vine Stratum (Plot size:)				Woody vines – All woody vines greater than 3.28 ft in
2.	1				height.
3.	2				Hydrophytic
4.      Present?     Yes_XNo      =Total Cover     Remarks: (Include photo numbers here or on a separate sheet.)     No	3				Vegetation
=Total Cover Remarks: (Include photo numbers here or on a separate sheet.)	4				Present? Yes X No
Remarks: (Include photo numbers here or on a separate sheet.)			=Total Cover		
	Remarks: (Include photo numbers here or on a sepa	rate sheet.)			

Profile Desc	cription: (Describe	to the de	pth needed to docu	ument t	he indica	ator or co	onfirm the absence of i	ndicators.)
Depth	 Matrix		Redox	x Featur	res			,
(inches)	Color (moist)	%	Color (moist)	%	Type <sup>1</sup>	Loc <sup>2</sup>	Texture	Remarks
0-7	10YR 2/1	100					Loamy/Clayey	
7-18	7.5YR 4/2	95	7.5YR 4/6	5	С	М	Loamy/Clayey	Prominent redox concentrations
		·						
		· <u> </u>						
		. <u> </u>						
		·						
	·	·						
		·						
		·						
<sup>1</sup> Type: C=C	oncentration, D=Dep	letion, RM	A=Reduced Matrix, N	IS=Mas	ked Sand	d Grains.	<sup>2</sup> Location: PL=	=Pore Lining, M=Matrix.
Hydric Soil	Indicators:			~ ′	(00) (		Indicators for	Problematic Hydric Soils <sup>3</sup> :
Histosol	(A1)		Polyvalue Belo	w Surfa	ce (S8) (I	LRR R,	2 cm Muck	(A10) (LRR K, L, MLRA 149B)
	pipedon (AZ)		Thin Dork Surf	) 200 (SO		MIDA	Coast Prai	rie Redox (A16) (LRR K, L, R)
	Suc (A3)		High Chroma S	ace (39)	) (LKK K 211) /I DE		Polyvalua	$ \begin{array}{c} \text{Polow} \\ \text{Surface} \\ (S8) \\ (I PP K I) \\ \end{array} $
Stratifio	d Lavors (A5)			Minoral	/E1) (LRF	<b>~ ~ , L)</b>	Toiyvalue	Surface (S0) (LRK K, L)
	d Below Dark Surface	ο (Δ11)		Matrix (	(F1) ( <b>ERI</b> (F2)	<b>Υ Ν, Ε</b> )		Surface (39) (LKK K, L) anasa Massas (E12) (LPB K $ $ D)
Thick D	ark Surface (A12)	= (ATT)	X Depleted Matri	™aun⊼ ( v (E3)	12)		Riedmont I	Eloodolain Soils (F10) (MI BA 1/98)
Thick Da	Aucky Mineral (S1)		Depleted Math	^ (I J) Irfaco (F	6)		Nesic Spo	dic (TA6) (MI BA 144A 145 149B)
Sandy G	Sleved Matrix (S4)		Redox Dark St	Surface	0) (F7)		Nesic Opo	$\frac{1}{1} = \frac{1}{1} = \frac{1}$
Sandy E	Peday (S5)		Depieted Dark	sione (E	s (i 7) 8)			(121)
Strippod	Motrix (S6)		Marl (E10) (LP		0)		Othor (Evo	Nain in Romarks)
Dark Su	urface (S7)			IX IX, ⊑)				
<sup>3</sup> Indicators o	of hydrophytic vegetat	tion and v	vetland hydrology mu	ust be pi	resent, ur	nless dist	urbed or problematic.	
Restrictive	Layer (if observed):							
Type:								
Depth (i	nches):						Hydric Soil Present	? Yes <u>X</u> No
Remarks:								
This data for	rm is revised from No	orthcentra	I and Northeast Regi	ional Su	ipplemen	t Version	2.0 to include the NRCS	S Field Indicators of Hydric Soils,
version 7.0,	2015 Errata. (http://v	www.nrcs	usda.gov/Internet/Ft	SE_DOU	JUMENT	S/nrcs14	2p2_051293.docx)	

Project/Site: Land Release for Fut	ture Development	City/County: Cicero/	Onondaga	San	npling Date: I	<i>I</i> lay 9, 2019
Applicant/Owner: Syracuse Re	gional Airport Authority		State:	NY S	ampling Point:	E-W
Investigator(s): Bayer, Bryan		Section, To	wnship, Range:			
Landform (hillside, terrace, etc.):	Depression	Local relief (concave, conve	x, none): <u>Concav</u>	е	Slope	%: 1-3
Subregion (LRR or MLRA): LRR I	∟ Lat: <u>43° 7' </u>	50.75" Long:	76° 4' 36.94"		Datum:	NGS 84
Soil Map Unit Name: Palms muck			NWI classifi	cation: PF	O1C	
Are climatic / hydrologic conditions	on the site typical for this time	e of year? Yes X	No	(If no, expla	in in Remarks	.)
Are Vegetation, Soil	, or Hydrologysignific	antly disturbed? Are "Norn	nal Circumstances	s" present?	Yes X	No
Are Vegetation, Soil	, or Hydrology natural	ly problematic? (If needed	l, explain any ans	wers in Rer	marks.)	
SUMMARY OF FINDINGS -	- Attach site map show	ving sampling point locat	ions, transec	ts, impoi	rtant featur	es, etc.
Hydrophytic Vegetation Present?	Yes X No	Is the Sampled A	rea			
Hydric Soil Present?	Yes X No	within a Wetland	? Yes	X No	) <u> </u>	
Wetland Hydrology Present?	Yes X No	If yes, optional We	tland Site ID:			
Remarks: (Explain alternative proc	cedures here or in a separate	report.)				

HYDROLOGY	
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Wetland Hydrology Indicators:							Secondary Indicators (min	imum of two required)		
Primary Indicators (minimum of one is required; check all that apply)							Surface Soil Cracks (B6)			
X Surface Water (A1)	Surface Water (A1) Water-Stained Leaves (B9)							Drainage Patterns (B10)		
X High Water Table (A2)			Aqu	atic Fauna (B13)			Moss Trim Lines (B16)			
X Saturation (A3)			Mar	l Deposits (B15)			Dry-Season Water Ta	ble (C2)		
X Water Marks (B1)			Hyd	rogen Sulfide Odor (C1)	)		Crayfish Burrows (C8)	)		
Sediment Deposits (B2)			Oxic	dized Rhizospheres on L	_iving Roots (C	C3)	Saturation Visible on A	Aerial Imagery (C9)		
Drift Deposits (B3)			Pres	sence of Reduced Iron (	C4)		Stunted or Stressed F	Plants (D1)		
Algal Mat or Crust (B4)			Rec	ent Iron Reduction in Til	lled Soils (C6)	)	Geomorphic Position	(D2)		
Iron Deposits (B5)			Thin	Muck Surface (C7)			Shallow Aquitard (D3)			
X Inundation Visible on Aer	ial Ima	gery (B	37) Othe	er (Explain in Remarks)			Microtopographic Reli	ef (D4)		
Sparsely Vegetated Cond	cave Su	urface (	(B8)				X FAC-Neutral Test (D5	)		
Field Observations:										
Surface Water Present?	Yes	Х	No	Depth (inches):	4					
Water Table Present?	Yes	Х	No	Depth (inches):	0					
	uration Present? Yes X No Depth (inches): 0 Wetlar									
Saturation Present?	Yes	Х	No	Depth (inches):	0 We	etlan	d Hydrology Present?	Yes X No		
Saturation Present? (includes capillary fringe)	Yes	Х	No	Depth (inches):	0 We	etlan	d Hydrology Present?	Yes X No		
Saturation Present? (includes capillary fringe) Describe Recorded Data (stre	Yes eam ga	X uge, m	No	Depth (inches):	0 We	etlan s), if a	d Hydrology Present?	Yes <u>X</u> No		
Saturation Present? (includes capillary fringe) Describe Recorded Data (stre	Yes	X uge, m	No	Depth (inches):	0 We	etlan s), if a	d Hydrology Present? available:	Yes <u>X</u> No		
Saturation Present? (includes capillary fringe) Describe Recorded Data (stre	Yes	X uge, m	No	Depth (inches):	0 We	etlan s), if a	d Hydrology Present? available:	Yes <u>X</u> No		
Saturation Present? (includes capillary fringe) Describe Recorded Data (stree Remarks:	Yes	X uge, m	No	Depth (inches):	0 We	etlan s), if a	d Hydrology Present? available:	Yes <u>X</u> No		
Saturation Present? (includes capillary fringe) Describe Recorded Data (stre Remarks:	Yes	X uge, m	No	Depth (inches):	0 We	etlan s), if a	d Hydrology Present? available:	Yes <u>X</u> No		
Saturation Present? (includes capillary fringe) Describe Recorded Data (stre Remarks:	Yes	X uge, m	No	Depth (inches):	0 We	etlan s), if a	d Hydrology Present? available:	Yes <u>X</u> No		
Saturation Present? (includes capillary fringe) Describe Recorded Data (stree Remarks:	Yes	X uge, m	No	Depth (inches):	0 We	etlan s), if a	d Hydrology Present? available:	Yes <u>X</u> No		
Saturation Present? (includes capillary fringe) Describe Recorded Data (stree Remarks:	Yes	X uge, m	No	Depth (inches):	0 We	etlan s), if a	d Hydrology Present? available:	Yes <u>X</u> No		
Saturation Present? (includes capillary fringe) Describe Recorded Data (stree Remarks:	Yes	X uge, m	No	Depth (inches):	0 We	etlan s), if a	d Hydrology Present? available:	Yes <u>X</u> No		
Saturation Present? (includes capillary fringe) Describe Recorded Data (stre Remarks:	Yes	X uge, m	No	Depth (inches):	0 We	etlan s), if a	d Hydrology Present? available:	Yes <u>X</u> No		
Saturation Present? (includes capillary fringe) Describe Recorded Data (stre Remarks:	Yes	X uge, m	No	Depth (inches):	0 We	etlan	d Hydrology Present? available:	Yes <u>X</u> No		
Saturation Present? (includes capillary fringe) Describe Recorded Data (stre Remarks:	Yes	X uge, m	No	Depth (inches):	0 We	etlan	d Hydrology Present? available:	Yes <u>X</u> No		

Sampling Point: E-W

Trop Stratum (Dist size: 20	Absolute	Dominant Species 2	Indicator	Dominanaa Taat warkabaat
<u>1 Acor rubrum</u> (PIOL SIZE: <u>30</u> )	% Cover	Species?	SIATUS	Dominance rest worksneet:
	20	Vac		Number of Dominant Species
2. Fraxinus pennsylvanica	20	res		That Are OBL, FACW, of FAC:3 (A)
3. Uimus americana	10	NO	FACW	Total Number of Dominant Species Across All Strata: 3 (B)
5.				
6.				Percent of Dominant Species That Are OBL, FACW, or FAC: 100.0% (A/B)
7.				Prevalence Index worksheet:
	90	=Total Cover		Total % Cover of: Multiply by:
Sapling/Shrub Stratum (Plot size: 15 )				OBL species 0 x 1 = 0
1. Fraxinus pennsylvanica	5	Yes	FACW	FACW species 35 x 2 = 70
2				FAC species 60 x 3 = 180
3				FACU species x 4 =
4				UPL species 0 x 5 = 0
5				Column Totals: 95 (A) 250 (B)
6				Prevalence Index = B/A = 2.63
7				Hydrophytic Vegetation Indicators:
	5	=Total Cover		1 - Rapid Test for Hydrophytic Vegetation
Herb Stratum (Plot size: 5 )				X 2 - Dominance Test is >50%
1				X 3 - Prevalence Index is ≤3.0 <sup>1</sup>
2				4 - Morphological Adaptations <sup>1</sup> (Provide supporting
3				data in Remarks or on a separate sheet)
4				Problematic Hydrophytic Vegetation <sup>1</sup> (Explain)
5				<sup>1</sup> Indicators of hydric soil and wetland hydrology must
6				be present, unless disturbed or problematic.
7				Definitions of Vegetation Strata:
8				Tree – Woody plants 3 in. (7.6 cm) or more in
9				diameter at breast height (DBH), regardless of height.
10				Sapling/shrub – Woody plants less than 3 in. DBH
11				and greater than or equal to 3.28 ft (1 m) tall.
12				Herb – All herbaceous (non-woody) plants, regardless
		= I otal Cover		of size, and woody plants less than 3.28 ft tall.
<u>vvoody vine Stratum</u> (Plot size:)				Woody vines – All woody vines greater than 3.28 ft in height.
2.				
3				Hydrophytic
4.				Vegetation Present? Yes X No
		=Total Cover		
Remarks: (Include photo numbers here or on a sepa	rate sheet.)			1
	, , ,			

Depth	Matrix		Redo	x Featu	res			
(inches)	Color (moist)	%	Color (moist)	%	Type <sup>1</sup>	Loc <sup>2</sup>	Texture	Remarks
0-18	10YR 2/1	100					Mucky Loam/Clay	
		<u> </u>						
<sup>1</sup> Type: C=Co	oncentration, D=Dep	letion, RM	=Reduced Matrix, N	NS=Mas	ked San	d Grains	<sup>2</sup> Location: PL:	=Pore Lining, M=Matrix.
Hydric Soil I Histosol	ndicators: (A1)		Polyvalue Belo	ow Surfa	ice (S8) (	LRR R,	Indicators for 2 cm Muc	r Problematic Hydric Soils <sup>3</sup> : k (A10) (LRR K, L, MLRA 149B)
Histic Ep	ipedon (A2)		MLRA 149B	8)			Coast Pra	irie Redox (A16) ( <b>LRR K, L, R</b> )
Black His	stic (A3)		Thin Dark Surf	face (S9	) (LRR R	R, MLRA	149B) 5 cm Muc	ky Peat or Peat (S3) (LRR K, L, R)
Hydroger	n Sulfide (A4)		High Chroma	Sands (S	511) ( <b>LR</b>	R K, L)	Polyvalue	Below Surface (S8) (LRR K, L)
Stratified	Layers (A5)		X Loamy Mucky	Mineral	(F1) ( <b>LR</b>	R K, L)	Thin Dark	Surface (S9) (LRR K, L)
Depleted	Below Dark Surface	e (A11)	Loamy Gleyed	Matrix (	(F2)		Iron-Mang	janese Masses (F12) ( <b>LRR K, L, R</b>
Thick Da	rk Surface (A12)		Depleted Matr	ix (F3)			Piedmont	Floodplain Soils (F19) (MLRA 149
Sandy M	ucky Mineral (S1)		Redox Dark S	urface (F	=6)		Mesic Spo	odic (TA6) ( <b>MLRA 144A, 145, 149E</b>
Sandy G	leyed Matrix (S4)		Depleted Dark	Surface	e (F7)		Red Parer	nt Material (F21)
Sandy R	edox (S5)		Redox Depres	sions (F	8)		Very Shal	low Dark Surface (F22)
Stripped	Matrix (S6)		Marl (F10) (LR	R K, L)			Other (Exp	plain in Remarks)
Dark Sur	face (S7)							
<sup>3</sup> Indicators of Restrictive	hydrophytic vegetat	ion and w	etland hydrology m	ust be p	resent, u	nless dis	turbed or problematic.	
Type:								
Depth (in	iches):						Hydric Soil Present	? Yes <u>X</u> No
Remarks:							-	
This data forr Version 7.0, 2	m is revised from No 2015 Errata. (http://v	orthcentral www.nrcs.u	and Northeast Reg isda.gov/Internet/F	ional Su SE_DO	ipplemen CUMENT	nt Versior S/nrcs14	n 2.0 to include the NRCS 42p2_051293.docx)	S Field Indicators of Hydric Soils,

Project/Site: Land R	elease for Fut	ture Developmer	nt	City/County: Cicero/	Onondaga		Sampling Date: M	lay 9, 2019
Applicant/Owner:	Syracuse Re	gional Airport A	uthority		State:	NY	Sampling Point:	F/G-U
Investigator(s): Baye	r, Bryan			Section, Tov	wnship, Range:			
Landform (hillside, ter	race, etc.):	Terrace	Local	relief (concave, conve	x, none): <u>None</u>		Slope 9	%: <u>1-3</u>
Subregion (LRR or M	LRA): LRR I		Lat: 43° 7' 33.57"	Long:	76° 4' 54.75"		Datum: V	VGS 84
Soil Map Unit Name:	Niagara silt l	oam			NWI classi	fication:		
Are climatic / hydrolog	gic conditions	on the site typica	al for this time of year?	Yes X	No	(If no, o	explain in Remarks.	)
Are Vegetation	, Soil	, or Hydrology	significantly disturb	bed? Are "Norm	nal Circumstance	es" pres	ent? Yes <u>X</u> I	No
Are Vegetation	, Soil	, or Hydrology	naturally problema	tic? (If needed	l, explain any an	swers ir	ו Remarks.)	
SUMMARY OF F	INDINGS -	- Attach site	map showing sam	pling point locat	ions, transe	cts, in	portant feature	es, etc.

Hydrophytic Vegetation Present?	Yes	No X	Is the Sampled Area
Hydric Soil Present?	Yes	No X	within a Wetland? Yes No X
Wetland Hydrology Present?	Yes	No X	If yes, optional Wetland Site ID:
Remarks: (Explain alternative procedures h	ere or in a se	eparate rep	port.)

Wetland Hydrology Indicators:		<u>S</u>	econdary Indicators (min	imum of two required)	
Primary Indicators (minimum of one is req		Surface Soil Cracks (B6)			
Surface Water (A1)	Water-Stained Leaves (B9)		Drainage Patterns (B10)		
High Water Table (A2)	Aquatic Fauna (B13)		Moss Trim Lines (B16)		
Saturation (A3)	Marl Deposits (B15)		Dry-Season Water Ta	ble (C2)	
Water Marks (B1)	Hydrogen Sulfide Odor (C1)		Crayfish Burrows (C8)	1	
Sediment Deposits (B2)	Oxidized Rhizospheres on Living Ro	ots (C3)	Saturation Visible on A	Aerial Imagery (C9)	
Drift Deposits (B3)	Presence of Reduced Iron (C4)		Stunted or Stressed P	lants (D1)	
Algal Mat or Crust (B4)	Recent Iron Reduction in Tilled Soils	(C6)	Geomorphic Position	(D2)	
Iron Deposits (B5)	Thin Muck Surface (C7)		Shallow Aquitard (D3)		
Inundation Visible on Aerial Imagery (	B7) Other (Explain in Remarks)		Microtopographic Reli	ef (D4)	
Sparsely Vegetated Concave Surface	(B8)		FAC-Neutral Test (D5	)	
Field Observations:					
Surface Water Present? Yes	No X Depth (inches):				
Water Table Present? Yes	No X Depth (inches):				
Saturation Present? Yes	No X Depth (inches):	Wetland	Hydrology Present?	Yes No X	
(includes capillary fringe)					
Describe Recorded Data (stream gauge, r	nonitoring well, aerial photos, previous inspec	ctions), if ava	ailable:		
Remarks:					

Sampling Point: F/G-U

Tree Stratum (Plot size: 30 )	Absolute % Cover	Dominant	Indicator Status	Dominance Test worksheet:
1. Picea abies	50	Yes	UPI	
2 Acer saccharum	25	Yes	FACU	Number of Dominant Species That Are OBL_EACW_or_EAC: 0 (A)
3 Populus tremula	15	No	FAC	
2		110	TAO	Total Number of Dominant Species Across All Strata: 3 (B)
5				
6				Percent of Dominant Species That Are OBL_EACW_or_EAC: 0.0% (A/B)
7.				Prevalence Index worksheet:
	90 :	=Total Cover		Total % Cover of: Multiply by:
Sapling/Shrub Stratum (Plot size: 15 )				$\begin{array}{c c} \hline \\ \hline $
1. Lonicera morrowii	5	Yes	FACU	FACW species $0   x 2 = 0$
2.				FAC species $15 \times 3 = 45$
3.				FACU species 30 x 4 = 120
4.				UPL species $50 \times 5 = 250$
5.				Column Totals: 95 (A) 415 (B)
6.				Prevalence Index = $B/A = 4.37$
7.				Hydrophytic Vegetation Indicators:
	5	=Total Cover		1 - Rapid Test for Hydrophytic Vegetation
Herb Stratum (Plot size: 5)				2 - Dominance Test is >50%
1.				3 - Prevalence Index is ≤3.0 <sup>1</sup>
2.				4 - Morphological Adaptations <sup>1</sup> (Provide supporting
3.				data in Remarks or on a separate sheet)
4.				Problematic Hydrophytic Vegetation <sup>1</sup> (Explain)
5.				The directory of hundring on it and writing a hundred are report.
6.				be present, unless disturbed or problematic.
7.				Definitions of Vegetation Strata:
8.				<b>Tree</b> Weady plants 2 in (7.6 cm) or more in
9.				diameter at breast height (DBH), regardless of height.
10.				Sanling/chrub Woody plants loss than 3 in DRH
11.				and greater than or equal to 3.28 ft (1 m) tall.
12.				Herb - All berbaceous (non-woody) plants, regardless
	:	=Total Cover		of size, and woody plants less than 3.28 ft tall.
Woody Vine Stratum (Plot size:)				Woody vines - All woody vines greater than 3.28 ft in
1				height.
2.				
3.				Hydrophytic Vegetation
4.				Present? Yes No X
	:	=Total Cover		
Remarks: (Include photo numbers here or on a separation	rate sheet.)			

Profile Desc	ription: (Describe	to the dep	th needed to docu	ument tl	he indica	tor or co	onfirm the absence of i	ndicators.)	
Depth	Matrix		Redo	x Featur	es				
(inches)	Color (moist)	%	Color (moist)	%	Type <sup>1</sup>	Loc <sup>2</sup>	Texture	Rema	rks
0-18	10YR 3/3	100					Loamy/Clavey		
	10110/0	100					Loanty/Oldycy		
<sup>1</sup> Type: C=Co	oncentration, D=Dep	letion, RM=	Reduced Matrix, N	/IS=Mas	ked Sand	Grains.	<sup>2</sup> Location: PL=	Pore Lining, M=M	atrix.
Hydric Soil	Indicators:						Indicators for	Problematic Hydi	ic Soils <sup>3</sup> :
Histosol	(A1)	_	Polyvalue Belo	w Surfa	ce (S8) (I	LRR R,	2 cm Mucl	(A10) ( <b>LRR K, L,</b>	MLRA 149B)
Histic Ep	oipedon (A2)	-	MLRA 149B	)			Coast Prai	rie Redox (A16) (L	RR K, L, R)
Black Hi	stic (A3)		Thin Dark Surf	ace (S9)	) (LRR R	, MLRA 1	49B) 5 cm Mucł	y Peat or Peat (S3	6) (LRR K, L, R)
Hydroge	n Sulfide (A4)	-	High Chroma S	Sands (S	611) ( <b>LRF</b>	R K, L)	Polyvalue	Below Surface (S8	) (LRR K, L)
Stratified	Layers (A5)	-	Loamy Mucky	Mineral	(F1) ( <b>LRI</b>	R K, L)	Thin Dark	Surface (S9) (LRR	<b>K</b> , L)
Depleted	Below Dark Surface	e (A11)	Loamy Gleyed	Matrix (	F2)		Iron-Mang	anese Masses (F1)	2) ( <b>LRR K, L, R</b> )
Thick Da	ark Surface (A12)	· · · -	Depleted Matri	x (F3)			Piedmont	Floodplain Soils (F	19) ( <b>MLRA 149B</b> )
Sandy M	lucky Mineral (S1)	-	Redox Dark Su	urface (F	<sup>-</sup> 6)		Mesic Spo	dic (TA6) ( <b>MLRA 1</b>	44A, 145, 149B)
Sandy G	ileved Matrix (S4)	-	Depleted Dark	Surface	, (F7)		Red Paren	t Material (F21)	,
Sandy R	edox (S5)	-	Redox Depress	sions (Fa	8)		Verv Shall	ow Dark Surface (F	-22)
Stripped	Matrix (S6)	-	Marl (F10) (LR	R K. L)	-,		Other (Exc	lain in Remarks)	,
Dark Su	rface (S7)	-		, _, _,					
<sup>3</sup> Indicators of	f hydrophytic vegetat	ion and we	tland hydrology mu	ist he pr	resent ur	nless dist	urbed or problematic		
Restrictive I	aver (if observed)		liana nyarology ina		00011, 0				
Type:									
- 1)po.								- · ·	
Depth (ir	nches):						Hydric Soil Present	? Yes	NoX
Remarks:									
This data for	m is revised from No	orthcentral a	and Northeast Reg	ional Su	pplemen	t Version	2.0 to include the NRCS	Field Indicators of	f Hydric Soils,
Version 7.0,	2015 Errata. (http://v	ww.nrcs.u	sda.gov/Internet/FS	SE_DOC	CUMENT	S/nrcs14	2p2_051293.docx)		

Project/Site: Land Release for Future Development	City/County: Cicero/Onondaga Sampling Date: May 9, 2019
Applicant/Owner: Syracuse Regional Airport Authority	State: NY Sampling Point: F-W
Investigator(s): Bayer, Bryan	Section, Township, Range:
Landform (hillside, terrace, etc.): Depression	Local relief (concave, convex, none): Concave Slope %: 1-3
Subregion (LRR or MLRA): LRR L Lat: 43° 7' 34.6	6" Long: <u>76° 4' 48.94</u> " Datum: <u>WGS 84</u>
Soil Map Unit Name: Niagara silt Ioam	NWI classification:
Are climatic / hydrologic conditions on the site typical for this time of	year? Yes X No (If no, explain in Remarks.)
Are Vegetation, Soil, or Hydrologysignificantly	v disturbed? Are "Normal Circumstances" present? Yes X No
Are Vegetation, Soil, or Hydrologynaturally pr	oblematic? (If needed, explain any answers in Remarks.)
SUMMARY OF FINDINGS – Attach site map showing	sampling point locations, transects, important features, etc.
Hydrophytic Vegetation Present? Yes X No	Is the Sampled Area
Hydric Soil Present? Yes X No	within a Wetland? Yes X No
Wetland Hydrology Present? Yes X No	If yes, optional Wetland Site ID:
Remarks: (Explain alternative procedures here or in a separate rep	ort.)

Wetland Hydrology Indicators:		Secondary Indicators (minimum of two required)
Primary Indicators (minimum of one is requir	ed; check all that apply)	Surface Soil Cracks (B6)
Surface Water (A1)	Drainage Patterns (B10)	
X High Water Table (A2)	Aquatic Fauna (B13)	Moss Trim Lines (B16)
X Saturation (A3)	Dry-Season Water Table (C2)	
Water Marks (B1)	Crayfish Burrows (C8)	
Sediment Deposits (B2)	ots (C3) Saturation Visible on Aerial Imagery (C9)	
Drift Deposits (B3)	Presence of Reduced Iron (C4)	Stunted or Stressed Plants (D1)
Algal Mat or Crust (B4)	Recent Iron Reduction in Tilled Soils	(C6) Geomorphic Position (D2)
Iron Deposits (B5)	Thin Muck Surface (C7)	Shallow Aquitard (D3)
Inundation Visible on Aerial Imagery (B7	) Other (Explain in Remarks)	Microtopographic Relief (D4)
Sparsely Vegetated Concave Surface (B	8)	X FAC-Neutral Test (D5)
Field Observations:		
Surface Water Present? Yes	No X Depth (inches): 0	
Water Table Present? Ves X		
	No Deptil (incres). 0	
Saturation Present? Yes X	No Depth (inches): 7	Wetland Hydrology Present? Yes X No
Saturation Present? Yes X (includes capillary fringe)	No Depth (inches): 7	Wetland Hydrology Present? Yes X No
Saturation Present?     Yes     X       (includes capillary fringe)     Describe Recorded Data (stream gauge, mo	No Depth (inches): nitoring well, aerial photos, previous inspect	Wetland Hydrology Present? Yes X No
Saturation Present?       Yes       X         (includes capillary fringe)	No Depth (inches):7	Wetland Hydrology Present?     Yes X     No       tions), if available:
Saturation Present?     Yes     X       (includes capillary fringe)	No Depth (inches): 7	Wetland Hydrology Present? Yes X No
Saturation Present?     Yes     X       (includes capillary fringe)     Describe Recorded Data (stream gauge, mo       Remarks:	No Depth (inches):7	Wetland Hydrology Present? Yes X No
Valer Face Fresent:     Fes     X       Saturation Present?     Yes     X       (includes capillary fringe)     Describe Recorded Data (stream gauge, mo       Remarks:	No Depth (inches):7	Wetland Hydrology Present? Yes X No
Saturation Present?     Yes     X       (includes capillary fringe)     Describe Recorded Data (stream gauge, mo       Remarks:	No Depth (inches):7	Wetland Hydrology Present? Yes X No
Saturation Present?     Yes     X       (includes capillary fringe)	No Depth (inches): 7	Wetland Hydrology Present? Yes X No
Saturation Present?       Yes       X         (includes capillary fringe)	No Depth (inches): nitoring well, aerial photos, previous inspect	Wetland Hydrology Present? Yes X No tions), if available:
Saturation Present?     Yes     X       (includes capillary fringe)	No Depth (inches): nitoring well, aerial photos, previous inspect	Wetland Hydrology Present? Yes X No tions), if available:
Saturation Present?     Yes     X       (includes capillary fringe)     Image: Capillary fringe)       Describe Recorded Data (stream gauge, model)       Remarks:	No Depth (inches): nitoring well, aerial photos, previous inspect	Wetland Hydrology Present? Yes X No tions), if available:
Saturation Present?     Yes     X       (includes capillary fringe)     Describe Recorded Data (stream gauge, mo       Remarks:	No Depth (inches): nitoring well, aerial photos, previous inspect	Wetland Hydrology Present? Yes X No tions), if available:
Saturation Present?       Yes X         (includes capillary fringe)         Describe Recorded Data (stream gauge, mo         Remarks:	No Depth (inches): nitoring well, aerial photos, previous inspect	Wetland Hydrology Present? Yes X No tions), if available:

Sampling Point: F-W

Tree Stratum (Plot size: 30)	Absolute % Cover	Dominant Species?	Indicator Status	Dominance Test worksheet:
1. Acer rubrum	60	Yes	FAC	New Joseph Construction
2. Fraxinus pennsylvanica	10	No	FACW	That Are OBL, FACW, or FAC: 5 (A)
3.				Total Number of Demission
4.				Species Across All Strata: 6 (B)
5.				Percent of Deminant Species
6.				That Are OBL, FACW, or FAC: 83.3% (A/B)
7.				Prevalence Index worksheet:
	70	=Total Cover		Total % Cover of: Multiply by:
Sapling/Shrub Stratum (Plot size: 15 )				OBL species 10 x 1 = 10
1. Rhamnus cathartica	5	Yes	FAC	FACW species 12 x 2 = 24
2. Cornus racemosa	5	Yes	FAC	FAC species 70 x 3 = 210
3. Lonicera morrowii	5	Yes	FACU	FACU species <u>5</u> x 4 = <u>20</u>
4				UPL species 0 x 5 = 0
5				Column Totals: 97 (A) 264 (B)
6				Prevalence Index = B/A = 2.72
7				Hydrophytic Vegetation Indicators:
	15	=Total Cover		1 - Rapid Test for Hydrophytic Vegetation
Herb Stratum (Plot size: 5 )				X 2 - Dominance Test is >50%
1. Juncus effusus	5	Yes	OBL	X 3 - Prevalence Index is $\leq 3.0^{1}$
2. Scirpus atrovirens	5	Yes	OBL	4 - Morphological Adaptations <sup>1</sup> (Provide supporting
3. Ulmus americana	2	No	FACW	data in Remarks or on a separate sheet)
4				Problematic Hydrophytic Vegetation <sup>1</sup> (Explain)
5				<sup>1</sup> Indicators of hydric soil and wetland hydrology must
6				be present, unless disturbed or problematic.
7				Definitions of Vegetation Strata:
8				Tree – Woody plants 3 in. (7.6 cm) or more in
9				diameter at breast height (DBH), regardless of height.
10				Sapling/shrub – Woody plants less than 3 in. DBH
11				and greater than or equal to 3.28 ft (1 m) tall.
12	12	=Total Cover		<b>Herb</b> – All herbaceous (non-woody) plants, regardless of size, and woody plants less than 3.28 ft tall.
Woody Vine Stratum (Plot size: )				Weady vince All weady vince greater than 2.28 ft in
1				height.
2.				
3.				Hydrophytic Vegetation
4				Present? Yes X No
		=Total Cover		
Remarks: (Include photo numbers here or on a separ	ate sheet.)			•

# SOIL

Profile Desc	cription: (Describe	to the dep	oth needed to docu	ument th	ne indica	tor or co	onfirm the absence o	f indicators.)		
Depth	Matrix		Redo	x Featur	es					
(inches)	Color (moist)	%	Color (moist)	%	Type <sup>1</sup>	Loc <sup>2</sup>	Texture	Remarks		
0-6	10YR 4/2	90	7.5YR 4/6	10	С	PL	Loamy/Clayey	Prominent redox concentrations		
6-18	10YR 5/2	90	10YR 6/3	10	C	M	Loamy/Clayey	Faint redox concentrations		
		·								
		·								
		·								
<sup>1</sup> Type: C=C	oncentration, D=Dep	letion, RM	=Reduced Matrix, N	//S=Masl	ked Sand	Grains.	<sup>2</sup> Location: P	PL=Pore Lining, M=Matrix.		
Hydric Soil	Indicators:						Indicators f	or Problematic Hydric Soils <sup>3</sup> :		
Histosol	(A1)		Polyvalue Belo	ow Surfac	ce (S8) (I	LRR R,	2 cm Mu	uck (A10) ( <b>LRR K, L, MLRA 149B</b> )		
Histic E	pipedon (A2)		MLRA 149B	5)			Coast P	rairie Redox (A16) (LRR K, L, R)		
Black Hi	istic (A3)		Thin Dark Surf	ace (S9)	(LRR R	, MLRA 1	149B)5 cm Mu	ucky Peat or Peat (S3) (LRR K, L, R)		
Hydroge	en Sulfide (A4)		High Chroma S	Sands (S	11) ( <b>LRF</b>	R K, L)	Polyvalu	e Below Surface (S8) (LRR K, L)		
Stratified	d Layers (A5)		Loamy Mucky	Mineral (	(F1) ( <b>LR</b>	R K, L)	Thin Da	rk Surface (S9) (LRR K, L)		
Deplete	d Below Dark Surface	e (A11)	Loamy Gleyed	Matrix (I	F2)		Iron-Mar	nganese Masses (F12) (LRR K, L, R)		
Thick Da	ark Surface (A12)		X Depleted Matri	ix (F3)			Piedmor	nt Floodplain Soils (F19) ( <b>MLRA 149B</b> )		
Sandy M	/lucky Mineral (S1)		Redox Dark Su	urface (F	6)		Mesic S	podic (TA6) ( <b>MLRA 144A, 145, 149B</b> )		
Sandy G	Bleyed Matrix (S4)		Depleted Dark	Surface	(F7)		Red Parent Material (F21)			
Sandy R	Redox (S5)		Redox Depress	sions (F8	3)		Very Shallow Dark Surface (F22)			
Stripped	Matrix (S6)		Marl (F10) (I R		-)		Other (Explain in Remarks)			
Dark Su	rface (S7)			in n, ∟)						
<sup>3</sup> Indicators o	f hydrophytic vegetat	tion and w	etland hydrology mu	ust be pr	esent, ur	nless dist	urbed or problematic.			
Restrictive	Layer (if observed):									
Type.										
Depth (i	nches):						Hydric Soil Prese	nt? Yes <u>X</u> No		
Remarks:										
This data for	m is revised from No	orthcentral	and Northeast Reg	ional Su	pplement	t Version	2.0 to include the NR	CS Field Indicators of Hydric Soils,		
Version 7.0,	2015 Errata. (http://v	vww.nrcs.u	usda.gov/Internet/FS	SE_DOC	UMENT	S/nrcs14	2p2_051293.docx)			
1										

ment	City/County:	/: Cicero/	/Onondaga	Sampling Date:	May 9, 2019		
Syracuse Regional Airport Authority State: NY							
Investigator(s): Bayer, Bryan Section, Township, Range:							
Landform (hillside, terrace, etc.): Depression Local relief (concave, convex, none): Concave							
Lat	43° 7' 35.95"	Long:	76° 4' 55.86"		Datum:	WGS 84	
			NWI classif	fication:			
pical for	this time of year? Y	Yes <u>X</u>	No	(lf no, e	explain in Remark	(s.)	
ју	significantly disturbed?	Are "Norr	mal Circumstance	es" prese	ent? Yes X	No	
ју	_naturally problematic? (	(If needeo	d, explain any an	swers in	n Remarks.)		
te ma	p showing sampling poin	nt locat	tions, transed	cts, im	portant featu	ires, etc.	
es X	No Is the Sar	mpled A	rea				
es X	No within a V	Wetland	? Yes	Х	No		
es X	No If yes, opt	tional We	etland Site ID:				
or in a	separate report.)						
	vment vrt Author Lat: ypical for ygy ygy vgy res X res X res X res X res X res X	ment       City/County         irt Authority       Se        Local relief (conca       Local relief (conca        Lat:       43° 7' 35.95"         ypical for this time of year?       Year         ''gy      significantly disturbed?         ''gy      naturally problematic?         ''ite map showing sampling point         ''es       X         ''es       X         X       No         ''es       X         ''es       X	pment       City/County: Cicero/         irt Authority	International content of the section of the sectin of the section of the section of the section	int Authority       City/County: Cicero/Onondaga         irt Authority       State: NY	ment       City/County: Cicero/Onondaga       Sampling Date:         It Authority       State: NY       Sampling Point         Section, Township, Range:	

Wetland Hydrology Indicat	ors:	Secondary Indicators (minimum of two required)			
Primary Indicators (minimum	n of one is requ	Surface Soil Cracks (B6)			
X Surface Water (A1)		Drainage Patterns (B10)			
X High Water Table (A2)		Moss Trim Lines (B16)			
X Saturation (A3)		Dry-Season Water Table (C2)			
Water Marks (B1)		Crayfish Burrows (C8)			
Sediment Deposits (B2)		Saturation Visible on Aerial Imagery (C9)			
Drift Deposits (B3)		Pre	sence of Reduced Iron (C4)		Stunted or Stressed Plants (D1)
Algal Mat or Crust (B4)		Rec	cent Iron Reduction in Tilled So	oils (C6)	Geomorphic Position (D2)
Iron Deposits (B5)		Thir	n Muck Surface (C7)		Shallow Aquitard (D3)
Inundation Visible on Ae	rial Imagery (E	7) Oth	er (Explain in Remarks)		Microtopographic Relief (D4)
Sparsely Vegetated Con	cave Surface	B8)			X FAC-Neutral Test (D5)
Field Observations:					
Surface Water Present?	Yes X	No	Depth (inches): 2		
Water Table Present?	Yes X	No	Depth (inches): 0		
			etland Hydrology Present? Yes X No		
Saturation Present?	Yes X	No	Depth (inches): 0	Wetlar	nd Hydrology Present? Yes X No
Saturation Present? (includes capillary fringe)	Yes X	No	Depth (inches): 0	Wetlar	nd Hydrology Present? Yes X No
Saturation Present? (includes capillary fringe) Describe Recorded Data (str	Yes X	No onitoring w	Depth (inches): 0	Wetlan pections), if	nd Hydrology Present? Yes X No
Saturation Present? (includes capillary fringe) Describe Recorded Data (str	Yes <u>X</u> ream gauge, m	No onitoring w	Depth (inches): 0	Wetlan pections), if	nd Hydrology Present? Yes X No
Saturation Present? (includes capillary fringe) Describe Recorded Data (str	Yes <u>X</u> ream gauge, m	No	Depth (inches):0	Wetlan pections), if	nd Hydrology Present? Yes X No
Saturation Present? (includes capillary fringe) Describe Recorded Data (str Remarks:	Yes <u>X</u> ream gauge, m	No	Depth (inches):0	Wetlan pections), if	nd Hydrology Present? Yes X No
Saturation Present? (includes capillary fringe) Describe Recorded Data (str Remarks:	Yes <u>X</u> ream gauge, m	No	Depth (inches):0	Wetlan pections), if	nd Hydrology Present? Yes X No
Saturation Present? (includes capillary fringe) Describe Recorded Data (str Remarks:	Yes <u>X</u> ream gauge, m	No	Depth (inches):	Wetlan pections), if	nd Hydrology Present? Yes X No
Saturation Present? (includes capillary fringe) Describe Recorded Data (str Remarks:	Yes <u>X</u> ream gauge, m	No	Depth (inches):0	Wetlan bections), if	nd Hydrology Present? Yes X No
Saturation Present? (includes capillary fringe) Describe Recorded Data (str Remarks:	Yes <u>X</u> ream gauge, m	No	Depth (inches): rell, aerial photos, previous ins	Wetlan	available:
Saturation Present? (includes capillary fringe) Describe Recorded Data (str Remarks:	Yes <u>X</u> ream gauge, m	No onitoring w	Depth (inches):0	Wetlan	nd Hydrology Present? Yes X No
Saturation Present? (includes capillary fringe) Describe Recorded Data (str Remarks:	Yes <u>X</u> ream gauge, m	No onitoring w	Depth (inches):0	Wetlan pections), if	nd Hydrology Present? Yes X No
Saturation Present? (includes capillary fringe) Describe Recorded Data (str Remarks:	Yes <u>X</u> ream gauge, m	No onitoring w	Depth (inches): rell, aerial photos, previous ins	Dections), if	nd Hydrology Present? Yes X No
Saturation Present? (includes capillary fringe) Describe Recorded Data (str Remarks:	Yes <u>X</u> ream gauge, m	No onitoring w	Depth (inches): rell, aerial photos, previous ins	Dections), if	nd Hydrology Present? Yes X No

Sampling Point: G-W

	Absolute	Dominant	Indicator	Deminence Test werkeheet
<u>Tree Stratum</u> (Plot size. <u>30</u> )	% Cover	Species?		Dominance Test worksneet:
Acer rubrum     Erovinue poppouluopiae	5			Number of Dominant Species
2. Fraxinus perinsylvanica		res		That are OBL, FACW, of FAC. $4$ (A)
3. <u>Populus deitoides</u>	5	NO	FAC	Total Number of Dominant
5				
6.				Percent of Dominant Species That Are OBL, FACW, or FAC: 66.7% (A/B)
7.				Prevalence Index worksheet:
	60	=Total Cover		Total % Cover of: Multiply by:
Sapling/Shrub Stratum (Plot size: 15 )				OBL species         0         x 1 =         0
1. Cornus amomum	20	Yes	FACW	FACW species 95 x 2 = 190
2. Fraxinus pennsylvanica	15	Yes	FACW	FAC species 10 x 3 = 30
3. Lonicera morrowii	10	Yes	FACU	FACU species 15 x 4 = 60
4				UPL species x 5 =
5				Column Totals: 120 (A) 280 (B)
6				Prevalence Index = B/A =2.33
7				Hydrophytic Vegetation Indicators:
	45	=Total Cover		1 - Rapid Test for Hydrophytic Vegetation
Herb Stratum (Plot size: 5 )				X 2 - Dominance Test is >50%
1. Impatiens capensis	10	Yes	FACW	X_3 - Prevalence Index is ≤3.0 <sup>1</sup>
2. Rubus allegheniensis	5	Yes	FACU	4 - Morphological Adaptations <sup>1</sup> (Provide supporting
3				data in Remarks or on a separate sheet)
4				Problematic Hydrophytic Vegetation <sup>1</sup> (Explain)
5				<sup>1</sup> Indicators of hydric soil and wetland hydrology must
6				be present, unless disturbed or problematic.
7				Definitions of Vegetation Strata:
8				<b>Tree</b> – Woody plants 3 in. (7.6 cm) or more in
9				diameter at breast height (DBH), regardless of height.
10				Sapling/shrub – Woody plants less than 3 in. DBH
11				and greater than or equal to 3.28 ft (1 m) tall.
12				Herb – All herbaceous (non-woody) plants, regardless
	15	=Total Cover		of size, and woody plants less than 3.28 ft tall.
Woody Vine Stratum (Plot size:)				Woody vines – All woody vines greater than 3.28 ft in
1				height.
2				Hydrophytic
3.				Vegetation
4				Present? Yes <u>×</u> No
	· · · · · · · · · ·	= I otal Cover		
Kemarks: (Include photo numbers here or on a sepa	rate sheet.)			

# SOIL

Profile Desc	ription: (Describe	to the d	epth needed to docu	ument t	he indica	ator or co	onfirm the absence o	of indicators.)		
Depth	Matrix		Redox	k Featur	es					
(inches)	Color (moist)	%	Color (moist)	%	Type <sup>1</sup>	Loc <sup>2</sup>	Texture	Remarks		
0-6	10YR 4/2	90	7.5YR 4/6	10	С	PL	Loamy/Clayey	Prominent redox concentrations		
6-18	10YR 5/2	90	10YR 6/3	10	С	Μ	Loamy/Clayey	Faint redox concentrations		
			·							
<sup>1</sup> Type: C=Co	oncentration, D=Dep	letion, R	M=Reduced Matrix, N	1S=Mas	ked Sand	d Grains.	<sup>2</sup> Location: P	PL=Pore Lining, M=Matrix.		
Hydric Soil I	ndicators:			~ ′	(00) (		Indicators f	or Problematic Hydric Soils <sup>3</sup> :		
Histosol	(A1)		Polyvalue Belo	w Surfa	ce (S8) (I	LRR R,	2 cm Mu	JCK (A10) (LRR K, L, MLRA 149B)		
Histic Ep	opedon (A2)		MLRA 149B	)			Coast P	rairie Redox (A16) (LRR K, L, R)		
Black His	stic (A3)		Thin Dark Surfa	ace (S9)	) (LRR R	, MLRA 1	149B)5 cm Mu	ucky Peat or Peat (S3) (LRR K, L, R)		
Hydroge	n Sulfide (A4)		High Chroma S	Sands (S	611) ( <b>LRF</b>	R K, L)	Polyvalu	ie Below Surface (S8) (LRR K, L)		
Stratified	I Layers (A5)		Loamy Mucky I	Mineral	(F1) ( <b>LRI</b>	R K, L)	Thin Da	rk Surface (S9) ( <b>LRR K, L</b> )		
Depleted	Below Dark Surface	e (A11)	Loamy Gleyed	Matrix (	F2)		Iron-Manganese Masses (F12) (LRR K, L, R)			
Thick Da	rk Surface (A12)		X Depleted Matrix	x (F3)			Piedmor	nt Floodplain Soils (F19) ( <b>MLRA 149B</b> )		
Sandy M	ucky Mineral (S1)		Redox Dark Su	Irface (F	6)		Mesic Spodic (TA6) (MLRA 144A, 145, 149B)			
Sandy G	leved Matrix (S4)		Depleted Dark	Surface	(F7)		Red Parent Material (F21)			
Sandy B	odox (S5)		Bodox Doprose	vione (E	Q)		Verv Shallow Dark Surface (F22)			
					0)		Other (Explain in Remarks)			
Stripped	Matrix (S6)		Mari (F10) ( <b>LR</b>	R K, L)			Other (Explain in Remarks)			
Dark Sur	face (S7)									
<sup>3</sup> Indicators of	hydrophytic vegetat	ion and	wetland hydrology mu	ıst be pı	resent, ur	nless dist	urbed or problematic.			
Restrictive L	ayer (if observed):									
Type:										
Depth (ir	nches):						Hydric Soil Prese	nt? Yes <u>X</u> No		
Remarks:										
This data for	m is revised from No 2015 Errata (http://w	orthcentra	al and Northeast Regi	ional Su		t Version S/nrcs14	2.0 to include the NR	CS Field Indicators of Hydric Soils,		
v 0101011 110,1	2010 Endia: (http://t					0/11/00/11				
### WETLAND DETERMINATION DATA FORM – Northcentral and Northeast Region

Project/Site: Land Release for Future Developmen	nt	City/County: Cicero/	Onondaga		Sampling Date: May 9, 2	y 9, 2019
Applicant/Owner: Syracuse Regional Airport Au	uthorit	ty	State:	NY	Sampling Point: H	-U
Investigator(s): Bayer, Bryan		Section, To	wnship, Range:			
Landform (hillside, terrace, etc.): Terrace		Local relief (concave, conve	ex, none): None		Slope %:	1-3
Subregion (LRR or MLRA): LRR L	Lat:	43° 7' 21.48" Long:	76° 4' 56.54"		Datum: WGS	84
Soil Map Unit Name: Niagara silt Ioam			NWI classi	ification:		
Are climatic / hydrologic conditions on the site typica	al for t'	this time of year? Yes X	No	(If no, e	explain in Remarks.)	
Are Vegetation, Soil, or Hydrology _		significantly disturbed? Are "Norm	nal Circumstanc	es" pres	ent? Yes X No	
Are Vegetation, Soil, or Hydrology _		naturally problematic? (If needed	d, explain any an	swers ir	ı Remarks.)	
SUMMARY OF FINDINGS – Attach site	map	showing sampling point locat	tions, transe	cts, im	portant features, e	tc.
Hydrophytic Vegetation Present? Yes	Х	No Is the Sampled A	rea 2 Ves		No X	

Hydric Soil Present?	Yes	No X	within a Wetland?	Yes No	X
Wetland Hydrology Present?	Yes	No X	If yes, optional Wetland Site	ID:	
Remarks: (Explain alternative procedure	s here or in a s	eparate report.)			

#### HYDROLOGY

Wetland Hydrology Indica	tors:				Secondary Indicators (min	imum of two required)
Primary Indicators (minimur	n of one is requi	red; check all	that apply)		Surface Soil Cracks (E	36)
Surface Water (A1)		Water-	Stained Leaves (B9)		Drainage Patterns (B1	0)
High Water Table (A2)		Aquatio	c Fauna (B13)		Moss Trim Lines (B16	)
Saturation (A3)		Marl De	eposits (B15)		Dry-Season Water Ta	ble (C2)
Water Marks (B1)		Crayfish Burrows (C8)	1			
Sediment Deposits (B2)	)	Oxidize	ed Rhizospheres on Living	Roots (C3)	Saturation Visible on A	Aerial Imagery (C9)
Drift Deposits (B3)		Presen	ce of Reduced Iron (C4)		Stunted or Stressed P	lants (D1)
Algal Mat or Crust (B4)		Recent	Iron Reduction in Tilled So	oils (C6)	Geomorphic Position	(D2)
Iron Deposits (B5)		Thin M	uck Surface (C7)		Shallow Aquitard (D3)	
Inundation Visible on A	erial Imagery (B7	7) Other (	Explain in Remarks)		Microtopographic Reli	ef (D4)
Sparsely Vegetated Co	ncave Surface (E	38)			FAC-Neutral Test (D5	)
Field Observations:						
Surface Water Present?	Yes	No X	Depth (inches):			
Water Table Present?	Yes	No X	Depth (inches):	-		
Saturation Present?	Yes	No X	Depth (inches):	Wetlar	nd Hydrology Present?	Yes No X
(includes capillary fringe)						
Describe Recorded Data (st	ream gauge, mo	onitoring well,	aerial photos, previous ins	pections), if	available:	
Remarks:						

### **VEGETATION** – Use scientific names of plants.

Sampling Point: H-U

Tree Stratum (Plot size: 30 )	Absolute % Cover	Dominant Species?	Indicator Status	Dominance Test worksheet:
1. Rhamnus cathartica	60	Yes	FAC	
2. Fraxinus pennsylvanica	10	No	FACW	Number of Dominant Species That Are OBL, FACW, or FAC: 3 (A)
3.		·		Tatal Number of Deminant
4.		·		Species Across All Strata: 4 (B)
5.				Percent of Deminent Species
6.				That Are OBL, FACW, or FAC: 75.0% (A/B)
7.				Prevalence Index worksheet:
	70	=Total Cover		Total % Cover of: Multiply by:
Sapling/Shrub Stratum (Plot size: 15 )				OBL species X 1 =0
1. Lonicera morrowii	5	Yes	FACU	FACW species 10 x 2 = 20
2. Cornus racemosa	2	Yes	FAC	FAC species 122 x 3 = 366
3				FACU species <u>5</u> x 4 = <u>20</u>
4				UPL species 0 x 5 = 0
5				Column Totals: 137 (A) 406 (B)
6				Prevalence Index = B/A = 2.96
7				Hydrophytic Vegetation Indicators:
	7	=Total Cover		1 - Rapid Test for Hydrophytic Vegetation
Herb Stratum (Plot size: 5 )				X 2 - Dominance Test is >50%
1. Persicaria maculosa	60	Yes	FAC	3 - Prevalence Index is ≤3.0 <sup>1</sup>
2				4 - Morphological Adaptations <sup>1</sup> (Provide supporting
3		·		data in Remarks or on a separate sheet)
4				Problematic Hydrophytic Vegetation <sup>1</sup> (Explain)
5				<sup>1</sup> Indicators of hydric soil and wetland hydrology must
6				be present, unless disturbed or problematic.
7				Definitions of Vegetation Strata:
8				Tree – Woody plants 3 in. (7.6 cm) or more in
9				diameter at breast height (DBH), regardless of height.
10				Sapling/shrub – Woody plants less than 3 in. DBH
11				and greater than or equal to 3.28 ft (1 m) tall.
12				Herb – All herbaceous (non-woody) plants, regardless
	60	=Total Cover		of size, and woody plants less than 3.28 ft tall.
Woody Vine Stratum (Plot size:)				Woody vines – All woody vines greater than 3.28 ft in
1				height.
2				Hydrophytic
3				Vegetation
4				Present? Yes <u>X</u> No
		=Total Cover		
Remarks: (Include photo numbers here or on a separate	rate sheet.)			

Profile Des	cription: (Describe	to the de	pth needed to doc	ument tl	he indica	ator or c	onfirm the absence of	indicators.)
Depth	Matrix		Redo	x Featur	es			
(inches)	Color (moist)	%	Color (moist)	%	Type <sup>1</sup>	Loc <sup>2</sup>	Texture	Remarks
0-10	10YR 2/1	100					Loamy/Clayey	
10-18	10YR 4/3	90	10YR 5/6	10	С	Μ	Loamy/Clayey	Distinct redox concentrations
			-Reduced Matrix N		ked San	Grains	<sup>2</sup> Location: PL	-Pore Lining M-Matrix
Hydric Soil Histoso Histic E Black H Hydroge Stratifie Deplete Thick D Sandy N Sandy O Sandy F Stripped Dark Su	Indicators: I (A1) pipedon (A2) istic (A3) en Sulfide (A4) d Layers (A5) d Below Dark Surface ark Surface (A12) Mucky Mineral (S1) Gleyed Matrix (S4) Redox (S5) d Matrix (S6) Irface (S7)	ə (A11)	Polyvalue Belo MLRA 149B Thin Dark Surf High Chroma S Loamy Mucky Loamy Gleyed Depleted Matri Redox Dark Su Depleted Dark Redox Depres Marl (F10) (LR	ow Surfa (i) Sands (S Mineral Matrix ( ix (F3) urface (F Surface sions (Fi <b>R K, L</b> )	ce (S8) ( ) (LRR R 511) (LRI (F1) (LRI F2) 56) 56) 59)	LRR R, , MLRA <sup>,</sup> R K, L) R K, L)	Indicators fo 2 cm Muc Coast Pra 5 cm Muc Polyvalue Thin Dark Iron-Mang Piedmont Mesic Sp Red Pare Very Shal Other (Ex	r Problematic Hydric Soils <sup>3</sup> : ck (A10) (LRR K, L, MLRA 149B) airie Redox (A16) (LRR K, L, R) cky Peat or Peat (S3) (LRR K, L, R) e Below Surface (S8) (LRR K, L) c Surface (S9) (LRR K, L) ganese Masses (F12) (LRR K, L, R) t Floodplain Soils (F19) (MLRA 149B) odic (TA6) (MLRA 144A, 145, 149B) ent Material (F21) llow Dark Surface (F22) cplain in Remarks)
<sup>3</sup> Indicators of <b>Restrictive</b> Type:	of hydrophytic vegetat Layer (if observed):	ion and w	etland hydrology mi	ust be pr	resent, ui	nless dist	urbed or problematic.	
Depth (i	inches):						Hydric Soil Presen	t? Yes No X
Remarks: This data fo Version 7.0,	rm is revised from Nc 2015 Errata. (http://v	ww.nrcs.	and Northeast Reg usda.gov/Internet/F	ional Su SE_DOC	pplemen	t Version S/nrcs14	2.0 to include the NRC 2p2_051293.docx)	S Field Indicators of Hydric Soils,

### WETLAND DETERMINATION DATA FORM – Northcentral and Northeast Region

Project/Site: Land Release for F	uture Development	City/Cou	inty: Cicero/Ononda		Sampling Date:	May 9, 2019				
Applicant/Owner: Syracuse R	egional Airport Authori	ity		State:	NY	Sampling Point	i: H-W			
Investigator(s): Bayer, Bryan			Section, Township, Range:							
Landform (hillside, terrace, etc.):	Depression	Local relief (cor	icave, convex, none	e): <u>Concave</u>	е	Slope	∍%: <u>1-3</u>			
Subregion (LRR or MLRA): LRR	L Lat:	43° 7' 46.48"	Long: 76° 4'	' 42.95"		Datum:	WGS 84			
Soil Map Unit Name: Niagara silt	loam		N	IWI classific	cation:					
Are climatic / hydrologic conditions	s on the site typical for	this time of year?	Yes <u>X</u> N	No (	(If no, e	xplain in Remark	s.)			
Are Vegetation, Soil	, or Hydrology	significantly disturbed?	Are "Normal Circ	cumstances	s" prese	nt? Yes X	No			
Are Vegetation, Soil	, or Hydrology	naturally problematic?	(If needed, expla	ain any ansv	wers in	Remarks.)				
SUMMARY OF FINDINGS	<ul> <li>Attach site map</li> </ul>	o showing sampling p	oint locations,	transect	ts, imp	portant featu	res, etc.			
Hydrophytic Vegetation Present?	Yes X	No Is the	Sampled Area							
Hydric Soil Present?	Yes X	No within	a Wetland?	Yes	Х	No				
Wetland Hydrology Present?	Yes X	No If yes,	optional Wetland S	Site ID:						
Remarks: (Explain alternative pr	ocedures here or in a s	separate report.)								

### HYDROLOGY

Wetland Hydrology Indicat	ors:					Secondary Indicators (minimum of two required)
Primary Indicators (minimum	<u>ı of one</u>	is rec	uired; check	all that apply)		Surface Soil Cracks (B6)
X Surface Water (A1)			Wate	er-Stained Leaves (B9)		Drainage Patterns (B10)
X High Water Table (A2)			Aqua	atic Fauna (B13)		Moss Trim Lines (B16)
X Saturation (A3)			Marl	Deposits (B15)		Dry-Season Water Table (C2)
Water Marks (B1)			Hydr	rogen Sulfide Odor (C1)		Crayfish Burrows (C8)
Sediment Deposits (B2)			Oxid	lized Rhizospheres on Living I	Roots (C3)	Saturation Visible on Aerial Imagery (C9)
Drift Deposits (B3)			Pres	sence of Reduced Iron (C4)		Stunted or Stressed Plants (D1)
Algal Mat or Crust (B4)			Rece	ent Iron Reduction in Tilled Sc	ils (C6)	Geomorphic Position (D2)
Iron Deposits (B5)			Thin	Muck Surface (C7)		Shallow Aquitard (D3)
Inundation Visible on Ae	rial Ima	gery	(B7) Othe	er (Explain in Remarks)		X Microtopographic Relief (D4)
Sparsely Vegetated Con	icave Si	urface	e (B8)			X FAC-Neutral Test (D5)
Field Observations:						
Surface Water Present?	Yes	Х	No	Depth (inches): 2		
Water Table Present?	Yes	Х	No	Depth (inches): 0		
Saturation Present?	Yes	Х	No	Depth (inches): 0	Wetlar	d Hydrology Present? Yes X No
(includes capillary fringe)						
(includes capillary fringe) Describe Recorded Data (str	·eam ga	uge,	monitoring we	ell, aerial photos, previous insp	pections), if	available:
(includes capillary fringe) Describe Recorded Data (str	ream ga	iuge, i	monitoring we	ell, aerial photos, previous insp	pections), if	available:
(includes capillary fringe) Describe Recorded Data (str	ream ga	iuge, i	monitoring we	ell, aerial photos, previous insp	pections), if	available:
(includes capillary fringe) Describe Recorded Data (str Remarks:	ream ga	iuge, I	monitoring we	ell, aerial photos, previous ins	pections), if	available:
(includes capillary fringe) Describe Recorded Data (str Remarks:	ream ga	iuge, i	monitoring we	ell, aerial photos, previous insp	pections), if	available:
(includes capillary fringe) Describe Recorded Data (str Remarks:	ream ga	iuge, I	monitoring we	ell, aerial photos, previous ins	pections), if	available:
(includes capillary fringe) Describe Recorded Data (str Remarks:	ream ga	iuge, i	monitoring we	ell, aerial photos, previous insp	Dections), if	available:
(includes capillary fringe) Describe Recorded Data (str Remarks:	ream ga	iuge, i	monitoring we	ell, aerial photos, previous ins	Dections), if	available:
(includes capillary fringe) Describe Recorded Data (str Remarks:	ream ga	iuge, i	monitoring we	ell, aerial photos, previous insp	Dections), if	available:
(includes capillary fringe) Describe Recorded Data (str Remarks:	ream ga	iuge, i	monitoring we	ell, aerial photos, previous ins	Dections), if	available:
(includes capillary fringe) Describe Recorded Data (str Remarks:	ream ga	iuge, I	monitoring we	ell, aerial photos, previous ins	Dections), if	available:
(includes capillary fringe) Describe Recorded Data (str Remarks:	ream ga	iuge, i	monitoring we	ell, aerial photos, previous ins	Dections), if	available:

### **VEGETATION** – Use scientific names of plants.

Sampling Point: H-W

Tree Stratum (Plot size: 30 )	Absolute % Cover	Dominant Species?	Indicator Status	Dominance Test worksheet:
1. Fraxinus pennsylvanica	60	Yes	FACW	
2.				Number of Dominant Species That Are OBL, FACW, or FAC: 3 (A)
3.				Total Number of Dominant
4.				Species Across All Strata: 3 (B)
5.				Percent of Dominant Species
6				That Are OBL, FACW, or FAC: 100.0% (A/B)
7				Prevalence Index worksheet:
	60	=Total Cover		Total % Cover of: Multiply by:
Sapling/Shrub Stratum (Plot size: 15 )				OBL species 0 x 1 = 0
1. Rhamnus cathartica	30	Yes	FAC	FACW species 105 x 2 = 210
2. Lonicera morrowii	5	No	FACU	FAC species 40 x 3 =20
3				FACU species <u>5</u> x 4 = <u>20</u>
4				UPL species 0 x 5 = 0
5				Column Totals: 150 (A) 350 (B)
6				Prevalence Index = $B/A = 2.33$
7				Hydrophytic Vegetation Indicators:
	35	=Total Cover		1 - Rapid Test for Hydrophytic Vegetation
Herb Stratum (Plot size: 5)				X 2 - Dominance Test is >50%
1. Impatiens capensis	35	Yes	FACW	$\underline{X}$ 3 - Prevalence Index is $\leq 3.0^{\circ}$
2. Persicaria maculosa	10	No	FAC	data in Remarks or on a separate sheet)
3. Solidago gigantea	10	NO	FACW	Drahlamatia Ukudarah, tia Manatatian <sup>1</sup> (Evaluia)
4				
o				<sup>1</sup> Indicators of hydric soil and wetland hydrology must
7				Definitions of Vegetation Strata:
8				Deminions of Vegetation Strata.
9				<b>Tree</b> – Woody plants 3 in. (7.6 cm) or more in diameter at breast height (DBH) regardless of height
10.				
11.				<b>Sapling/shrub</b> – Woody plants less than 3 in. DBH and greater than or equal to 3.28 ft (1 m) tall.
12.				
	55	=Total Cover		<b>Herb</b> – All herbaceous (non-woody) plants, regardless of size, and woody plants less than 3.28 ft tall.
Woody Vine Stratum (Plot size:)				<b>Woody vines</b> – All woody vines greater than 3.28 ft in
1				height.
2				
3				And the second s
4				Present? Yes <u>X</u> No
	:	=Total Cover		
Remarks: (Include photo numbers here or on a separation	rate sheet.)			

Depth	. K. Matrix		Redo	x Featu	res				,	
(inches)	Color (moist)	%	Color (moist)	%	Type <sup>1</sup>	Loc <sup>2</sup>	Texture		Remarks	;
0.19	10VP 2/1	100	i				Mucky Loom/Cloy			
0-16	101K 2/1	100					MUCKY LOATT/Cidy			
<sup>1</sup> Type: C=Co	ncentration. D=Dep	letion. RI	M=Reduced Matrix, N	/IS=Mas	ked Sand	Grains.	<sup>2</sup> Location:	PL=Pore Li	ning, M=Matrix	x.
Hydric Soil Ir	ndicators:	,	, , , ,				Indicators	for Proble	matic Hydric	Soils <sup>3</sup> :
Histosol (	(A1)		Polyvalue Belo	w Surfa	ice (S8) (I	_RR R,	2 cm N	luck (A10) (	(LRR K, L, ML	RA 149B)
Histic Epi	ipedon (A2)		MLRA 149B	)	. , .		Coast	Prairie Rede	ox (A16) ( <b>LRR</b>	K, L, R)
Black His	stic (A3)		Thin Dark Surf	ace (S9	) (LRR R	MLRA	149B) 5 cm N	lucky Peat	or Peat (S3) (I	LRR K, L, R)
Hydroger	n Sulfide (A4)		High Chroma S	Sands (S	511) ( <b>LRF</b>	R K, L)	Polyva	lue Below S	Surface (S8) (L	.RR K, L)
Stratified	Layers (A5)		X Loamy Mucky	Mineral	(F1) ( <b>LR</b>	R K, L)	Thin Da	ark Surface	(S9) (LRR K,	L)
Depleted	Below Dark Surface	e (A11)	Loamy Gleyed	Matrix (	(F2)		Iron-Ma	anganese N	Aasses (F12) (	LRR K, L, R)
Thick Da	rk Surface (A12)		Depleted Matri	x (F3)			Piedmo	ont Floodpla	ain Soils (F19)	(MLRA 149B)
Sandy Mu	ucky Mineral (S1)		Redox Dark Su	urface (F	-6)		Mesic \$	Spodic (TA	6) ( <b>MLRA 144</b>	A, 145, 149B)
Sandy Gl	eyed Matrix (S4)		Depleted Dark	Surface	e (F7)		Red Pa	arent Materi	ial (F21)	
Sandy Re	edox (S5)		Redox Depres	sions (F	8)		Very S	hallow Dark	Surface (F22	)
Stripped I	Matrix (S6)		Marl (F10) ( <b>LR</b>	R K, L)			Other (	Explain in F	Remarks)	
Dark Surf	face (S7)									
<sup>3</sup> Indicators of	hydrophytic vegetat	ion and v	wetland hydrology mu	ust be p	resent, ur	less dis	turbed or problematic	•		
Restrictive L	ayer (if observed):									
Type:										
Depth (in	ches):						Hydric Soil Pres	ent?	Yes X	No
Remarks:							•			
This data form	n is revised from No	orthcentra	al and Northeast Reg	ional Su	pplement	Versior	2.0 to include the NF	RCS Field In	ndicators of Hy	ydric Soils,
Version 7.0, 2	2015 Errata. (http://w	ww.nrcs	.usda.gov/Internet/F	SE_DO	CUMENT	S/nrcs14	l2p2_051293.docx)			

### APPENDIX B WEB SOIL SURVEY



Hydric Rating by Map Unit—Onondaga County, New York (Land Release - SRAA)

MAP INFORMATION	The soil surveys that comprise your AOI were mapped at 1:20,000.	Warning: Soil Map may not be valid at this scale.	Enlargement of maps beyond the scale of mapping can cause misunderstanding of the detail of mapping and accuracy of soil	line placement. The maps do not show the small areas of	contrasting soils that could have been shown at a more detailed scale.	Please rely on the bar scale on each map sheet for map	measurements.	Source of Map: Natural Resources Conservation Service	veb son survey ONE. Coordinate System: Web Mercator (EPSG:3857)	Maps from the Web Soil Survey are based on the Web Mercator projection, which preserves direction and shape but distorts	distance and area. A projection that preserves area, such as the	accurate calculations of distance or area are required.	This product is generated from the USDA-NRCS certified data a	of the version date(s) listed below.	Soil Survey Area: Onondaga County, New York Survey Area Data: Version 13, Sep 3, 2018	Soil map units are labeled (as space allows) for map scales 1:50,000 or larger.	Date(s) aerial images were photographed: Dec 31, 2009—Oct	10, 2016	The orthophoto or other base map on which the soil lines were	compiled and digitized probably differs from the background imagery displayed on these maps. As a result, some minor	shifting of map unit boundaries may be evident.	
GEND	Transportation +++ Rails	Interstate Highways	US Routes			Aerial Photography																

NSDA

# Hydric Rating by Map Unit

Map unit symbol	Map unit name	Rating	Acres in AOI	Percent of AOI
CFL	Cut and fill land	10	2.5	2.5%
ChA	Collamer silt loam, 0 to 2 percent slopes	0	3.9	3.9%
CrB	Croghan loamy fine sand, 0 to 6 percent slopes	0	7.6	7.6%
Lm	Lamson very fine sandy loam	90	1.8	1.8%
ML	Made land	10	0.5	0.5%
MtA	Minoa fine sandy loam, 0 to 2 percent slopes	12	4.4	4.4%
NgA	Niagara silt loam, 0 to 4 percent slopes	7	66.9	67.1%
Pb	Palms muck	100	12.2	12.3%
Totals for Area of Intere	st		99.8	100.0%

### Description

This rating indicates the percentage of map units that meets the criteria for hydric soils. Map units are composed of one or more map unit components or soil types, each of which is rated as hydric soil or not hydric. Map units that are made up dominantly of hydric soils may have small areas of minor nonhydric components in the higher positions on the landform, and map units that are made up dominantly of nonhydric soils may have small areas of minor hydric components in the lower positions on the landform. Each map unit is rated based on its respective components and the percentage of each component within the map unit.

The thematic map is color coded based on the composition of hydric components. The five color classes are separated as 100 percent hydric components, 66 to 99 percent hydric components, 33 to 65 percent hydric components, 1 to 32 percent hydric components, and less than one percent hydric components.

In Web Soil Survey, the Summary by Map Unit table that is displayed below the map pane contains a column named 'Rating'. In this column the percentage of each map unit that is classified as hydric is displayed.

Hydric soils are defined by the National Technical Committee for Hydric Soils (NTCHS) as soils that formed under conditions of saturation, flooding, or ponding long enough during the growing season to develop anaerobic conditions in the upper part (Federal Register, 1994). Under natural conditions, these soils are either saturated or inundated long enough during the growing season to support the growth and reproduction of hydrophytic vegetation.

The NTCHS definition identifies general soil properties that are associated with wetness. In order to determine whether a specific soil is a hydric soil or nonhydric soil, however, more specific information, such as information about the depth and duration of the water table, is needed. Thus, criteria that identify those estimated soil properties unique to hydric soils have been established (Federal Register, 2002). These criteria are used to identify map unit components that normally are associated with wetlands. The criteria used are selected estimated soil properties that are described in "Soil Taxonomy" (Soil Survey Staff, 1999) and "Keys to Soil Taxonomy" (Soil Survey Staff, 1993).

If soils are wet enough for a long enough period of time to be considered hydric, they should exhibit certain properties that can be easily observed in the field. These visible properties are indicators of hydric soils. The indicators used to make onsite determinations of hydric soils are specified in "Field Indicators of Hydric Soils in the United States" (Hurt and Vasilas, 2006).

#### References:

Federal Register. July 13, 1994. Changes in hydric soils of the United States. Federal Register. September 18, 2002. Hydric soils of the United States. Hurt, G.W., and L.M. Vasilas, editors. Version 6.0, 2006. Field indicators of hydric soils in the United States.

Soil Survey Division Staff. 1993. Soil survey manual. Soil Conservation Service. U.S. Department of Agriculture Handbook 18.

Soil Survey Staff. 1999. Soil taxonomy: A basic system of soil classification for making and interpreting soil surveys. 2nd edition. Natural Resources Conservation Service. U.S. Department of Agriculture Handbook 436.

Soil Survey Staff. 2006. Keys to soil taxonomy. 10th edition. U.S. Department of Agriculture, Natural Resources Conservation Service.

### **Rating Options**

Aggregation Method: Percent Present Component Percent Cutoff: None Specified Tie-break Rule: Lower APPENDIX C PHOTOGRAPHS

**Project:** Syracuse Regional Airport Authority Land Release for Future Development Town of Cicero, Onondaga County, New York





Photo 1 – Photo of Wetland A vegetation at A-W data point (PFO)



Photo 2 – Photo of Wetland B at B-W data point (PFO)

**Project:** Syracuse Regional Airport Authority Land Release for Future Development Town of Cicero, Onondaga County, New York





Photo 3 – Photo of Wetland B vegetation at B-W2 data point (PSS)



Photo 4 – Photo of Wetland C at C-W data point (PFO)

**Project:** Syracuse Regional Airport Authority Land Release for Future Development Town of Cicero, Onondaga County, New York





Photo 5 – Photo of Wetland D vegetation at D-W (PFO) data point



Photo 6 – Photo of Wetland E at E-W data point (PFO)

**Project:** Syracuse Regional Airport Authority Land Release for Future Development Town of Cicero, Onondaga County, New York





Photo 7 – Photo of Wetland F at F-W (PFO) data point



Photo 8 – Photo of Wetland G at G-W data point (PFO)

**Project:** Syracuse Regional Airport Authority Land Release for Future Development Town of Cicero, Onondaga County, New York





Photo 9 - Photo of Wetland H at H-W (PFO) data point



**Project:** Syracuse Regional Airport Authority Land Release for Future Development Town of Cicero, Onondaga County, New York





Photo 11 – Photo of Stream C



**Project:** Syracuse Regional Airport Authority Land Release for Future Development Town of Cicero, Onondaga County, New York





Photo 13 – Photo of Ditch B



**Project:** Syracuse Regional Airport Authority Land Release for Future Development Town of Cicero, Onondaga County, New York





Photo 15 – Photo of Ditch C



**Project:** Syracuse Regional Airport Authority Land Release for Future Development Town of Cicero, Onondaga County, New York





Photo 17 – Photo of Ditch C3

