WETLAND DETERMINATION DATA FORM - North Central and Northeast Region

SPP Project/Site:	Ci ⁻	Carlton ty/County:		2015-06-30 Sampling Date:		
Applicant/Owner:		Minnesota State:		CR163e1W Sampling Point:		
ACM/LE Investigator(s):		Sec	tion, Township, Range:			
dep Landform (hillslope, terrace, etc.):	pression				0-2 Slope (%): Minnesota State	
Subregion (LRR or MLRA):		Latitude:	5.5967543144 Loi	ngitude:	Datum:	
Soil Map Unit Name:				_ NWI Classifi	cation:	
Are climatic/hydrologic conditions on	the site typica	al for this time of year	? (if no, explain in Rema	arks):	Yes	
Are Vegetation No No No , soil , or	No Hydrology) significantly distur	bed? Are "Normal Circu	Yes		
Are Vegetation No No No , or H	No					
SUMMARY OF FINDINGS - Attach	site man show	ing sampling point lo	ocations transects impo	ortant features, etc.		
Hydrophytic Vegetation Present?		Yes	Is the Sampled Area	ortant reatures, etc.		
Hudric Sail Brocont?	•	Yes	within a Wetland?	Ye	s	
nyunc son Present?	dric Soil Present?Yes					
Wetland Hydrology Present? Remarks: (Explain alternative proced		If yes, optional Wetland Site ID:				
LIVERPOLOGY						
HYDROLOGY				Cocoodom Undicatora	(mainimature of true was actioned)	
Wetland Hydrology Indicators:				Secondary indicators	(minimum of two required)	
Primary Indicators (minimum of one i	is required; ch	eck all that apply)		Surface Soil Cr	acks (B6)	
Surface Water (A1) Water-Stain			• •	_	Drainage Patterns (B10)	
yes High Water Table (A2) — Aquatic Fau					Moss Trim Lines (B16)	
		Marl Deposits (B15)		Dry-Season Water Table (C2)		
Water Marks (B1) Hydrogen :		Hydrogen Sulfide Oo		Crayfish Burrows (C8)		
Sediment Deposits (B2) Oxidized R			res on Living Roots (C3)	Saturation Visible on Aerial Imagery (C9)		
Drift Deposits (B3) Presence or		Presence of Reduce		Stunted/Stressed Plants (D1)		
Algal Mat or Crust (B4) Recent Iron			on in Tilled Soils (C6)	 ·	decinorphic rosition (D2)	
Iron Deposits (B5)	_	Thin Muck Surface (Shallow Aquitar	•	
		Other (Explain in Re	marks)	Microtopograph	• •	
Sparsely Vegetated Concave Surface	(B8)			yes FAC-Neutral Tes	t (D5)	
Field Observations:	No	Danth (in the c)				
Surface Water Present? Water Table Present?	Yes	Depth (inches) Depth (inches)				
Saturation Present?	Yes	Depth (inches)		Wetland Hydrology Prese	nt? Yes	
(includes capillary fringe)		Deptii (ilielies)		Wetiana nyarology riese	<u> </u>	
Describe Recorded Data (stream gaug	ge. monitoring	well, aerial photos, p	revious inspections), if a	available:		
0.10	,-, 0	, ,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,	,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,			
Remarks:						
The water table is 10 inches below th	ne surface and	tne soil is saturated a	it 5 inches.			

VEGETATION - Use scientific names of plants.

	Absolute	Dominant	Indicator	Dominance Test worksheet:	
Tree Stratum (Plot Size: 30 ft)	% Cover	Species?	Status	Number of Dominant Species	
1. Populus tremuloides	_ 75.00	Yes	FACU	That Are OBL, FACW, or FAC: 4 (A)	
2. Fraxinus nigra	25.00	Yes	FACW	Total Number of Dominant	
3. Acer rubrum	2.00	<u>No</u>	FAC	4 Species Across All Strata: (B)	
4				Percent of Dominant Species	
5				100 That Are OBL, FACW, or FAC:(A/B)	
c			_	Prevalence Index worksheet:	
0				_	
7.	102	Tatal Causa	_	Total % Cover of: Multiply by:	
6. 15. (6) 1. 6. 1. (6) 1. 6. 15 ft	102	_ = Total Cover			
Sapling/Shrub Stratum (Plot Size: 15 ft) 1 Fraxinus nigra	45.00	.,		FACW species 109.00 x 2 218	
1.	_ 15.00	Yes	FACW	FACU species 77.00 x 3 108	
2. Ilex verticillata	10.00	Yes	FACW	UPL species <u>10.00</u> x 4 <u>50</u>	
3. Alnus incana	_ 5.00	<u>No</u>	FACW	Column Totals(A)(B)	
4. Corylus americana	5.00	_ No	FACU	Prevalence Index = B/A = 2.6480686	
5. Cornus alba	5.00	No	FACW	Hydrophytic Vegetation Indicators:	
6. Corylus cornuta	5.00	No	FACU	1 - Rapid Test for Hydrophytic Vegetation	
7	_			<u>yes</u> 2 - Dominance Test is > 50%	
	45	_ = Total Cover		<u>yes</u> 3 - Prevalence Index is $\leq 3.0^1$	
Herb Stratum (Plot Size: 5 ft)				4 - Morphological Adaptations (Provide	
1. Rubus pubescens	_ 25.00	Yes	FACW	supporting data in Remarks or on a separate sheet)	
2. Calamagrostis canadensis	10.00	No No	OBL	Problematic Hydrophytic Vegetation ¹ (Explain)	
3 Valeriana officinalis	10.00	No No		_	
7 Fragaria virginiana	_ 10.00	No No	FACU	Indicators of hydric soil and wetland hydrology must be present, unless disturbed or problematic.	
5. Equisetum pratense	10.00	No	FACW	Definitions of Vegetation Strata:	
6. Solidago gigantea	5.00	No	FACW	Definitions of vegetation strata.	
Carex gracillima	_ 5.00			-	
Des reduction		_ No	- FACU	Tree - Woody plants 3 in. (.76 cm) or more in diameter at breast height (DBH), regardless of height.	
8. Petasites frigidus	_ 5.00	_ No	FACW	- `	
9. Tetusites ingliaus	_ 2.00	_ No	FACW	Sapling/Shrub - Woody plants less than 3 in. DBH and greater than or equal to 3.28 ft (1 m) tall.	
10. Maianthemum canadense	2.00	<u>No</u>	FACU	-	
11. Carex projecta	2.00	<u>No</u>	FACW	Herb - All herbaeceous (non-woody) plants, regardless of size, and	
12		_	_	woody plants less than 3.28 ft tall.	
	86	= Total Cover		Woody vines - All woody vines greater than 3.28 ft in height.	
Woody Vine Stratum (Plot Size:)					
1				_	
2.				Hydrophytic	
3.				Vegetation Present?	
4					
**.	0	=Total Cover		1	
Remarks: (include photo numbers here or on a separate she	1				
, , ,					
The vegetation is dominated by aspen, black ash, winterberr	y, and dwarf raspbe	rry.			

Sampling Point: CR163e1W

Sampling Point: CR163e1W SOIL Profile Description: (Describe to the depth needed to document the indicator or confirm the absence of indicators.) **Redox Features** Type¹ Loc² (inches) Color (moist) % Color (moist) Texture Remarks 0-8 5YR 3 2 100 sic 5YR 5 8 8-24 5YR 4 4 65 15 С Μ С 5YR 4 2 Mixed matrix. 8-24 15 7.5YR 5 6 5 С M С ¹Type: C=Concentration, D=Depletion, RM=Reduced Matrix, MS=Masked Sand Grains. ²Location: PL=Pore Lining, M=Matrix. Indicators for Problematic Hydric Soil³: **Hydric Soil Indicators:** Polyvalue Below Surface (S8) (LRR R, MLRA 2 cm Muck (A10) (LRR K, L, MLRA 149B) Histosol (A1) Coast Prairie Redox (A16)(LRR K, L, R) Thin Dark Surface (S9) (LRR R, MLRA 149B) Histic Epipedon (A2) 5 cm Mucky Peat or Peat (S3) (LRR K, L, R) Loamy Mucky Mineral (F1) (LRR K, L) Black Histic (A3) Dark Surface (S7) (LRR K, M) Hydrogen Sulfide (A4) Loamy Gleyed Matrix (F2) Polyvalue Below Surface (S8) (LRR K, L) Stratified Layers (A5) Depleted Matrix (F3) Thin Dark Surface (S9) (LRR K, L) Depleted Below Dark Surface (A11) Redox Dark Surface (F6) Iron-Maganese Masses (F12) (LRR K, L, R) Thick Dark Surface (A12) Depleted Dark Surface (F7) Piedmont Floodplain Soils (F19) (MLRA 149B) Sandy Mucky Mineral (S1) Redox Depressions (F8) Sandy Gleyed Matrix (S4) Mesic Spodic (TA6) (MLRA 144A, 145, 149B) Red Parent Material (F21) Sandy Redox (S5) Very Shallow Dark Surface (TF12) Stripped Matrix (S6)

Dark Surface (S7) (LRR R, MLRA 149B)

The soils are silty clay over clay and meet hydric soil indicator F21.

Restrictive Layer (if observed):

Depth (inches):

Type:

Remarks:

Other (explain in remarks)

Hydric Soil Present? Yes