WETLAN	ND DETERMINATIO	N DATA FORM - North Centra	al and Northeast Region			
oject/Site: SPP City/County: Wadena		Sampling Date: 2016-07-25				
Applicant/Owner: Enbridge		State: Minnesota	Samplin	ng Point: <u>w-138n33w1-aa1</u>		
Investigator(s): DPT, MGH	Section	n, Township, Range: <u>S1, T138N, R</u>	33W			
Landform (hillslope, terrace, etc.): Depress	sion	Local Relief (concave,	convex, none): <u>CL</u>	Slope (%): 0-2%		
Subregion (LRR or MLRA):	La	- atitude: <u>46.7931082752</u> Lo	ongitude: <u>-94.78914731</u>	Datum: NAD83		
Soil Map Unit Name: 564			NWI Clas	ssification: N/A		
Are climatic/hydrologic conditions on the	site typical for this ti	me of year? (if no, explain in Rema	arks):	No		
Are Vegetation <u>No</u> , Soil <u>No</u> , or Hyd	rology <u>No</u> significa	ntly disturbed? Are "Normal Circu	umstances" present? Yes			
Are Vegetation <u>No</u> , Soil <u>No</u> , or Hydro	logy <u>No</u> naturally p	roblematic? (If needed, explain a	any answers in Remarks)			
SUMMARY OF FINDINGS - Attach site	map showing sampli	ng point locations, transects, imp	portant features, etc.			
Hydrophytic Vegetation Present?	Yes	Is the Sampled Area				
Hydric Soil Present?	Yes	within a Wetland?		Yes		
Wetland Hydrology Present?	Yes	If yes, optional Wetlar	nd Site ID:	w-138n33w1-aa		
No digging, existing forest road, potentia	Il buried utilities. Pred	ipitation above normal based on	WETS analysis.			
HYDROLOGY Wetland Hydrology Indicators:			Secondary Indicat	tors (minimum of two required)		
		analy)				
Primary Indicators (minimum of one is rec yes Surface Water (A1)				l Cracks (B6)		
yes High Water Table (A2)			Drainage Patterns (B10) Moss Trim Lines (B16)			
yes Saturation (A3)			Dry-Season Water Table (C2)			
Water Marks (B1)			Crayfish Burrows (C8)			
Sediment Deposits (B2)		Rhizospheres on Living Roots (C3)	Saturation Visible on Aerial Imagery (C9)			
		e of Reduced Iron (C4)	Stunted/Stressed Plants (D1)			
Algal Mat or Crust (B4)			Geomorphic Position (D2)			
Iron Deposits (B5)			Shallow Aquitard (D3)			
Inundation Visible on Aerial Imagery (B7) Other (Explain in Rem		xplain in Remarks)	Microtopographic Relief (D4)			
Sparsely Vegetated Concave Surface (B8)		FAC-Neutral	Test (D5)			
Field Observations:						
Surface Water Present?	Yes Dep	th (inches) <u>4</u>				
Water Table Present?	Yes Dep	th (inches) 0				
Saturation Present?	Yes Dep	th (inches) 0	Wetland Hydrology Pro	esent? Yes		
(includes capillary fringe)						
Describe Recorded Data (stream gauge, m	nonitoring well, aeria	photos, previous inspections), if	available:			
Remarks:						

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

Sampling Point: w-138n33...

	Absolute	Dominant	Indicator	Dominance Test worksheet:		
Tree Stratum (Plot Size: 30 )	% Cover	Species?	Status	Number of Dominant Species		
1.				That Are OBL, FACW, or FAC: 3 (A)		
2.				Total Number of Dominant		
3				Species Across All Strata: 3 (B)		
4.				Percent of Dominant Species		
5				That Are OBL, FACW, or FAC: 100 (A/B)		
6			<u></u>	Prevalence Index worksheet:		
7.				Total % Cover of: Multiply by:		
··	0	- Total Cover		OBL species         130.00         x 1         130		
Sapling/Shrub Stratum (Plot Size: 15 )	<u> </u>			FACW species 10.00 x 2 20		
1. Salix petiolaris	60.00	Yes	OBL			
2		·				
3				Column Totals $\frac{160}{210}$ (A) $\frac{210}{210}$ (B)		
4				Prevalence Index = $B/A = 1.3125$		
5				Hydrophytic Vegetation Indicators:		
6				1 - Rapid Test for Hydrophytic Vegetation		
7				yes 2 - Dominance Test is > 50%		
	60	= Total Cover		<u>yes</u> 3 - Prevalence Index is $\leq 3.0^1$		
Herb Stratum (Plot Size: 5)				4 - Morphological Adaptations <sup>1</sup> (Provide		
1. Carex lacustris	70.00	Yes	OBL	supporting data in Remarks or on a separate sheet)		
2. Solidago gigantea	20.00	Yes	FAC	Problematic Hydrophytic Vegetation <sup>1</sup> (Explain)		
3. Phalaris arundinacea	10.00	No	FACW	<sup>1</sup> Indicators of hydric soil and wetland hydrology must be present, unless		
4				disturbed or problematic.		
5				Definitions of Vegetation Strata:		
6						
7				Tree - Woody plants 3 in. (.76 cm) or more in diameter at breast		
8				height (DBH), regardless of height.		
9				Sapling/Shrub - Woody plants less than 3 in. DBH and greater than		
			_	or equal to 3.28 ft (1 m) tall.		
10						
11				Herb - All herbaeceous (non-woody) plants, regardless of size, and woody plants less than 3.28 ft tall.		
12						
	100	= Total Cover		Woody vines - All woody vines greater than 3.28 ft in height.		
Woody Vine Stratum (Plot Size: 30)						
1				_		
2.				Hydrophytic		
3.				Vegetation Present? <u>Yes</u>		
4.						
	0	=Total Cover	_			
<b>Bomarke</b> , (include photo numbers here or on a congrate sheet						
Remarks: (include photo numbers here or on a separate sheet	)					

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Northcentral and Northeast Region – Version 2.0

## SOIL

Sampling Poi	nt: w-138n33
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Depth Matrix	Matrix Redox Features						
(inches) Color (moist)	% 	Color (moist)	% 	Type <sup>1</sup>	Loc <sup>2</sup>	Texture	Remarks
Type: C=Concentration, D=Depletion, RM=		rix, MS=Masked Sand Gra	ins.				<sup>2</sup> Location: PL=Pore Lining, M=Matr
Hydric Soil Indicators:         Histosol (A1)         Histic Epipedon (A2)         Black Histic (A3)         Hydrogen Sulfide (A4)         Stratified Layers (A5)         Depleted Below Dark Surface (A11)         Thick Dark Surface (A12)         Sandy Mucky Mineral (S1)         Sandy Redox (S5)         Stripped Matrix (S6)         Dark Surface (S7) (LRR R, MLRA 149B)		<ul> <li>Polyvalue Below S</li> <li>149B)</li> <li>Thin Dark Surface</li> <li>Loamy Mucky Mir</li> <li>Loamy Gleyed Ma</li> <li>Depleted Matrix (I</li> <li>Redox Dark Surface</li> <li>Depleted Dark Sur</li> <li>Redox Depression</li> </ul>	(S9) <b>(LRR</b> eral (F1) trix (F2) =3) e (F6) face (F7)	R, MLRA		Coast Prairie Re  5 cm Mucky Per  Dark Surface (S)  Polyvalue Belov  Thin Dark Surfac  Iron-Maganese  Piedmont Flood  Mesic Spodic (T/  Red Parent Mat	<ul> <li>b) (LRR K, L, MLRA 149B)</li> <li>dox (A16)(LRR K, L, R)</li> <li>at or Peat (S3) (LRR K, L, R)</li> <li>7) (LRR K, M)</li> <li>v Surface (S8) (LRR K, L)</li> <li>de (S9) (LRR K, L)</li> <li>Masses (F12) (LRR K, L, R)</li> <li>polain Soils (F19) (MLRA 149B)</li> <li>A6) (MLRA 144A, 145, 149B)</li> <li>erial (F21)</li> <li>ark Surface (TF12)</li> </ul>
Restrictive Layer (if observed): Type: Depth (inches): Remarks: No digging, soils assumed hydric based on v					н	ydric Soil Present? Yes	

Site Photograph 1



Latitude: 46.7931132205266

Longitude: -94.789142450406

Cowardin Classification: PSS

Circular 39: 6

Remarks:

Direction: west

Eggers & Reed: Shrub-Carr/Alder Thicket

Site Photograph 2



Latitude: 46.7931222310726

Longitude: -94.7891299613703

Cowardin Classification: PSS

Circular 39: 6

Remarks:

Direction: north

Eggers & Reed: Shrub-Carr/Alder Thicket