## WETLAND DETERMINATION DATA FORM Great Plains Region

Project/Site:		L3R								Date:	08/01/14	
Applicant:		Enbridge			Ol	/A 41 /	۸ میرا <i>DD</i>			County:	Marshall	
Investigators Soil Unit:	s: - I18A	NTT/KRG			subregio	•	A or LRR): 'I Classification:	MLRA 56		State:	MN	
Landform:	Depression				Local Relief		า บเลออเเเนิสแบก	•		Sample Point	w-155n46w1-d1	
Slope (%):	0 - 2%		Latitude: 48.			· · · · · · · · · · · · · · · · · · ·	5169	Datum:				
		onditions on the site						✓ Yes	□ No	Section:		
Are Vegetation				tly disturbed			e normal circun			Township:		
Are Vegetation			•	roblematic?			✓ Yes	□ No		Range:	Dir:	
SUMMARY (			<b>7</b> 1							5		
Hydrophytic '	Vegetation P	resent?	Yes					Hydric Soil	Is Present?	Yes		
Wetland Hyd	drology Prese	ent?	Yes					Is This Sar	mpling Poin	it Within A W	etland? Yes	
Remarks:	The wetland	d is a wet meadow l	located with	nin an agricu	ıltural field a	and cover	red mainly with	bare dirt and	d scattered	Persicaria m	aculosa and Echinoch	loa crus-
	galli.											
<b>HYDROLOG</b>	Υ											
Wetland Hy	drology Ind	icators (Check all t	that apply:	Minimum of	one primary	or two s	econdary requi	red):				
Primary		( )	, , , , , , , , , , , , , , , , , , , ,				, ,	/	Secondary:			
	A1 - Surface				□ B11 - Salt				V	B6 - Surface S		
	A2 - High Wa				•	atic Fauna			☑		Vegetated Concave Surfa	ice
	A3 - Saturation B1 - Water M					ogen Sulfic	de Odor ater Table			B10 - Drainag	e Patterns Rhizospheres on Living R	oote (tillod)
	B2 - Sedimer						spheres on Living	Roots (not till	<b>.</b> □	C8 - Crayfish		oots (tilled)
	B3 - Drift Dep	•					educed Iron	rtooto (not tiii	`		n Visible on Aerial Imagery	V
	B4 - Algal Ma				□ C7 - Thin	Muck Surf	ace		✓	D2 - Geomorp		,
	B5 - Iron Dep				□ Other (Ex	plain)			✓	D5 - FAC-Neu		
		on Visible on Aerial Ima	agery							D7 - Frost-Hea	aved Hummocks (LRR F)	
	B9 - Water-S	tained Leaves										
Field Observ												
Field Obser			_		/! \							
Surface Wat		Yes		oth:	(in.)			Wetland F	lydrology l	Present?	Υ	
Water Table		Yes		oth:	(in.)				.,		<u> </u>	
Saturation P	resent?	Yes □	Dep	oth:	(in.)							
Describe Rec	orded Data (	stream gauge, monit	oring well, a	erial photos,	previous ins	pections)	, if available:					
Describe Rec Remarks:	·	stream gauge, monito		•	•		·	ndscape.				
	·			•	•		·	ndscape.				
Remarks:	The soil is	cracked at the surfa	ace, and the	e wetland are	ea lies lower	than the	surrounding la	·				
Remarks:  SOILS Profile Descri	The soil is o	cracked at the surfa	ace, and the	e wetland are	ea lies lower	than the	e surrounding la	ndicators.)				
Remarks:  SOILS Profile Descri	The soil is o	cracked at the surfa	ace, and the	e wetland are	ea lies lower	than the	e surrounding la	ndicators.)				
Remarks:  SOILS Profile Descri	The soil is o	ibe to the depth nee	ace, and the	e wetland are	ea lies lower	than the	e surrounding lands  ne absence of ine Pore Lining, M=Matr	ndicators.)				
Remarks:  SOILS Profile Descri (Type: C=Concer	The soil is o	ibe to the depth neeletion, RM=Reduced Mat	eded to doc	e wetland are cument the ir red/Coated Sa	ea lies lower ndicator or o	confirm the ation: PL=P	e surrounding lands  ne absence of ine Pore Lining, M=Matr	ndicators.)	Toyturo		Pomarke	
Remarks:  SOILS Profile Descri (Type: C=Concer	The soil is o	ibe to the depth needletion, RM=Reduced Materix  Color (Moist)	eded to doc	e wetland are cument the ir red/Coated Sar	ea lies lower	than the	e surrounding lands  ne absence of ine Pore Lining, M=Matr	ndicators.)	Texture		Remarks	
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Remarks:  SOILS Profile Descri (Type: C=Concer  Depth (In.) 0-18	The soil is of iption (Description, Dependent of the iption).  Hue_10YR	ibe to the depth needletion, RM=Reduced Matrix  Color (Moist)  2/1	eded to doc trix, CS=Cove	e wetland are sument the ir red/Coated Sar	ndicator or ond Grains; Loca	confirm the mation: PL=P	e surrounding la	ndicators.)	Texture CL		Remarks	
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Remarks:  SOILS Profile Descri (Type: C=Concer  Depth (In.) 0-18	iption (Description, D=Dep	ibe to the depth needletion, RM=Reduced Matrix  Color (Moist)  2/1	eded to doc trix, CS=Cove	e wetland are sument the ir red/Coated Sal	ndicator or ond Grains; Locality (Moist)  e not preser	confirm the mation: PL=P	e surrounding la	Location	CL Indicators f	or Problemati		
Remarks:  SOILS Profile Descrication (Type: C=Concert)  Depth (In.)  0-18  NRCS Hydr	iption (Description, D=Dep  Hue_10YR  ric Soil Field  A1- Histosol	ibe to the depth need letion, RM=Reduced Matrix  Color (Moist)  2/1  Indicators (che	eded to doc trix, CS=Cove	e wetland are sument the in red/Coated Sales Colo	ea lies lower  Indicator or one ond Grains; Loca  Ir (Moist)  e not preser  y Redox	confirm the mation: PL=P	e surrounding la	Location	Indicators f A9 - 1 cm M	luck (LRR I, J)	c Soils <sup>1</sup>	
Remarks:  SOILS Profile Descri (Type: C=Concer  Depth (In.) 0-18  NRCS Hydr	iption (Description, D=Dep  Hue_10YR  A1- Histosol A2 - Histic Ep	ibe to the depth need letion, RM=Reduced Matrix  Color (Moist)  2/1  Indicators (checking)	eded to doc trix, CS=Cove	e wetland are sument the in red/Coated San Colo	ea lies lower  Indicator or or  Indicato	mation: PL=P	e surrounding la	Location	Indicators f A9 - 1 cm M A16 - Coast	luck (LRR I, J) Prairie Redox	<b>c Soils<sup>1</sup></b> (LRR F, G, H)	
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Remarks:  SOILS Profile Descrication (Type: C=Concert  Depth (In.) 0-18  NRCS Hydr	The soil is of iption (Description, D=Depoint Intration, D=Depoint Intra	ibe to the depth need letion, RM=Reduced Materian Matrix  Color (Moist)  2/1  Indicators (check in Sulfide at Layers (LRR F) lick (LRR FGH) led Below Dark Surface Dark Surface	eded to doc trix, CS=Cove	e wetland are  sument the ir  red/Coated Sar  Colo  Colo  So Colo  So Colo  So Colo  Fo Sand  Fo Stripp  Fo Stripp  Fo Fo Redo  Fo Redo	ea lies lower  Indicator or ond Grains; Local  Indicator or on	mottl  mation: PL=P  Mottl	e surrounding la	Location	Indicators f A9 - 1 cm M A16 - Coast S7 - Dark Si F16 - High F F18 - Reduc TF2 - Red F TF12 - Very	luck (LRR I, J) Prairie Redox urface (LRR G) Plains Depressiced Vertic Parent Material	c Soils <sup>1</sup> (LRR F, G, H)  Ons (LRR H, outside MLRA 72, 73)	
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## WETLAND DETERMINATION DATA FORM Great Plains Region

Project/Site:	L3R				Sample Point: w-155n46w1-d1
VEGETATION (	` ` '	e non-native	species.)		
Tree Stratum (	(Plot size: 30 ft. radius) <u>Species Name</u>	% Cover	Dominant	Ind.Status	Dominance Test Worksheet
1.	<u> </u>	<u>70 0010.</u>	<u> </u>		
2.					Number of Dominant Species that are OBL, FACW, or FAC: 2 (A)
3.					
4.					Total Number of Dominant Species Across All Strata:(B)
5.					
6.					Percent of Dominant Species That Are OBL, FACW, or FAC: 100.0% (A/B)
7.					
8.					Prevalence Index Worksheet
9.					Total % Cover of: Multiply by:
10.					OBL spp. 0
	Total Cover =	0	_		FACW spp. 10
0 - 1 - 70 - 17	O(1) (D(1) (1) (1) (1) (1) (1)				FAC spp. $5$ $\times 3 = 15$
	Stratum (Plot size: 15 ft. radius)				FACU spp. 0
1. 2.					$\frac{0}{1} \qquad \frac{0}{1} \qquad \frac{1}{1} \qquad \frac{1}$
3.					Total 15 (A) 35 (B)
4.					- Total 15 (A)(B)
5.					Prevalence Index = B/A = 2.333
6.					2.555
7.					
8.					Hydrophytic Vegetation Indicators:
9.					Rapid Test for Hydrophytic Vegetation
10.					X Dominance Test is > 50%
	Total Cover =	0			X Prevalence Index is ≤ 3.0 *
			_		Morphological Adaptations (Explain) *
Herb Stratum (	Plot size: 5 ft. radius)				Problem Hydrophytic Vegetation (Explain) *
1.	Persicaria maculosa	10	Υ	FACW	
2.	Echinochloa crus-galli	5	Υ	FAC	* Indicators of hydric soil and wetland hydrology must be
3.			<u> </u>		present, unless disturbed or problematic.
4.					Definitions of Vegetation Strata:
5.					1
6					Tree - Woody plants 3 in. (7.6cm) or more in diameter at breast
7.					height (DBH), regardless of height.
8.				-	1
9.					Sapling/Shrub - Woody plants less than 3 in. DBH, regardless of height.
10.				-	
11.				,	1
12.					Herb - All herbaceous (non-woody) plants, regardless of size.
13.					1
14.					1
15.					Woody Vines - All woody vines, regardless of height.
	Total Cover =	15			1
	•				
Woody Vine St	ratum (Plot size: 30 ft. radius)				
1.					
2.					
3.					Hydrophytic Vegetation Present? Y
5.					
4.					
	Total Cover =	0			
Remarks:	The wetland vegetation is very sparse; bare	dirt covers	the majori	ity of the v	wetland.
Additional R	Remarks:				