

APPENDIX C: Nova Scotia Wetland Evaluation Technique Field Data Sheet (September 2011)											
Project Name:				Evaluator:			GPS Coordinates:				
PID:		Site Address:									
Sources and Dates of Mapping/Images:											
Evaluation Date:						Site Visit Date:					
Weather Conditions (past 48 hours):											
Seasonal Weather Conditions:											
SECTION ONE: WATERSHED CHARACTERISTICS											
1	Watershed Name (tertiary):			Size: km <sup>2</sup>							
2	% Watershed Land Cover			For:	Nat:	Past/Hay:	Crop:	Urb/Com:	Road:	Other Dev:	
3	% Watershed WL Cover and by Class			Total: %	SM:	BO:	FE:	FM:	FS:	SS: CP: VP:	
<b>SF1</b>	<b>Watershed condition</b>			<b>H</b>	<b>M</b>	<b>L</b>					
<b>SF2</b>	<b>Proportion of WL area in watershed &amp; opportunity for floodwater detention</b>			<b>H</b>	<b>M</b>	<b>L</b>					
SECTION TWO: WETLAND CHARACTERISTICS											
Wetland Type:				WL size: hectares			Landform:		Landscape Position:		
Water flow path:				Wetland Origin:							
1	Water Regime			PF	SF	TF	SS	PS	RfT	IfT AF	
2	# WL's within 30m project area			Total#	SM:	BO:	FE:	FM:	FS:	SS: CP: VP:	
3	Is WL part of complex			Yes	No						
4	% each wetland type in complex			SM:	BO:	FE:	FM:	FS:	SS:	CP: VP:	
5	Is WL bordering or associated with a lake or pond?			bordering		within 100m		N/A		specify	
6	Standing water?			Yes	Avg Dep: % Inundated:			No			
7	Inlet or Outlet (circle all that apply)?			Inlet	Outlet						
8	Adjacent Upland Land Use within 100m (%)			For:	Nat:	PasHay:	Crop:	UrbCm:	Road:	Other Dev:	
9	Are there stressors in WL or WL buffer area? Circle primary stressor(s).			DD __, CW __, WcS __, O/C __, EB __, DP __, F __, M __, ES __, NE __, DwP __, M __, GC __, ATV __, DG __, EA __, R __, Rr __, U/CD __, F __, FA __, other (specify):							
10	Hydrology Altered (circle all that apply)?			Ditching	Dams	Tiles	Culvert	Well	Diversion	Other Specify: _____	
<b>SF3</b>	<b>Rate the general wetland condition/integrity</b>			<b>H</b>	<b>M</b>	<b>L</b>					
SECTION THREE: ADJACENT LAND CONDITION AND INTEGRITY											
1	Average width of adjacent naturalized buffer			____ meters							
2	Widths for water quality			H >15	M 8-15	L <8					
3	Widths for wildlife habitat			H >100	M 15-100	L <15					
4	Adjacent area vegetation condition (list % in each category)			H	M	L					
5	Adjacent area diversity and structure (list % in each category)			H	M	L					
6	Adjacent Upland Slope (list % in each category)			Steep	Mod	Gentle					
7	Adjacent land supports water quality			Yes	No	Specify: _____					
8	Adjacent land supports wildlife habitat			Yes	No	Specify: _____					
<b>SF4</b>	<b>Rate the overall condition and integrity land adjacent to wetland</b>			<b>H</b>	<b>M</b>	<b>L</b>	is buffer required to maintain red flag functions of wetland? <b>If yes if no</b>				
SECTION FOUR: DOCUMENTED IMPORTANT FEATURES											
<b>SF5</b>	<b>Is the WL a WSS?</b>			<b>Yes</b>	<b>No</b>						

SF6	Does the WL support commercial/recreational fish/shellfish?	Yes	No							
SF7	Species of concern (Fed/Prov)? Specify.	End	Thr	SpC	Red	Yellow	S1	S2	S3	N/A
SF8	Wetland has conservation/compensation agreements/activity?	Yes	No	specify:						
SF9	Wetland is calcerous fen, black ash or cedar swamp?	Yes	No							
SF10	Within Drinking Water Protected Area (designated watershed/wellfield)	Yes	No	specify:						
SF11	WL within a floodplain and upstream of or within of a populated area?	Yes	No							
SF12	Fed/Prov/Municipal area of interest?	Yes	No	specify:						
<b>SECTION FIVE: HYDROLOGIC CONDITION AND INTEGRITY</b>										
1	Is WL source of stream or headwater(wc order 1 or 2)	Yes	No	Specify:						
2	Is WL geographically isolated?	Yes	No	Specify:						
3	WL ability to maintain characteristic hydrologic regime	High		Med		Low				
4	Water Storage Depth (list % in each class)	>30cm	15-30cm	up to 15cm		No ponding				
5	Signs of surface water retention observed?	SW__cm, WSL__, WCD__, WM__cm, SM__cm, SD__, AD__, ID__, PMT__, AI__, BT__, AR__, Other:								
6	Describe observable/historical anthropogenic sediment delivery	Low		Med		High				
7	Disturbance of WL soils	Low		Med		High				
8	Predominant soils adjacent to WL	Sand		Silt/loam		Clay/bedrock				
9	Capacity of WL to alter/retard flows	High		Med		Low				
10	Roughness coefficient for surface water flow path	High		Med		Low				
11	Stormwater/Wastewater/Agricultural runoff detention	High		Med		Low				
12	Water Source	Natural		Mostly natural		Partly altered		Controlled		
13	Hydrology of tidal wetlands	Unrestricted		Reduced		Restricted		N/A		
14	Coastal storm surge	Yes	No							
SF13	WL hydrologic condition	Natural	Modified	Significantly Modified						
SF14	WL important for maintaining stream flow?	Yes	No							
SF15	WL ability to detain surface water	High	Med	Low						
<b>SECTION SIX: WATER QUALITY</b>										
1	Stormwater/Wastewater/Agricultural runoff as water source?	High		Med		Low				
2	Nutrients/sediments from surrounding land	High		Med		Low				
3	Significant flood/stormwater attenuation	Yes	No							
4	Vegetation capacity to settle suspended sediments	High		Med		Low				
5	WL type /landscape position holds/filters runoff?	Yes	No							
SF16	Wetland improves water quality?	Yes	No							
SF17	Evidence of excess nutrient loading/contamination?	Low	Med	High						
SF18	WL contributes to water quality in downstream resources	High	Med	Low						
<b>SECTION SEVEN: GROUNDWATER INTERACTIONS</b>										
1	Describe soils in wetland	Recharge		Discharge						
2	Land use / run off in subwatershed upstream	Recharge		Discharge						
3	Conditions of upland soils within 200m of wetland	Recharge		Discharge						
4	Hydroperiod of wetland	Recharge		Discharge						
5	Describe inlet/outlet configuration	Recharge		Discharge						

6	Characterize topographic relief surrounding wetland	Recharge	Discharge							
<b>SF19</b>	<b>WL serves as a recharge site</b>	<b>Yes</b>	<b>No</b>							
<b>SF20</b>	<b>WL serves as a discharge site</b>	<b>Yes</b>	<b>No</b>							
<b>SECTION EIGHT: SHORELINE STABILIZATION AND INTEGRITY</b>										
1	Wetland fringing ocean/estuary/lake/pond/river/stream?	<b>Yes</b>	No	streamwidth >4m	streamwidth<4m	WB Exposed	WB Sheltered			
2	% cover of rooted vegetation in shallow water zone	H >50%	M 10-50	L <10%						
3	Avg veg WL width b/w shoreline/streambank & 2 m depth contour	H >10m	M 3-10	L <3m						
4	Prevalence of strong-stemmed emerg. veg (shoreline marshes and fens only)	High	Med	Low						
5	Describe shoreline erosion potential	High	Med	Low						
6	Shoreline/streambank veg condition upslope of water level	Low	Med	High	Artificial					
<b>SF21</b>	<b>WL ability to stabilize shoreline</b>	<b>H</b>	<b>M</b>	<b>L</b>	N/A					
<b>SECTION NINE: PLANT COMMUNITY</b>										
1	Vegetation diversity	High	Med	Low						
1b	Dominant plant species and % cover in the WL	list:								
3	Dominant Non-native or Invasive species and % cover	Yes	No	specify: %						
4	Vegetation Disturbance	H	M	L	specify type(s) below					
5	Disturbance Types	H __,ATV __,G __,M __,In __, D/D __, Im __, OAH __, li __, Sd __,E __,other __,								
7	Vegetative Integrity of plant community	E	H	M	L					
<b>SF22</b>	<b>Is the plant community unique or rare regionally or provincially?</b>	<b>Yes</b>	<b>no</b>	<b>specify:</b>						
<b>SF23</b>	<b>Does the WL contain a diversity of plant communities</b>	<b>H</b>	<b>M</b>	<b>L</b>						
<b>SF24</b>	<b>Rate the overall integrity/quality of plant community?</b>	<b>H</b>	<b>M</b>	<b>L</b>						
<b>SF25</b>	<b>Are there any observed rare or endangered plant species? Specify.</b>	<b>End</b>	<b>Thr</b>	<b>SpC</b>	<b>Red</b>	<b>Yellow</b>	<b>S1</b>	<b>S2</b>	<b>S3</b>	<b>N/A</b>
<b>SECTION TEN: FISH AND WILDLIFE HABITAT AND INTEGRITY</b>										
1	Interspersion of open water and vegetation (open water types only)	H	M	L						
1b	% cover in vegetation versus open water	____%								
2	Interspersion that best fits entire wetland	H	M	L	N/A					
3	Wetland condition related to detritus	H	M	L	N/A					
4	Interspersion of other wetlands in vicinity	H	M	L						
6	Barriers/restriction between wetland and other habitat	L	M	H						
7	Noteworthy wildlife or evidence (birds, mammals, amphibians,etc)	Yes	No	list:						
8	Connected to permanent water (accessible to fish)?	Exceptional	High	Med	Low	N/A				
9	Fish species observed or evidence seen (list)	Yes	No	list:						
10	Wetland part of contiguous upland or wetland:	>50ha	25-50ha	10-25ha	<10ha					
11	WL provides habitat for:	Amphibians	Reptiles	Waterfowl	Waterbirds	Mammals	Fish	R/E species		
<b>SF26</b>	<b>Does wetland support fish/fish habitat?</b>	<b>Yes</b>	<b>No</b>	<b>specify:</b>						
<b>SF27</b>	<b>Rare or endangered fish/wildlife species found in the wetland?</b>	<b>End</b>	<b>Thr</b>	<b>SpC</b>	<b>Red</b>	<b>Yellow</b>	<b>S1</b>	<b>S2</b>	<b>S3</b>	<b>N/A</b>
<b>SF28</b>	<b>Overall fish and wildlife habitat quality</b>	<b>H</b>	<b>M</b>	<b>L</b>						
<b>SECTION ELEVEN: COMMUNITY USE/VALUE</b>										
1	Describe community use	VV __,CP __,CO __,PO __,PA __,AV __,GB __,E __,HI __, WV __, BO __,HU __, PG __, BP __,F __, E __, R __, Other:								
<b>SF29</b>	<b>Rate the wetland's community use/value</b>	<b>H</b>	<b>M</b>	<b>L</b>						

**SF** ratings highlighted in red indicate critical wetland functions or watershed conditions that are highly degraded. Whenever a wetland is found to have red-highlighted **SFs** the proponent is encouraged to contact NSE for advice about the approval because NSE is unlikely to approve alterations to wetlands that would affect these red-rated functions.