

Bridge Culvert Inspection			
Bridge File Number	77279 -1 Bridge Culvert	Form Type	CUL1
Year Built	1971	Lot No.	4
Bridge or Town Name	MUSKEG RIVER	Inspector Name	Russel Vanderschaaf
Located Over	LONE TEEPEE CREEK, 8.10.58.31.8, WATERCRS-ST	Inspector Class	BR CLS B
Located On	40:32 C1 35.747	Assistant Name	
Water Body Cl./Year		Assistant Class	
Navigabil. Cl./Year		Inspection Date	22-Aug-2012
Legal Land Location	NW SEC 17 TWP 56 RGE 4 W6M	Data Entry By	Theresa Lacusta
Longitude, Latitude	-118:33:48, 53:50:47	Data Entry Date	26-Sep-2012
Road Authority	Alberta Transportation (AIT)	Reviewer Name	Eric Carcoux
Contract Main. Area	CMA05	Review Date	24-Sep-2012
Clear Roadway/Skew	8.2 / 0 deg.	Dept. Reviewer Name	Steve Pasquan
AADT/Year	1,090 / 2011 (A)	Dept. Review Date	04-Jan-2013
Road Classification	RAU-209-110	Follow-Up By	
Detour Length (km)	100		

Bridge Culvert Information

Number of Culverts	1							
Pipe #	Barrel	Span	Rise (or Dia.)	Type	Length	Corr. Profile	Pl./Slab Thickness	Shape
1	MAIN	-	2430	SP	73.2	152X51	3.5	ROUND
Special Features								
Special Features Comment								

Utilities (Located at)

Utility Attachments			
Telephone	North r/w	Gas	
Power		Municipal	
Others		Problem (Y/N)	No
Remarks			

Approach Road / Embankment

		Last	Now	Explanation of Condition
Horizontal Alignment		6	6	Direction of passing changes.
Vertical Alignment		6	6	At bottom of sag curve with gradual horizontal curve at bottom.
Roadway Width (m)	8.200			
Embankment		8	4	Embankment under construction, access is near road shoulder currently.(road widening).
Sideslope (__:1)	3.0			
(Height of Cover(m) : 7.4)				
Guardrail (Y/N)	Yes			
Approach Road / Embankment General Rating		6	6	

Upstream End

Culvert Component		Last	Now	Explanation of Condition
Direction		W		
End Treatment (Concrete, Steel, Others, None)	STEEL			
Headwall		X	X	
Collar		X	X	
Wingwalls		X	X	
(Shape :)				
Cutoff Wall		X	X	

Upstream End				
Culvert Component		Last	Now	Explanation of Condition
Bevel End		N	7	
Heaving (mm)	300			
Invert Above/Below Stream Bed				
Above/Below (mm)	0			
Scour Protection		N	7	
(Type : RIP RAP)				
(Avg. Rock Size(mm) : 300)				
Scour/Erosion		N	7	
Beavers (Y/N)	No			
Upstream End General Rating		7	7	
Bridge Culvert Barrel				
Culvert Component		Last	Now	Explanation of Condition
(Pipe # : 1 , Primary Span, Location Code: MAIN , Span (mm): , Rise (mm): 2430 , Type: SP)				
Barrel Last Accessible Date	22-Aug-2012			
Special Features				
Special Feature				
(Type :)				
Special Feature				
(Type :)				
Roof		7	7	
Measured Rise (mm)	2378			
Measured At Ring No.	14			
Sag (mm)	52			
Percent Sag	2			
Sidewall		7	7	
Measured Span (mm)	2452			
Measured At Ring No.	14			
Deflection (mm)	22			
Percent Deflection	1			
Floor		6	4	Crests starting to sharpen due to abrasion.
Bulge (mm)	0			
Measured At Ring No.	14			
Abrasion (Y/N)	Yes			
Circumferential Seams		6	4	Missing 4 bolts RH @.
Separation (mm)	0			
Longitudinal Seams		6	6	
Total No. of Cracked Rings	0			
Total No. of Rings with Two Cracked Seams				2N Stagger
Min. Remaining Steel Between Cracks (mm)				
Proper Lap (Y/N)	No			
Longitudinal Stagger (Y/N)	Yes			
Coating		6	4	Bottom 600mm is abraided.
Corrosion By Soil (Y/N)	No			
Corrosion By Water (Y/N)	Yes			
Camber POS/ZERO/NEG	POS			
Ponding (Y/N)	No			

Bridge Culvert Barrel				
Culvert Component		Last	Now	Explanation of Condition
(Pipe # : 1, Primary Span, Location Code: MAIN, Span (mm): , Rise (mm): 2430, Type: SP)				
Fish Passage Adequacy		4	4	
Baffle		X	X	
(Type :)				
Waterway Adequacy		N	N	
Icing (Y/N)	No			
Silting (Y/N)	No			
Drift (Y/N)	No			
Barrel General Rating		7	7	
Downstream End				
Culvert Component		Last	Now	Explanation of Condition
Direction		E		
End Treatment (Concrete, Steel, Others, None)	STEEL			
Headwall		X	X	
Collar		X	X	
Wingwalls		X	X	
(Shape :)				
Cutoff Wall		X	X	
Bevel End		N	7	
Heaving (mm)	0			
Invert Above/Below Stream Bed	ABOVE			
Above/Below (mm)	400			
Scour Protection		N	4	
(Type : RIP RAP)				
(Avg. Rock Size(mm) : 300)				
Scour/Erosion		N	4	
Beavers (Y/N)	No			
Downstream End General Rating		4	4	GR carried over from May 24, 2007
Structure Usage				
		Last	Now	Explanation of Condition
Channel (U/S and D/S)				
Alignment		8	8	
Bank Stability		7	7	Vertical banks D/S. Cut bank at D/S end - appears to be stable.
HWM (m below Top of Culvert)	2.0			(HWM drift at U/S end minor - 00/01/22)
Drift (Y/N)	No			
Channel Bottom Degrading/Aggrading	DEGRADING			
Beavers (Y/N)	No			
(Fish Compensation Measure 1 : NONE)				
(Fish Compensation Measure 2 : NONE)				
Channel General Rating		7	8	

Maintenance Recommendations							
Inspector Recommendations	Year	Inspector Comments	Department Comments	Target Year	Est. Cost	Cat #	
SHOTCRETE REPAIRS							
PLACE ADDITIONAL RIP RAP							
REMOVE DRIFT ACCUMULATION							
INSTALL CONCRETE/STEEL LINING							
INSTALL STRUTS							
INSTALL CONCRETE COLLAR/CUTOFF							
REPAIR SEAMS							
OTHER ACTION							
OTHER ACTION							
OTHER ACTION							
OTHER ACTION							
Structural Condition Rating (Last/Now) (%)	77.8/77.8	Sufficiency Rating (Last/Now) (%)	72.4/73.1	Est. Repl. Yr	2021	Maint. Req. (Y/N)	No
Special Comments for Next Inspection	Monitor d/s scour.		Department Comments				
Maintenance Reviewed By			Date			Estimated Total	0
Proposed Long-Term Strategy							
On 3-Year Program (Y/N)							
Proposed Action							
Previous Inspector's Name	Russel Vanderschaaf		Previous Assistant's Name				
Next Inspection Date	22-May-2014		Previous Inspection Date	17-Nov-2010			
Inspection Cycle (Default) (months)	21						
Comment							