

Bridge Culvert Inspection			
Bridge File Number	77309 -1 Bridge Culvert	Form Type	CUL1
Year Built	1982	Lot No.	2
Bridge or Town Name	WHITEMUD CRE	Inspector Name	Brian Pientsch
Located Over	2ND ORDER TRIBUTARY TO LITTLE SMOKY RIVER, 8.10.58.7.1.3, WATERCRS-ST	Inspector Class	BR CLS A
		Assistant Name	Lisbeth Medina
Located On	676:04 C1 0.499	Assistant Class	
Water Body Cl./Year		Inspection Date	02-Feb-2011
Navigabil. Cl./Year		Data Entry By	Theresa Lacusta
Legal Land Location	SW SEC 6 TWP 75 RGE 23 W5M	Data Entry Date	01-Mar-2011
Longitude, Latitude	-117:33:47, 55:27:42	Reviewer Name	Arnold Assenheimer
Road Authority	Alberta Transportation (AIT)	Review Date	22-Feb-2011
Contract Main. Area	CMA03	Dept. Reviewer Name	Steve Pasquan
Clear Roadway/Skew	9 / -6 deg. (LHF)	Dept. Review Date	21-Nov-2011
AADT/Year	180 / 2010 (A)	Follow-Up By	
Road Classification	RCU-209-110		
Detour Length (km)	6		

Bridge Culvert Information								
Number of Culverts		1						
Pipe #	Barrel	Span	Rise (or Dia.)	Type	Length	Corr. Profile	PI./Slab Thickness	Shape
1	MAIN	-	2400	MP	27	75X25	2.8	ROUND
Special Features								
Special Features Comment								

Utilities (Located at)			
Utility Attachments			
Telephone	South r/w	Gas	
Power	15m north of c/l - 1 wire OH	Municipal	
Others		Problem (Y/N)	No
Remarks			

Approach Road / Embankment				
		Last	Now	Explanation of Condition
Horizontal Alignment		7	7	
Vertical Alignment		8	8	
Roadway Width (m)	9.000			
Embankment		4	4	SW ditch scour 1.3m x 3m x .75m - filled with drift.-23-Oct-2007
Sideslope ( __ :1)	4.0			
(Height of Cover(m) : 1.8)				
Guardrail (Y/N)	No			
<b>Approach Road / Embankment General Rating</b>		<b>7</b>	<b>7</b>	

Upstream End				
Culvert Component		Last	Now	Explanation of Condition
Direction		S		
End Treatment (Concrete, Steel, Others, None)	CONCRETE			
Headwall		7	7	
Collar		7	N	Under snow
Wingwalls		X	X	
(Shape : )				
Cutoff Wall		N	N	

Upstream End				
Culvert Component		Last	Now	Explanation of Condition
Bevel End		6	N	Bevel under snow
Heaving (mm)	0			
Invert Above/Below Stream Bed	BELOW			
Above/Below (mm)	150			
Scour Protection		6	N	Under snow
(Type : <b>RIP RAP</b> )				
(Avg. Rock Size(mm) : <b>400</b> )				
Scour/Erosion		6	N	Under snow
Beavers (Y/N)	No			
<b>Upstream End General Rating</b>		<b>6</b>	<b>6</b>	GR carried fwd.
Bridge Culvert Barrel				
Culvert Component		Last	Now	Explanation of Condition
(Pipe # : <b>1</b> , Primary Span, Location Code: <b>MAIN</b> , Span (mm): , Rise (mm): <b>2400</b> , Type: <b>MP</b> )				
Barrel Last Accessible Date	23-Oct-2007			Couldn't be inspected, 0.6m ice level to crown.
<b>Special Features</b>				
Special Feature				
(Type : )				
Special Feature				
(Type : )				
Roof		4	N	@ c.l.-23-Oct-2007
Measured Rise (mm)	2220			
Measured At Ring No.				
Sag (mm)	180			
Percent Sag	8			
Sidewall		4	N	50 MM DENT IN WEST SIDEWALL FROM TIME OF CONSTRUCTION.-23-Oct-2007
Measured Span (mm)	2595			
Measured At Ring No.				@ c.l.-23-Oct-2007
Deflection (mm)	195			
Percent Deflection	8			
Floor		7	N	@ c.l.-23-Oct-2007
Bulge (mm)	0			
Measured At Ring No.				
Abrasion (Y/N)	No			
Circumferential Seams		5	N	
Separation (mm)	70			
Longitudinal Seams		X	X	
Total No. of Cracked Rings				
Total No. of Rings with Two Cracked Seams				
Min. Remaining Steel Between Cracks (mm)				
Proper Lap (Y/N)				
Longitudinal Stagger (Y/N)				
Coating		5	N	Superficial rust lower third.-23-Oct-2007
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): 2400, Type: MP)				
Fish Passage Adequacy		3	3	Outlet above S.B.-23-Oct-2007
Baffle		X	X	
(Type : )				
Waterway Adequacy		4	N	Drift on inlet.-23-Oct-2007
Icing (Y/N)	No			
Silting (Y/N)	No			
Drift (Y/N)	No			
<b>Barrel General Rating</b>		<b>4</b>	<b>4</b>	GR carried forward.
Downstream End				
Culvert Component		Last	Now	Explanation of Condition
Direction		N		D/S end completely submerged in snow.
End Treatment (Concrete, Steel, Others, None)		NONE		
Headwall		X	X	
Collar		X	X	
Wingwalls		X	X	
(Shape : )				
Cutoff Wall		X	X	
Bevel End		5	N	Bevel unsupported for 1000mm.-23-Oct-2007 Under snow
Heaving (mm)	60			
Invert Above/Below Stream Bed		ABOVE		Scour hole 8m x 4m x 0.8m (photo).-23-Oct-2007 Under snow
Above/Below (mm)	800			
Scour Protection		3	N	
(Type : )				
(Avg. Rock Size(mm) : )				
Scour/Erosion		3	N	Scour hole.-23-Oct-2007 Under snow
Beavers (Y/N)		No		
<b>Downstream End General Rating</b>		<b>3</b>	<b>3</b>	GR carried forward.
Structure Usage				
		Last	Now	Explanation of Condition
Channel (U/S and D/S)				
Alignment		6	6	Banks sloughing
Bank Stability		5	5	
HWM (m below Top of Culvert)		-1.8		(Road overtopped 1996, 1997)-23-Oct-2007
Drift (Y/N)		No		
Channel Bottom Degrading/Aggrading		DEGRADING		
Beavers (Y/N)		No		
(Fish Compensation Measure 1 : NONE)				
(Fish Compensation Measure 2 : NONE)				
<b>Channel General Rating</b>		<b>5</b>	<b>6</b>	

Maintenance Recommendations							
Inspector Recommendations	Year	Inspector Comments	Department Comments	Target Year	Est. Cost	Cat #	
SHOTCRETE REPAIRS							
PLACE ADDITIONAL RIP RAP	2011	D/S end.-23-Oct-2007					
REMOVE DRIFT ACCUMULATION							
INSTALL CONCRETE/STEEL LINING							
INSTALL STRUTS							
INSTALL CONCRETE COLLAR/CUTOFF							
REPAIR SEAMS							
OTHER ACTION							
OTHER ACTION							
OTHER ACTION							
OTHER ACTION							
<b>Structural Condition Rating (Last/Now) (%)</b>	<b>44.4/44.4</b>	<b>Sufficiency Rating (Last/Now) (%)</b>	<b>39.8/56.0</b>	Est. Repl. Yr	2027	Maint. Req. (Y/N)	Yes
Special Comments for Next Inspection	Monitor d/s scour, monitor deflection.-23-Oct-2007 Couldn't confirm if above maintenance was completed due to snow cover.		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	Eric Carcoux		Previous Assistant's Name				
Next Inspection Date	02-May-2014		Previous Inspection Date	23-Oct-2007			
Inspection Cycle (Default) (months)	39						
Comment							