

Bridge Culvert Inspection				
Bridge File Number	07777 -1 Bridge Culvert		Form Type	CULE
Year Built	1977		Lot No.	2
Bridge or Town Name	GRANDE PRAIR		Inspector Name	Russel Vanderschaaf
Located Over	TRIBUTARY TO BEAR RIVER, 8.10.58.18.2.2, WATERCRS-ST		Inspector Class	BR CLS B
Located On	43:04 R1 7.825;43:04 L1 7.823		Assistant Name	
Water Body Cl./Year			Assistant Class	
Navigabil. Cl./Year			Inspection Date	29-Nov-2012
Legal Land Location	SE SEC 15 TWP 72 RGE 5 W6M		Data Entry By	Theresa Lacusta
Longitude, Latitude	-118:40:20, 55:13:44		Data Entry Date	17-Dec-2012
Road Authority	Alberta Transportation (AIT)		Reviewer Name	Eric Carcoux
Contract Main. Area	CMA05		Review Date	17-Dec-2012
Clear Roadway/Skew	28.7 /		Dept. Reviewer Name	Steve Pasquan
AADT/Year	5,880 / 2011 (A)		Dept. Review Date	03-Jan-2013
Road Classification	RAD-412.4-120		Follow-Up By	
Detour Length (km)	1			

Bridge Culvert Information

Number of Culverts	1							
Pipe #	Barrel	Span	Rise (or Dia.)	Type	Length	Corr. Profile	Pl./Slab Thickness	Shape
1	MAIN	-	2100	SP	49.4	152X51	3.5	ROUND
1	D/S	-	2200	MP	79	152X25	3.5	ROUND
Special Features								
Special Features Comment								

Utilities (Located at)

Utility Attachments			
Telephone	S. r/w	Gas	
Power	N r/w 4 wire.	Municipal	
Others		Problem (Y/N)	No
Remarks			

Approach Road / Embankment

		Last	Now	Explanation of Condition
Horizontal Alignment		7	7	RR 52, 200m East.
Vertical Alignment		7	7	Service road u/s end 4.8.
Roadway Width (m)	31.100			13.0m EBL, 13.3 WBL.
Embankment		N	N	Barrier at d/s end is broken apart and should be removed.-05-May-2009 Erosion control. Snow covered.
Sideslope (__:1)	6.0			
(Height of Cover(m) : 2.4)				
Guardrail (Y/N)	No			
Approach Road / Embankment General Rating		7	7	

Upstream End

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

Upstream End				
Culvert Component		Last	Now	Explanation of Condition
Cutoff Wall		X	X	
Bevel End		N	7	Covered by drifted snow.
Heaving (mm)	0			
Invert Above/Below Stream Bed	BELOW			
Above/Below (mm)	500			
Scour Protection		N	N	Riprap shifted @ W., exposing geotextile (photo) riprap in barrel.-05-May-2009 Snow covered.
(Type : RIP RAP)				
(Avg. Rock Size(mm) : 200)				
Scour/Erosion		N	N	Scour on both sides of barrel 1x2x3 at W. side.-05-May-2009 Snow covered.
Beavers (Y/N)	No			
Upstream End General Rating		3	3	GR carried over-05-May-2009
Bridge Culvert Barrel				
Culvert Component		Last	Now	Explanation of Condition
(Pipe # : 1 , Primary Span, Location Code: MAIN , Span (mm): , Rise (mm): 2100 , Type: SP)				
Barrel Last Accessible Date	29-Nov-2012			Inaccessible, end drifted in with snow, d/s portion ice. 2.0m from crown.
Special Features				
Special Feature				
(Type :)				
Special Feature				
(Type :)				
Roof		N	7	At C.L. EBL
Measured Rise (mm)				Ice covered, risde estimated.
Measured At Ring No.				outward deflection.
Sag (mm)	62			
Percent Sag	3			
Sidewall		N	7	At C.L. EBL R4 from csp
Measured Span (mm)	2038			Inward deflection
Measured At Ring No.				
Deflection (mm)	62			
Percent Deflection	3			
Floor		N	N	ice covered
Bulge (mm)	0			
Measured At Ring No.				
Abrasion (Y/N)	No			
Circumferential Seams		N	7	
Separation (mm)	20			
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)	No			
Longitudinal Stagger (Y/N)	No			
Coating		N	7	
Corrosion By Soil (Y/N)	No			
Corrosion By Water (Y/N)	Yes			

Bridge Culvert Barrel				
Culvert Component		Last	Now	Explanation of Condition
(Pipe # : 1, Primary Span, Location Code: MAIN, Span (mm): , Rise (mm): 2100, Type: SP)				
Camber POS/ZERO/NEG	ZERO			
Ponding (Y/N)	No			
Fish Passage Adequacy		7	7	
Baffle		X	X	
(Type :)				
Waterway Adequacy		N	7	
Icing (Y/N)	No			
Silting (Y/N)	No			
Drift (Y/N)	No			
Barrel General Rating		N	7	
Bridge Culvert Barrel				
Culvert Component		Last	Now	Explanation of Condition
(Pipe # : 1, Primary Span, Location Code: D/S, Span (mm): , Rise (mm): 2200, Type: MP)				
Barrel Last Accessible Date	29-Nov-2012			U/S portion ice 1.46m from crown.
Special Features				
Special Feature				
(Type :)				
Special Feature				
(Type :)				
Roof		N	8	At C.L. EBL
Measured Rise (mm)				Estimated due to ice Outward deflection
Measured At Ring No.				
Sag (mm)	9			
Percent Sag	0			
Sidewall		N	8	At C.L. EBL R4 from CSP Inward deflection.
Measured Span (mm)	2194			
Measured At Ring No.				
Deflection (mm)	6			
Percent Deflection	0			
Floor		N	N	Ice covered.
Bulge (mm)	0			
Measured At Ring No.				
Abrasion (Y/N)	No			
Circumferential Seams		N	7	
Separation (mm)	20			
Longitudinal Seams		X	7	
Total No. of Cracked Rings				
Total No. of Rings with Two Cracked Seams				
Min. Remaining Steel Between Cracks (mm)				
Proper Lap (Y/N)	No			
Longitudinal Stagger (Y/N)	Yes			
Coating		N	7	
Corrosion By Soil (Y/N)	No			
Corrosion By Water (Y/N)	Yes			

Bridge Culvert Barrel				
Culvert Component		Last	Now	Explanation of Condition
(Pipe # : 1, Primary Span, Location Code: D/S, Span (mm): , Rise (mm): 2200, Type: MP)				
Camber POS/ZERO/NEG	ZERO			
Ponding (Y/N)	No			
Fish Passage Adequacy		7	7	
Baffle		X	X	
(Type :)				
Waterway Adequacy		N	7	
Icing (Y/N)	No			
Siltng (Y/N)	No			
Drift (Y/N)	No			
Barrel Extension General Rating		N	7	

Downstream End				
Culvert Component		Last	Now	Explanation of Condition
Direction		S		
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	BELOW			
Above/Below (mm)	300			
Scour Protection		N	N	Covered by snow.
(Type : RIP RAP)				
(Avg. Rock Size(mm) : 200)				
Scour/Erosion		N	N	Snow covered.
Beavers (Y/N)	No			
Downstream End General Rating		7	7	

Structure Usage				
		Last	Now	Explanation of Condition
Channel (U/S and D/S)				
Alignment		6	6	
Bank Stability		6	N	U/S banks sloughing.-05-May-2009 Snow covered.
HWM (m below Top of Culvert)				No HWM visible
Drift (Y/N)	Yes			
Channel Bottom Degrading/Aggrading				Stable.
Beavers (Y/N)	No			
(Fish Compensation Measure 1 : NONE)				
(Fish Compensation Measure 2 : NONE)				

Structure Usage				
		Last	Now	Explanation of Condition
Channel General Rating		6	6	

Maintenance Recommendations							
Inspector Recommendations	Year	Inspector Comments	Department Comments	Target Year	Est. Cost	Cat #	
SHOTCRETE REPAIRS							
PLACE ADDITIONAL RIP RAP	2013	2m3 Class 1, carried over 05-May-2009					
REMOVE DRIFT ACCUMULATION							
INSTALL CONCRETE/STEEL LINING							
INSTALL STRUTS							
INSTALL CONCRETE COLLAR/CUTOFF							
REPAIR SEAMS							
OTHER ACTION	2013	Remove silt fence at d/s end.-carried over 05-May-2009					
OTHER ACTION							
OTHER ACTION							
OTHER ACTION							
Structural Condition Rating (Last/Now) (%)	55.6/77.8	Sufficiency Rating (Last/Now) (%)	68.0/71.5	Est. Repl. Yr	2034	Maint. Req. (Y/N)	Yes
Special Comments for Next Inspection			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	29-Aug-2014		Previous Inspection Date	08-Mar-2011			
Inspection Cycle (Default) (months)	21						
Comment							