

Bridge Culvert Inspection			
Bridge File Number	81219 S-2 Bridge Culvert	Form Type	CULM
Year Built	2002	Lot No.	4
Bridge or Town Name	GRASSLAND	Inspector Name	Eric Carcoux
Located Over	TRIBUTARY TO PINE CREEK, 8.11.55.5.1, WATERCRS-ST	Inspector Class	BR CLS A
Located On	63:01 C1 60.704	Assistant Name	
Water Body Cl./Year		Assistant Class	
Navigabil. Cl./Year		Inspection Date	13-Jan-2012
Legal Land Location	SE SEC 25 TWP 67 RGE 18 W4M	Data Entry By	Theresa Lacusta
Longitude, Latitude	-112:36:03, 54:49:13	Data Entry Date	17-Jan-2012
Road Authority	Alberta Transportation (AIT)	Reviewer Name	Arnold Assenheimer
Contract Main. Area	CMA07	Review Date	16-Jan-2012
Clear Roadway/Skew	10.2 /	Dept. Reviewer Name	Brent Herrick
AADT/Year	4,610 / 2010 (A)	Dept. Review Date	18-Jan-2012
Road Classification	RAU-210-110	Follow-Up By	
Detour Length (km)	13		

Bridge Culvert Information

Number of Culverts	2							
Pipe #	Barrel	Span	Rise (or Dia.)	Type	Length	Corr. Profile	Pl./Slab Thickness	Shape
1	MAIN	-	1524	SSP	32.3		12.7	ROUND
2	MAIN	-	1524	SSP	32.3		12.7	ROUND
Special Features								
Special Features Comment								

Utilities (Located at)

Utility Attachments			
Telephone	South r/w & North r/w.	Gas	
Power	3 lines North r/w & 1 line 20m West. Power service over highway 20 metres to West.	Municipal	
Others	Fibre optic North r/w.	Problem (Y/N)	No
Remarks			

Approach Road / Embankment

	Last	Now	Explanation of Condition
Horizontal Alignment	7	7	No BF tags installed.
Vertical Alignment	9	9	Residence approaches in area.
Roadway Width (m)	10.200		
Embankment	8	8	
Sideslope (_ :1)	3.0		
(Height of Cover(m) : 1.6)			
Guardrail (Y/N)	No		
Approach Road / Embankment General Rating	7	7	

Upstream End

Culvert Component	Last	Now	Explanation of Condition
(Pipe # : 1, Span Type: Primary Span)			
Direction	S		West pipe.
End Treatment (Concrete, Steel, Others, None)	STEEL		
Headwall	X	X	
Collar	X	X	

Upstream End				
Culvert Component		Last	Now	Explanation of Condition
(Pipe # : 1, Span Type: Primary Span)				
Wingwalls		X	X	
(Shape :)				
Cutoff Wall		X	X	
Bevel End		8	8	
Heaving (mm)	0			
Invert Above/Below Stream Bed				
Above/Below (mm)	0			
Scour Protection		7	7	
(Type : RIP RAP, GEOTEXTILE)				
(Avg. Rock Size(mm) : 450)				
Scour/Erosion		7	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): 1524, Type: SSP)				
Barrel Last Accessible Date	13-Jan-2012			
Special Features				
Special Feature				
(Type :)				
Special Feature				
(Type :)				
Roof		7	7	Ice on floor - sag est.
Measured Rise (mm)	1482			
Measured At Ring No.	3			(1482-02-Mar-2010)
Sag (mm)	17			
Percent Sag	1			
Sidewall		7	7	
Measured Span (mm)	1525			
Measured At Ring No.	3			
Deflection (mm)	1			
Percent Deflection	0			
Floor		7	7	Ice 600 wide.
Bulge (mm)	0			
Measured At Ring No.	3			
Abrasion (Y/N)	No			
Circumferential Seams		5	5	Lower 1/4 interior weld not completed. Exterior welds took to have been completed.
Separation (mm)	0			
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)				

Bridge Culvert Barrel				
Culvert Component		Last	Now	Explanation of Condition
(Pipe # : 1, Primary Span, Location Code: MAIN, Span (mm): , Rise (mm): 1524, Type: SSP)				
Coating		5	5	No coating, plain steel.
Corrosion By Soil (Y/N)	No			
Corrosion By Water (Y/N)	Yes			
Camber POS/ZERO/NEG	ZERO			
Ponding (Y/N)	No			
Fish Passage Adequacy		7	7	
Baffle		7	7	
(Type : WEIR)				
Waterway Adequacy		7	7	
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
(Pipe # : 1, Span Type: Primary Span)				
Direction		N		West pipe.
End Treatment (Concrete, Steel, Others, None)	STEEL			
Headwall		X	X	
Collar		X	X	
Wingwalls		X	X	
(Shape :)				
Cutoff Wall		X	X	
Bevel End		8	8	
Heaving (mm)	0			
Invert Above/Below Stream Bed				
Above/Below (mm)	0			
Scour Protection		7	7	
(Type : RIP RAP, GEOTEXTILE)				
(Avg. Rock Size(mm) : 450)				
Scour/Erosion		7	7	
Beavers (Y/N)	No			
Downstream End General Rating		7	7	

Upstream End				
Culvert Component		Last	Now	Explanation of Condition
(Pipe # : 2, Span Type: Secondary Span)				
Direction		S		East pipe.
End Treatment (Concrete, Steel, Others, None)	STEEL			
Headwall		X	X	
Collar		X	X	

Upstream End				
Culvert Component		Last	Now	Explanation of Condition
(Pipe # : 2, Span Type: Secondary Span)				
Wingwalls		X	X	
(Shape :)				
Cutoff Wall		X	X	
Bevel End		8	8	
Heaving (mm)	0			
Invert Above/Below Stream Bed				
Above/Below (mm)	0			
Scour Protection		7	7	
(Type : RIP RAP, GEOTEXTILE)				
(Avg. Rock Size(mm) : 450)				
Scour/Erosion		7	7	
Beavers (Y/N)	No			
Upstream End General Rating		7	7	

Bridge Culvert Barrel				
Culvert Component		Last	Now	Explanation of Condition
(Pipe # : 2, Secondary Span, Location Code: MAIN, Span (mm): , Rise (mm): 1524, Type: SSP)				
Barrel Last Accessible Date	13-Jan-2012			
Special Features				
Special Feature				
(Type :)				
Special Feature				
(Type :)				
Roof		7	7	Ice on floor - sag est
Measured Rise (mm)	1488			
Measured At Ring No.	2			(1488 02-Mar-2010)
Sag (mm)	11			
Percent Sag	1			
Sidewall		7	7	
Measured Span (mm)	1519			
Measured At Ring No.	2			
Deflection (mm)	20			
Percent Deflection	1			
Floor		8	N	Ice and silt on floor.
Bulge (mm)	0			
Measured At Ring No.				
Abrasion (Y/N)	No			
Circumferential Seams		5	5	Welded inside ring around top 3/4 dia only.
Separation (mm)	0			
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)				

Bridge Culvert Barrel				
Culvert Component		Last	Now	Explanation of Condition
(Pipe # : 2, Secondary Span, Location Code: MAIN, Span (mm): , Rise (mm): 1524, Type: SSP)				
Coating		5	5	No coating, bare steel.
Corrosion By Soil (Y/N)	No			
Corrosion By Water (Y/N)	Yes			
Camber POS/ZERO/NEG	ZERO			
Ponding (Y/N)	No			
Fish Passage Adequacy		7	7	
Baffle		X	X	
(Type :)				
Waterway Adequacy		7	7	200mm silt build-up at d/s 1/2.
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	
(Pipe # : 2, Span Type: Secondary Span)					
Direction		N		East pipe.	
End Treatment (Concrete, Steel, Others, None)	STEEL				
Headwall		X	X		
Collar		X	X		
Wingwalls		X	X		
(Shape :)					
Cutoff Wall		X	X		
Bevel End		8	8		
Heaving (mm)	0				
Invert Above/Below Stream Bed					
Above/Below (mm)	0				
Scour Protection		7	7		
(Type : RIP RAP, GEOTEXTILE)					
(Avg. Rock Size(mm) : 450)					
Scour/Erosion		7	7		
Beavers (Y/N)	No				
Downstream End General Rating		7	7		

Structure Usage				
		Last	Now	Explanation of Condition
Channel (U/S and D/S)				
Alignment		7	7	
Bank Stability		7	7	
HWM (m below Top of Culvert)				HWM not visible.
Drift (Y/N)	No			

Structure Usage				
		Last	Now	Explanation of Condition
Channel Bottom Degrading/Aggrading	AGGRADING			
Beavers (Y/N)	No			
(Fish Compensation Measure 1 : Fish Pond at Upstream End)				Ice covered.
(Fish Compensation Measure 2 : Fish Pond at Downstream End)				
Channel General Rating		7	7	

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) (%)	74.5/74.5	Est. Repl. Yr	2045	Maint. Req. (Y/N)	No
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	Todd Warshawski		Previous Assistant's Name				
Next Inspection Date	13-Oct-2013		Previous Inspection Date	02-Mar-2010			
Inspection Cycle (Default) (months)	21						
Comment							