

Bridge Culvert Inspection				
Bridge File Number	01921 -1 Bridge Culvert		Form Type	CULM
Year Built	1984		Lot No.	1
Bridge or Town Name	ISLAY		Inspector Name	Jason Saly
Located Over	DEER CREEK, 6.5.8, WATERCRS-ST		Inspector Class	BR CLS A
Located On	893:04 C1 19.309		Assistant Name	
Water Body Cl./Year			Assistant Class	
Navigabil. Cl./Year			Inspection Date	29-Nov-2012
Legal Land Location	SW SEC 28 TWP 52 RGE 4 W4M		Data Entry By	Marcia Chavez
Longitude, Latitude	-110:32:47, 53:30:56		Data Entry Date	14-Jan-2013
Road Authority	Alberta Transportation (AIT)		Reviewer Name	John O'Brien
Contract Main. Area	CMA15		Review Date	14-Dec-2012
Clear Roadway/Skew	10.6 /		Dept. Reviewer Name	Andrew Smikles
AADT/Year	290 / 2011 (A)		Dept. Review Date	17-Jan-2013
Road Classification	RCU-209-110		Follow-Up By	
Detour Length (km)	5			

Bridge Culvert Information								
Number of Culverts		2						
Pipe #	Barrel	Span	Rise (or Dia.)	Type	Length	Corr. Profile	Pl./Slab Thickness	Shape
1	MAIN	-	2400	MP	36	125X26	2.8	ROUND
2	MAIN	-	2400	MP	36	125X26	2.8	ROUND
Special Features								
Special Features Comment								

Utilities (Located at)			
Utility Attachments			
Telephone	Plowed in West r/w.		Gas
Power			Municipal
Others			Problem (Y/N) No
Remarks			

Approach Road / Embankment				
		Last	Now	Explanation of Condition
Horizontal Alignment		7	7	Intersection 200m South. Grade rises to South, poor sight distance.
Vertical Alignment		5	5	
Roadway Width (m)	10.600			15mm transverse crack in pavement South of pipe, width of roadway - sealed.
Embankment		8	N	Snow covered.
Sideslope (__:1)	3.0			
(Height of Cover(m) : 2.6)				
Guardrail (Y/N)	No			
Approach Road / Embankment General Rating		5	5	

Upstream End				
Culvert Component		Last	Now	Explanation of Condition
(Pipe # : 1, Span Type: Primary Span)				
Direction		W		North span.
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
(Pipe # : 1, Span Type: Primary Span)				
Cutoff Wall		X	X	
Bevel End		7	7	
Heaving (mm)	50			
Invert Above/Below Stream Bed	BELOW			
Above/Below (mm)	100			
Scour Protection		N	N	Snow covered.
(Type : RIP RAP)				
(Avg. Rock Size(mm) : 300)				
Scour/Erosion		N	N	
Beavers (Y/N)	No			Removed from u/s.
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): 2400, Type: MP)				
Barrel Last Accessible Date	29-Nov-2012			North span.
Special Features				
Special Feature				
(Type :)				
Special Feature				
(Type :)				
Roof		3	3	Minor mower damage to crown. Unable to measure, ice.
Measured Rise (mm)	2160			
Measured At Ring No.	2			
Sag (mm)	240			
Percent Sag	10			
Sidewall		4	4	Span at W end=2556=156mm Span at mid=2638=238mm=9.9% Span at E end=2489=89mm
Measured Span (mm)	2638			
Measured At Ring No.				
Deflection (mm)	238			9.9%
Percent Deflection	10			
Floor		N	N	(Covered with silt, 200mm, heavier at mid span. 09/Sep/2006) - Ice.
Bulge (mm)				
Measured At Ring No.				
Abrasion (Y/N)	No			
Circumferential Seams		7	6	
Separation (mm)	60			
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		6	6	Superficial rusting @ North sidewall, East of 1st seam from U/S.
Corrosion By Soil (Y/N)	Yes			
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): 2400, Type: MP)				
Camber POS/ZERO/NEG	NEG			
Ponding (Y/N)	No			
Fish Passage Adequacy		7	7	
Baffle		X	X	
(Type :)				
Waterway Adequacy		7	7	
Icing (Y/N)	No			
Silting (Y/N)	No			
Drift (Y/N)	Yes			Drift from u/s beaver dam removal.
Barrel General Rating		3	3	
Downstream End				
Culvert Component		Last	Now	Explanation of Condition
(Pipe # : 1, Span Type: Primary Span)				
Direction		E		North span.
End Treatment (Concrete, Steel, Others, None)	STEEL			
Headwall		X	X	
Collar		X	X	
Wingwalls		X	X	
(Shape :)				
Cutoff Wall		X	X	
Bevel End		7	7	
Heaving (mm)	50			
Invert Above/Below Stream Bed	BELOW			
Above/Below (mm)	300			
Scour Protection		N	N	Snow covered.
(Type : RIP RAP)				
(Avg. Rock Size(mm) : 350)				
Scour/Erosion		N	N	
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		W		South span.
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
(Pipe # : 2, Span Type: Secondary Span)				
Bevel End		7	6	
Heaving (mm)	50			
Invert Above/Below Stream Bed	BELOW			
Above/Below (mm)	200			
Scour Protection		N	N	Snow covered.
(Type : RIP RAP)				
(Avg. Rock Size(mm) : 300)				
Scour/Erosion		N	N	
Beavers (Y/N)	No			Removed.
Upstream End General Rating		7	6	
Bridge Culvert Barrel				
Culvert Component		Last	Now	Explanation of Condition
(Pipe # : 2, Secondary Span, Location Code: MAIN, Span (mm): , Rise (mm): 2400, Type: MP)				
Barrel Last Accessible Date	29-Nov-2012			South span.
Special Features				
Special Feature				
(Type :)				
Special Feature				
(Type :)				
Roof		4	4	Minor mower damage to crown. Unable to measure, ice.
Measured Rise (mm)	2190			
Measured At Ring No.	2			
Sag (mm)	210			
Percent Sag	8			(8.8%. 25Jan2010).
Sidewall		4	4	Span at W end=2556=156mm Span at mid=2595=195mm=8.1% Span at E end=2520=120mm
Measured Span (mm)	2595			
Measured At Ring No.				
Deflection (mm)	195			8.1%
Percent Deflection	8			
Floor		N	N	(Covered with silt, 200mm, heavier at midspan. 09/Sep/2006) - Ice.
Bulge (mm)	0			
Measured At Ring No.				
Abrasion (Y/N)	No			
Circumferential Seams		5	5	
Separation (mm)	80			
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		6	6	
Corrosion By Soil (Y/N)	No			
Corrosion By Water (Y/N)	Yes			
Camber POS/ZERO/NEG	NEG			

Bridge Culvert Barrel					
Culvert Component		Last	Now	Explanation of Condition	
(Pipe # : 2, Secondary Span, Location Code: MAIN, Span (mm): , Rise (mm): 2400, Type: MP)					
Ponding (Y/N)	No				
Fish Passage Adequacy		7	7		
Baffle		X	X		
(Type :)					
Waterway Adequacy		7	7	Drift from beaver dam removal.	
Icing (Y/N)	No				
Silting (Y/N)	No				
Drift (Y/N)	Yes				
Barrel General Rating		4	4		
Downstream End					
Culvert Component		Last	Now	Explanation of Condition	
(Pipe # : 2, Span Type: Secondary Span)					
Direction		E		South span.	
End Treatment (Concrete, Steel, Others, None)	STEEL				
Headwall		X	X		
Collar		X	X		
Wingwalls		X	X		
(Shape :)					
Cutoff Wall		X	X		
Bevel End		7	7		
Heaving (mm)	50				
Invert Above/Below Stream Bed	BELOW				
Above/Below (mm)	300				
Scour Protection		N	N	Snow covered.	
(Type : RIP RAP)					
(Avg. Rock Size(mm) : 350)					
Scour/Erosion		N	N		
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	Stream angles Northward on U/S end, minor.	
Bank Stability		7	7		
HWM (m below Top of Culvert)	0.3			Springline @ inlet.	
Drift (Y/N)	Yes				
Channel Bottom Degrading/Aggrading	AGGRADING			U/S.	
Beavers (Y/N)	Yes				
(Fish Compensation Measure 1 : NONE)					
(Fish Compensation Measure 2 : NONE)					
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)	33.3/33.3	Sufficiency Rating (Last/Now)	57.3/56.3	Est. Repl. Yr	2045	Maint. Req. (Y/N)	No			
Special Comments for Next Inspection	Monitor barrel deflection; continue regular inspection. "3" & "4". No further action required at this time fro barrels rated "3" & "4".		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	Owen Salava	Previous Assistant's Name								
Next Inspection Date	29-Feb-2016	Previous Inspection Date	25-Jan-2010							
Inspection Cycle (Default) (months)	39									
Comment										

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) (%)	33.3/33.3	Sufficiency Rating (Last/Now) (%)	57.3/56.3	Est. Repl. Yr	2045	Maint. Req. (Y/N) No
Special Comments for Next Inspection	Monitor barrel deflection; continue regular inspection. No further action required at this time fro barrels rated "3" & "4".		Department Comments	No Maintenance required		
Maintenance Reviewed By	John Umlah	Date	24-Apr-2013	Estimated Total	0	
Proposed Long-Term Strategy						
On 3-Year Program (Y/N)						
Proposed Action						
Previous Inspector's Name	Owen Salava	Previous Assistant's Name				
Next Inspection Date	29-Feb-2016	Previous Inspection Date	25-Jan-2010			
Inspection Cycle (Default) (months)	39					
Comment						