

Bridge Culvert Inspection			
Bridge File Number	79395 -1 Bridge Culvert	Form Type	CULM
Year Built	1980	Lot No.	1
Bridge or Town Name	AMISK	Inspector Name	Jason Saly
Located Over	SHORNCLIFFE CREEK, 5.2.3, WATERCRS-ST	Inspector Class	BR CLS A
Located On	884:18 C1 22.787	Assistant Name	
Water Body Cl./Year		Assistant Class	
Navigabil. Cl./Year		Inspection Date	28-Nov-2010
Legal Land Location	SW SEC 11 TWP 40 RGE 8 W4M	Data Entry By	Marcia Chavez
Longitude, Latitude	-111:03:38, 52:25:36	Data Entry Date	07-Jan-2011
Road Authority	Alberta Transportation (AIT)	Reviewer Name	John O'Brien
Contract Main. Area	CMA22	Review Date	12-Dec-2010
Clear Roadway/Skew	10 /	Dept. Reviewer Name	Chris Black
AADT/Year	220 / 2009 (A)	Dept. Review Date	12-Jan-2011
Road Classification	RAU-211.8-110	Follow-Up By	
Detour Length (km)	6		

Bridge Culvert Information

Number of Culverts	2							
Pipe #	Barrel	Span	Rise (or Dia.)	Type	Length	Corr. Profile	Pl./Slab Thickness	Shape
1	MAIN	-	1800	MP	26	75X25	2.8	ROUND
2	MAIN	-	1800	MP	26	75X25	2.8	ROUND
Special Features								
Special Features Comment								

Utilities (Located at)

Utility Attachments			
Telephone	West r/w.	Gas	
Power	8W Crosses over pipes. And in east r.o.w.	Municipal	
Others		Problem (Y/N)	No
Remarks			

Approach Road / Embankment

	Last	Now	Explanation of Condition
Horizontal Alignment	8	7	Approach 30m SW of S pipe. Bottom of valley.
Vertical Alignment	6	5	
Roadway Width (m)	10.300		
Embankment	7	7	West side measured.
Sideslope (__:1)	3.0		Not measured thsi inspection.
(Height of Cover(m) :)			
Guardrail (Y/N)	No		
Approach Road / Embankment General Rating	6	5	

Upstream End

Culvert Component	Last	Now	Explanation of Condition
(Pipe # : 1, Span Type: Primary Span)			
Direction	W		North - primary 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		N	N	(Metal screen installed - barrel not accessible.) May 31, 2004	
Heaving (mm)	0				
Invert Above/Below Stream Bed	BELOW				
Above/Below (mm)	100				
Scour Protection		N	N	Snow covered	
(Type :)					
(Avg. Rock Size(mm) :)					
Scour/Erosion		N	N		
Beavers (Y/N)	No				
Upstream End General Rating		5	5	GR carried forward for several inspections.	
Bridge Culvert Barrel					
Culvert Component		Last	Now	Explanation of Condition	
(Pipe # : 1, Primary Span, Location Code: MAIN, Span (mm): , Rise (mm): 1800, Type: MP)					
Barrel Last Accessible Date	15-May-1995			(No deflection noticed in roadway over pipe - appears stable. May 31/04). Ice to within 850 of roof.	
Special Features					
Special Feature					
(Type :)					
Special Feature					
(Type :)					
Roof		N	N	Can see no change in dimensional measurements - will monitor.('95 comment).	
Measured Rise (mm)					
Measured At Ring No.					
Sag (mm)	400				22.2%
Percent Sag	22				
Sidewall		N	N	5.5%	
Measured Span (mm)					
Measured At Ring No.					
Deflection (mm)	100				
Percent Deflection	6				
Floor		N	N		
Bulge (mm)					
Measured At Ring No.					
Abrasion (Y/N)					
Circumferential Seams		N	N		
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)					
Coating		N	4	Rating based on view from ends. Corrosion 2/3 up pipe.	
Corrosion By Soil (Y/N)					
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): 1800, Type: MP)				
Camber POS/ZERO/NEG	ZERO			
Ponding (Y/N)	Yes			
Fish Passage Adequacy		X	X	
Baffle		N	N	
(Type :)				
Waterway Adequacy		5	5	
Icing (Y/N)	No			
Silting (Y/N)	Yes			
Drift (Y/N)	No			
Barrel General Rating		2	2	General rating carried over since 1995.
Downstream End				
Culvert Component		Last	Now	Explanation of Condition
(Pipe # : 1, Span Type: Primary Span)				
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	5	
Heaving (mm)	0			
Invert Above/Below Stream Bed				Metal grate installed, barrel not accessible. Grate partially bent out.
Above/Below (mm)	0			
Scour Protection		N	N	Snow covered.
(Type :)				
(Avg. Rock Size(mm) :)				
Scour/Erosion		N	N	(Minor erosion on slopes beside pipe. May 31/04)
Beavers (Y/N)	No			(Note: 750 mm silt & water at D/S. 31May2004).
Downstream End General Rating		5	5	
Upstream End				
Culvert Component		Last	Now	Explanation of Condition
(Pipe # : 2, Span Type: Secondary Span)				
Direction		W		Pipes are 85 m apart. Secondary pipe S. (Overflow pipe).
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	7	Pallet wired across opening to stop cattle from entering pipe.
Heaving (mm)	0			
Invert Above/Below Stream Bed	BELOW			
Above/Below (mm)	100			
Scour Protection		N	N	Snow Covered
(Type :)				
(Avg. Rock Size(mm) :)				
Scour/Erosion		N	N	
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): 1800, Type: MP)				
Barrel Last Accessible Date	28-Nov-2010			
Special Features				
Special Feature				
(Type :)				
Special Feature				
(Type :)				
Roof		4	5	Not able to measure due to ice. Est. 100-125 sag.
Measured Rise (mm)				
Measured At Ring No.				
Sag (mm)				
Percent Sag	7			
Sidewall		7	6	Span measured at N end=1843 - 43; Midpt.=1870 - 70=3.9%; S end=1825 - 25.
Measured Span (mm)	1870			
Measured At Ring No.				
Deflection (mm)	70			
Percent Deflection	4			
Floor		N	N	Ice.
Bulge (mm)	0			
Measured At Ring No.				
Abrasion (Y/N)				
Circumferential Seams		6	6	Measured at Ring 2/3
Separation (mm)	105			
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	5	Superficial corrosion mid way on sidewall
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): 1800, Type: MP)				
Ponding (Y/N)	No			
Fish Passage Adequacy		5	5	
Baffle		N	X	
(Type :)				
Waterway Adequacy		6	6	
Icing (Y/N)	No			
Silting (Y/N)	No			
Drift (Y/N)	No			
Barrel General Rating		4	5	
Downstream End				
Culvert Component		Last	Now	Explanation of Condition
(Pipe # : 2, Span Type: Secondary Span)				
Direction		E		
End Treatment (Concrete, Steel, Others, None)	NONE			
Headwall		X	X	
Collar		X	X	
Wingwalls		X	X	
(Shape :)				
Cutoff Wall		X	X	
Bevel End		N	5	(Slightly damaged @ construction (no problem).
Heaving (mm)	0			
Invert Above/Below Stream Bed	BELOW			
Above/Below (mm)	100			
Scour Protection		N	N	Snow covered.
(Type :)				
(Avg. Rock Size(mm) :)				
Scour/Erosion		N	N	
Beavers (Y/N)	No			
Downstream End General Rating		6	5	
Structure Usage				
		Last	Now	Explanation of Condition
Channel (U/S and D/S)				
Alignment		6	6	
Bank Stability		7	7	
HWM (m below Top of Culvert)				No visible HWM
Drift (Y/N)	No			
Channel Bottom Degrading/Aggrading				
Beavers (Y/N)	No			
(Fish Compensation Measure 1 : NONE)				
(Fish Compensation Measure 2 : NONE)				
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							
REMOVE DRIFT ACCUMULATION							
INSTALL CONCRETE/STEEL LINING							
INSTALL STRUTS							
INSTALL CONCRETE COLLAR/CUTOFF							
REPAIR SEAMS							
OTHER ACTION	2011	Dewater and inspect barrel.					
OTHER ACTION							
OTHER ACTION							
OTHER ACTION							
OTHER ACTION							
Structural Condition Rating (Last/Now) (%)	22.2/22.2	Sufficiency Rating (Last/Now) (%)	41.8/41.8	Est. Repl. Yr	2021	Maint. Req. (Y/N)	Yes
Special Comments for Next Inspection	Remove gate next inspection, clean barrel & perform Lvl 2 barrel inspection. AT notified by email 03Dec2010.		Department Comments				
Maintenance Reviewed By			Date			Estimated Total	0
Proposed Long-Term Strategy	Possibly eliminate cattle pass in future. Culverts good until 2030. Landowner (Maki) may want bigger structure when replaced for livestock. Culvert Rated 2 for deflection. Shape ok, good arching. RS						
On 3-Year Program (Y/N)							
Proposed Action							
Previous Inspector's Name	Garry Roberts		Previous Assistant's Name				
Next Inspection Date	28-Feb-2014		Previous Inspection Date	23-Jan-2009			
Inspection Cycle (Default) (months)	39						
Comment							