

Bridge Culvert Inspection			
Bridge File Number	73834 -1 Bridge Culvert	Form Type	CULM
Year Built	1995	Lot No.	2
Bridge or Town Name	DONNELLY	Inspector Name	Brian Pientsch
Located Over	2ND ORDER TRIBUTARY TO PEAVINE CK, 8.10.58.7.4.3.1, WATERCRS-ST	Inspector Class	BR CLS A
Located On	49:08 C1 48.626	Assistant Name	Brian Cote
Water Body Cl./Year		Assistant Class	
Navigabil. Cl./Year		Inspection Date	07-Jul-2011
Legal Land Location	SE SEC 2 TWP 78 RGE 21 W5M	Data Entry By	Lisa Fairhurst
Longitude, Latitude	-117:08:11, 55:43:24	Data Entry Date	12-Aug-2011
Road Authority	Alberta Transportation (AIT)	Reviewer Name	Arnold Assenheimer
Contract Main. Area	CMA03	Review Date	13-Jul-2011
Clear Roadway/Skew	13.7 / -15 deg. (LHF)	Dept. Reviewer Name	Steve Pasquan
AADT/Year	2,370 / 2010 (A)	Dept. Review Date	21-Nov-2011
Road Classification	RAU-213.4-120	Follow-Up By	
Detour Length (km)	71		

Bridge Culvert Information

Number of Culverts	2							
Pipe #	Barrel	Span	Rise (or Dia.)	Type	Length	Corr. Profile	Pl./Slab Thickness	Shape
1	MAIN	-	2200	MP	33	125X26	2.8	ROUND
2	MAIN	-	2200	MP	33	125X26	2.8	ROUND
Special Features								
Special Features Comment								

Utilities (Located at)

Utility Attachments			
Telephone		Gas	
Power	3 OH S R/W	Municipal	
Others		Problem (Y/N)	No
Remarks			

Approach Road / Embankment

	Last	Now	Explanation of Condition
Horizontal Alignment	7	7	Hwy 2 JCT about 500m E.
Vertical Alignment	8	8	
Roadway Width (m)	13.700		
Embankment	7	7	
Sideslope (_ :1)	5.0		
(Height of Cover(m) : 1.5)			
Guardrail (Y/N)	Yes		2 broken posts S. r/w
Approach Road / Embankment General Rating	7	7	

Upstream End

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

Upstream End				
Culvert Component		Last	Now	Explanation of Condition
(Pipe # : 1, Span Type: Primary Span)				
Wingwalls		X	N	
(Shape :)				
Cutoff Wall		X	X	
Bevel End		7	7	
Heaving (mm)	0			
Invert Above/Below Stream Bed	BELOW			
Above/Below (mm)	400			
Scour Protection		7	7	
(Type : RIP RAP)				
(Avg. Rock Size(mm) : 350)				
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): 2200, Type: MP)				
Barrel Last Accessible Date	29-Oct-2009			Not accessible due to depth of water.
Special Features				
Special Feature				
(Type :)				
Special Feature				
(Type :)				
Roof		8	8	Viewed from ends. at cl est.
Measured Rise (mm)	2196			
Measured At Ring No.				
Sag (mm)	4			
Percent Sag	0			
Sidewall		8	8	@cl est.
Measured Span (mm)	2207			
Measured At Ring No.				
Deflection (mm)	7			
Percent Deflection	0			
Floor		8	N	Water.
Bulge (mm)				
Measured At Ring No.				
Abrasion (Y/N)	No			
Circumferential Seams		7	N	
Separation (mm)	40			
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): 2200, Type: MP)				
Coating		4	4	Pitting below spring line.
Corrosion By Soil (Y/N)	No			
Corrosion By Water (Y/N)	Yes			
Camber POS/ZERO/NEG	ZERO			
Ponding (Y/N)	No			
Fish Passage Adequacy		8	8	
Baffle		X	X	
(Type :)				
Waterway Adequacy		8	8	
Icing (Y/N)	No			
Silting (Y/N)	No			
Drift (Y/N)	No			
Barrel General Rating		8	8	

Downstream End				
Culvert Component		Last	Now	Explanation of Condition
(Pipe # : 1, Span Type: Primary Span)				
Direction		S		W. pipe.
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)	0			
Invert Above/Below Stream Bed	BELOW			
Above/Below (mm)	500			
Scour Protection		7	7	
(Type : RIP RAP)				
(Avg. Rock Size(mm) : 350)				
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		N		E. 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		7	7	
Heaving (mm)	0			
Invert Above/Below Stream Bed	BELOW			
Above/Below (mm)	400			
Scour Protection		7	7	
(Type : RIP RAP)				
(Avg. Rock Size(mm) : 350)				
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): 2200, Type: MP)				
Barrel Last Accessible Date	29-Oct-2009			Not accessible due to depth of water.
Special Features				
Special Feature				
(Type :)				
Special Feature				
(Type :)				
Roof		7	7	Viewed form ends. at cl upward deflection
Measured Rise (mm)	2287			
Measured At Ring No.				
Sag (mm)	87			
Percent Sag	4			
Sidewall		8	8	at cl inward deflectin
Measured Span (mm)	2197			
Measured At Ring No.				
Deflection (mm)	3			
Percent Deflection	0			
Floor		7	N	Water.
Bulge (mm)				
Measured At Ring No.				
Abrasion (Y/N)				
Circumferential Seams		7	N	
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)				
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): 2200, Type: MP)				
Coating		4	4	Pitting visable just below spring line..
Corrosion By Soil (Y/N)	No			
Corrosion By Water (Y/N)	Yes			
Camber POS/ZERO/NEG	ZERO			
Ponding (Y/N)	No			
Fish Passage Adequacy		8	8	
Baffle		X	X	
(Type :)				
Waterway Adequacy		8	8	
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		S		E. pipe.
End Treatment (Concrete, Steel, Others, None)	NONE			
Headwall		X	X	
Collar		X	X	
Wingwalls		X	X	
(Shape :)				
Cutoff Wall		X	X	
Bevel End		7	5	Damaged by construction equipment.
Heaving (mm)	0			
Invert Above/Below Stream Bed	BELOW			
Above/Below (mm)	500			
Scour Protection		7	7	
(Type : RIP RAP)				
(Avg. Rock Size(mm) : 350)				
Scour/Erosion		7	7	
Beavers (Y/N)	No			
Downstream End General Rating		7	5	
Structure Usage				
		Last	Now	Explanation of Condition
Channel (U/S and D/S)				
Alignment		8	8	
Bank Stability		8	4	Scour hole 30 m/s u/s of inlet. Approx 3 x 3 x 1m.
HWM (m below Top of Culvert)				HWM not visible.
Drift (Y/N)	No			

Structure Usage				
		Last	Now	Explanation of Condition
Channel Bottom Degrading/Aggrading	NONE			
Beavers (Y/N)	No			
(Fish Compensation Measure 1 : NONE)				
(Fish Compensation Measure 2 : NONE)				
Channel General Rating		8	4	

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	Repair GR posts					
OTHER ACTION							
OTHER ACTION							
OTHER ACTION							
Structural Condition Rating (Last/Now) (%)	77.8/77.8	Sufficiency Rating (Last/Now) (%)	79.0/73.8	Est. Repl. Yr	2043	Maint. Req. (Y/N)	Yes
Special Comments for Next Inspection	Monitor u/s scour hole.		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	Shane Hall		Previous Assistant's Name				
Next Inspection Date	07-Apr-2013		Previous Inspection Date	29-Oct-2009			
Inspection Cycle (Default) (months)	21						
Comment							