Bridge Culvert Inspection

Bridge File Number	80850 -1 Bridge Culvert	Form Type	CUL1
Year Built	1970	Lot No.	4
Bridge or Town Name	BODO	Inspector Name	Jason Saly
Located Over	TRAIL-ANIMAL, OVER SP	Inspector Class	BR CLS A
Located On	899:08 C1 33.370	Assistant Name	
Water Body Cl./Year		Assistant Class	
Navigabil. Cl./Year		Inspection Date	08-Jun-2011
Legal Land Location	SW SEC 9 TWP 37 RGE 1 W4M	Data Entry By	Marcia Chavez
Longitude, Latitude	-110:05:48, 52:09:44	Data Entry Date	28-Jun-2011
Road Authority	Alberta Transportation (AIT)	Reviewer Name	John O'Brien
Contract Main. Area	CMA22	Review Date	18-Jun-2011
Clear Roadway/Skew	12 /	Dept. Reviewer Name	Chris Black
AADT/Year	380 / 2010 (A)	Dept. Review Date	30-Jun-2011
Road Classification	RCU-209-110	Follow-Up By	
Detour Length (km)	20		

Bridge Culvert Information

Number of Culverts		1						
Pipe #	Barrel	Span	Rise (or Dia.)	Type	Length	Corr. Profile	Pl./Slab Thickness	Shape
1	MAIN	-	1524	MP	22.5	68X13	2.8	ROUND
Special Features								
Special Features Comment								

Posting Information

Required Vert. Clearance Posting (m)											
Posted Vertical Clearance (Y/N)		No									
Posted:	Lane	WB	On Bridge (m)		In Advance (Y/N)	No	Lane	EB	On Bridge (m)		In Advance (Y/N)	No
Remarks	Not required.										

Utilities (Located at)

Utility Attachments			
Telephone	West r/w.	Gas	
Power	3 wires OH 15m E. (fence line).	Municipal	
Others		Problem (Y/N)	No
Remarks			

Approach Road / Embankment

		Last	Now	Explanation of Condition
Horizontal Alignment		6	6	Curves on both sides. Good visiblity. Field entrances SW & SE.
Vertical Alignment		7	7	
Roadway Width (m)	9.700			
Embankment		8	8	
Sideslope (__:1)	3.0			
(Height of Cover(m) : **0.6**)				
Guardrail (Y/N)	No			
Approach Road / Embankment General Rating		**6**	**6**	

Upstream End

Culvert Component		**Last**	**Now**	**Explanation of Condition**
Direction		W		
End Treatment (Concrete, Steel, Others, None)	NONE			
Headwall		X	X	
Collar		X	X	

Upstream End				
Culvert Component		**Last**	**Now**	**Explanation of Condition**
Wingwalls		X	X	
(Shape :)				
Cutoff Wall		X	X	
Bevel End		X	X	Squared off end.
Heaving (mm)	0			
Invert Above/Below Stream Bed	BELOW			
Above/Below (mm)	200			
Scour Protection		7	7	
(Type : **NATURAL**)				
(Avg. Rock Size(mm) :)				
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: MP**)				
Barrel Last Accessible Date	08-Jun-2011			
Special Features				
Special Feature				
(Type :)				
Special Feature				
(Type :)				
Roof		7	7	Rise at E end 1507mm=17mm=1.1%. Could only take one measurement due to dirt on floor.
Measured Rise (mm)	1445			
Measured At Ring No.				
Sag (mm)	55			(3.7% sag. 26Mar2008).
Percent Sag	3			
Sidewall		7	7	Span at W end=1508mm=16mm Span at midpt=1544mm=20mm Span at E end=1548mm=24mm=1.6%
Measured Span (mm)	1548			
Measured At Ring No.				
Deflection (mm)	24			
Percent Deflection	2			
Floor		N	N	Dirt along floor.
Bulge (mm)	0			
Measured At Ring No.				
Abrasion (Y/N)	No			
Circumferential Seams		4	4	Minor infiltration on 2 seams. No action required.
Separation (mm)	50			
Longitudinal Seams		7	7	Riveted seams.
Total No. of Cracked Rings	0			
Total No. of Rings with Two Cracked Seams	0			
Min. Remaining Steel Between Cracks (mm)				
Proper Lap (Y/N)	Yes			
Longitudinal Stagger (Y/N)	Yes			
Coating		7	7	
Corrosion By Soil (Y/N)	No			
Corrosion By Water (Y/N)	No			

Bridge Culvert Barrel				
Culvert Component		**Last**	**Now**	**Explanation of Condition**
(Pipe # : **1, Primary Span, Location Code: MAIN, Span (mm): , Rise (mm): 1524, Type: MP**)				
Camber POS/ZERO/NEG	ZERO			
Ponding (Y/N)	Yes			Likely ponds 150mm during heavy rains.
Fish Passage Adequacy		X	X	
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**
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		X	X	Squared off end.
Heaving (mm)	0			
Invert Above/Below Stream Bed	BELOW			
Above/Below (mm)	200			
Scour Protection		7	7	
(Type : **NATURAL**)				
(Avg. Rock Size(mm) :)				
Scour/Erosion		7	7	
Beavers (Y/N)	No			
Downstream End General Rating		**7**	**7**	

Structure Usage				
		Last	**Now**	**Explanation of Condition**
Grade Separation				
Road Alignment		7	7	(Dirt floor light on 50%. 01-Dec-2004).
Roadway Surface		N	6	
(Type :)				
Icing (Y/N)	No			
Traffic Safety Features		X	X	
Type	NONE			
Lighting		X	X	
Barrel Leakage (Y/N)	No			

Structure Usage				
		Last	**Now**	**Explanation of Condition**
Drainage		6	6	Not fenced.
Structure In Use (Y/N)	No			
Grade Separation General Rating		**5**	**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						
OTHER ACTION						
OTHER ACTION						
OTHER ACTION						

Structural Condition Rating (Last/Now) (%)	**77.8/77.8**	**Sufficiency Rating (Last/Now) (%)**	**78.0/78.6**	Est. Repl. Yr	2034	Maint. Reqd. (Y/N)	No

Special Comments for Next Inspection	Cattlepass not in use but still structurally good.	Department Comments	

Maintenance Reviewed By		Date		Estimated Total	0
Proposed Long-Term Strategy					
On 3-Year Program (Y/N)	N				
Proposed Action	2007.05.21 Revisit site again in two years to determine continued usage. Bridge branch could determine if guardrails are required.				
Previous Inspector's Name	Bryan Wai	Previous Assistant's Name			
Next Inspection Date	08-Sep-2014	Previous Inspection Date	26-Mar-2008		
Inspection Cycle (Default) (months)	39				
Comment					