

Bridge Culvert Inspection				
Bridge File Number	07291 -1 Bridge Culvert		Form Type	CUL1
Year Built	1982		Lot No.	1
Bridge or Town Name	MEDICINE HAT		Inspector Name	Jon Davies
Located Over	SMR - COULEE, WATERCRS-IC		Inspector Class	BR CLS B
Located On	523:02 C1 17.463		Assistant Name	
Water Body Cl./Year			Assistant Class	
Navigabil. Cl./Year			Inspection Date	07-Mar-2012
Legal Land Location	NW SEC 22 TWP 12 RGE 7 W4M		Data Entry By	Kelsey Roberts
Longitude, Latitude	-110:53:26, 50:01:01		Data Entry Date	07-Apr-2012
Road Authority	Alberta Transportation (AIT)		Reviewer Name	Garry Roberts
Contract Main. Area	CMA23		Review Date	24-Mar-2012
Clear Roadway/Skew	11 / 4 deg. (RHF)		Dept. Reviewer Name	Tim Davies
AADT/Year	150 / 2011 (A)		Dept. Review Date	17-Apr-2012
Road Classification	RCU-208-110		Follow-Up By	
Detour Length (km)	3			

Bridge Culvert Information								
Number of Culverts		1						
Pipe #	Barrel	Span	Rise (or Dia.)	Type	Length	Corr. Profile	PI./Slab Thickness	Shape
1	MAIN	-	1500	SP	67.1		3.0,3.0,3.0	ROUND
Special Features								
Special Features Comment								

Utilities (Located at)			
Utility Attachments			
Telephone		Gas	Xing road 50m north
Power		Municipal	
Others		Problem (Y/N)	No
Remarks			

Approach Road / Embankment				
		Last	Now	Explanation of Condition
Horizontal Alignment		6	4	on curve Posted at 65km/h
Vertical Alignment		5	5	
Roadway Width (m)	8.300			
Embankment		N	4	Erosion in the SE ditch with toe of side slope failure contributing to the D/S end being silted.
Sideslope (___:1)	3.0			
(Height of Cover(m) : 8.6)				
Guardrail (Y/N)	No			
Approach Road / Embankment General Rating		5	4	

Upstream End				
Culvert Component		Last	Now	Explanation of Condition
Direction				West end
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
Bevel End		N	N	(Bevel covered by silt) 2005/10/23 Ice covered
Heaving (mm)	200			
Invert Above/Below Stream Bed	BELOW			
Above/Below (mm)	500			
Scour Protection		N	N	Ice covered
(Type : NATURAL)				
(Avg. Rock Size(mm) :)				
Scour/Erosion		N	N	Ice covered
Beavers (Y/N)	No			
Upstream End General Rating		5	5	GR carried forward
Bridge Culvert Barrel				
Culvert Component		Last	Now	Explanation of Condition
(Pipe # : 1, Primary Span, Location Code: MAIN, Span (mm): , Rise (mm): 1500, Type: SP)				
Barrel Last Accessible Date				
Special Features				
Special Feature				Barrel U/S had ice with 500mm of crown D/S silt within 100mm of crown
(Type :)				
Special Feature				
(Type :)				
Roof		N	N	(Pipe sagging @ ctr(max. rating))
Measured Rise (mm)				
Measured At Ring No.				
Sag (mm)	0			
Percent Sag	0			
Sidewall		N	N	
Measured Span (mm)				
Measured At Ring No.				
Deflection (mm)	0			
Percent Deflection	0			
Floor		N	N	(Covered with dirt and filled with silt. Unable to view barrel)
Bulge (mm)	0			
Measured At Ring No.				
Abrasion (Y/N)				
Circumferential Seams		N	N	
Separation (mm)	0			
Longitudinal Seams		N	N	
Total No. of Cracked Rings	0			
Total No. of Rings with Two Cracked Seams				
Min. Remaining Steel Between Cracks (mm)	0			
Proper Lap (Y/N)	No			
Longitudinal Stagger (Y/N)	No			
Coating		N	N	
Corrosion By Soil (Y/N)	Yes			
Corrosion By Water (Y/N)				
Camber POS/ZERO/NEG	NEG			No sight line possible
Ponding (Y/N)	Yes			

Bridge Culvert Barrel				
Culvert Component		Last	Now	Explanation of Condition
(Pipe # : 1, Primary Span, Location Code: MAIN, Span (mm): , Rise (mm): 1500, Type: SP)				
Fish Passage Adequacy		X	X	
Baffle (Type :)		X	X	
Waterway Adequacy		N	3	(Water backed up within 300mm of the roof from middle to the d/s end). 23-Oct-2005
Icing (Y/N)	Yes			
Silting (Y/N)	Yes			Silted heavily, up to 1300mm deep at D/S, icing at U/S
Drift (Y/N)	No			
Barrel General Rating		3	3	
Downstream End				
Culvert Component		Last	Now	Explanation of Condition
Direction				Not visible due to silt
End Treatment (Concrete, Steel, Others, None)	NONE			
Headwall		X	X	
Collar		X	X	
Wingwalls (Shape :)		X	X	
Cutoff Wall		X	X	
Bevel End		N	N	
Heaving (mm)	0			
Invert Above/Below Stream Bed	BELOW			Only 100mm of pipe exposed.
Above/Below (mm)	740			
Scour Protection (Type : NATURAL) (Avg. Rock Size(mm) :)		N	N	
Scour/Erosion		N	N	
Beavers (Y/N)	No			
Downstream End General Rating		N	N	
Structure Usage				
		Last	Now	Explanation of Condition
Channel (U/S and D/S)				
Alignment		6	6	
Bank Stability		N	4	
HWM (m below Top of Culvert)				HWM not visible
Drift (Y/N)	No			
Channel Bottom Degrading/Aggrading	AGGRADING			
Beavers (Y/N)	No			
(Fish Compensation Measure 1 : NONE)				
(Fish Compensation Measure 2 : NONE)				
Channel General Rating		4	4	general rating carried forward

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	2012	remove silt build up, and inspect to revise estimated year of replacement in conjunction with embankment slope stabilization plan.					
OTHER ACTION							
OTHER ACTION							
OTHER ACTION							
OTHER ACTION							
OTHER ACTION							
OTHER ACTION							
Structural Condition Rating (Last/Now) (%)	33.3/33.3	Sufficiency Rating (Last/Now) (%)	58.4/30.3	Est. Repl. Yr	2012	Maint. Req. (Y/N)	Yes
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	Tim Davies		Previous Assistant's Name				
Next Inspection Date	07-Jun-2015		Previous Inspection Date	13-Mar-2009			
Inspection Cycle (Default) (months)	39						
Comment							