

Bridge Culvert Inspection				
Bridge File Number	80436 -1 Bridge Culvert		Form Type	CULM
Year Built	1985		Lot No.	4
Bridge or Town Name	GRASSY LAKE		Inspector Name	Tom Carey
Located Over	TID - IRRIGATION C, WATERCRS-IC		Inspector Class	BR CLS A
Located On	3:12 C1 29.049		Assistant Name	
Water Body Cl./Year			Assistant Class	
Navigabil. Cl./Year			Inspection Date	12-Nov-2011
Legal Land Location	NE SEC 17 TWP 10 RGE 13 W4M		Data Entry By	Alyssa Boynton
Longitude, Latitude	-111:43:54, 49:49:26		Data Entry Date	07-Dec-2011
Road Authority	Alberta Transportation (AIT)		Reviewer Name	Garry Roberts
Contract Main. Area	CMA24		Review Date	21-Nov-2011
Clear Roadway/Skew	13 /		Dept. Reviewer Name	Tim Davies
AADT/Year	3,650 / 2010 (A)		Dept. Review Date	12-Jan-2012
Road Classification	RAU-213-130		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	-	1800	MP	85.1	125X26	2.8	ROUND
2	MAIN	-	1800	MP	85.1	125X26	2.8	ROUND
Special Features								
Special Features Comment								

Utilities (Located at)			
Utility Attachments			
Telephone	North ditch		Gas
Power			Municipal
Others	Fibre optics @ South R/W.		Problem (Y/N) No
Remarks			

Approach Road / Embankment				
		Last	Now	Explanation of Condition
Horizontal Alignment		9	9	Culverts also continue to run under the tracks at North
Vertical Alignment		8	8	
Roadway Width (m)	13.000			
Embankment		8	8	4:1 at road. Flat over pipes.
Sideslope (__:1)	4.0			
(Height of Cover(m) : 1)				
Guardrail (Y/N)	No			
Approach Road / Embankment General Rating		8	8	

Upstream End				
Culvert Component		Last	Now	Explanation of Condition
(Pipe # : 1, Span Type: Primary Span)				
Direction		S		Turnout 15m south goes west. East culvert - south end.
End Treatment (Concrete, Steel, Others, None)	NONE			
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		X	X	
Heaving (mm)	0			
Invert Above/Below Stream Bed	BELOW			
Above/Below (mm)	100			
Scour Protection		8	8	
(Type : RIP RAP)				
(Avg. Rock Size(mm) : 150)				
Scour/Erosion		8	8	
Beavers (Y/N)	No			
Upstream End General Rating		8	8	
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	14-Feb-2001			Canal running, unable to enter viewed from both ends- Average 1.0m water.Shape good
Special Features				
Special Feature				East pipe
(Type :)				
Special Feature				
(Type :)				
Roof		N	N	
Measured Rise (mm)	1790			
Measured At Ring No.	4			
Sag (mm)	10			
Percent Sag				
Sidewall		N	N	
Measured Span (mm)	1810			
Measured At Ring No.	4			
Deflection (mm)	20			
Percent Deflection				
Floor		N	N	
Bulge (mm)	0			
Measured At Ring No.				
Abrasion (Y/N)	No			
Circumferential Seams		N	N	
Separation (mm)	30			
Longitudinal Seams		N	N	@ SP.
Total No. of Cracked Rings	0			
Total No. of Rings with Two Cracked Seams				
Min. Remaining Steel Between Cracks (mm)				
Proper Lap (Y/N)	Yes			
Longitudinal Stagger (Y/N)	No			
Coating		N	N	(Minor superficial corrosion) 2001/02/14
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)	No			
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		N	N	

Downstream End				
Culvert Component		Last	Now	Explanation of Condition
(Pipe # : 1, Span Type: Primary Span)				
Direction		N		East culvert - north end.
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	
Heaving (mm)				
Invert Above/Below Stream Bed	BELOW			
Above/Below (mm)	200			
Scour Protection		8	8	
(Type : RIP RAP)				
(Avg. Rock Size(mm) : 150)				
Scour/Erosion		8	8	
Beavers (Y/N)	No			
Downstream End General Rating		8	8	

Upstream End				
Culvert Component		Last	Now	Explanation of Condition
(Pipe # : 2, Span Type: Secondary Span)				
Direction		S		West culvert - south end.
End Treatment (Concrete, Steel, Others, None)	NONE			
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		X	X	
Heaving (mm)	0			
Invert Above/Below Stream Bed	BELOW			
Above/Below (mm)	100			
Scour Protection		8	8	
(Type : RIP RAP)				
(Avg. Rock Size(mm) : 150)				
Scour/Erosion		8	8	
Beavers (Y/N)	No			
Upstream End General Rating		8	8	
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	14-Feb-2001			Canal running, unable to enter Viewed from both ends Average 1.0 m deep water Shape good
Special Features				
Special Feature				West Culvert
(Type :)				
Special Feature				
(Type :)				
Roof		N	N	
Measured Rise (mm)	1790			
Measured At Ring No.	3			
Sag (mm)	10			
Percent Sag				
Sidewall		N	N	
Measured Span (mm)	1810			
Measured At Ring No.	3			
Deflection (mm)	20			
Percent Deflection				
Floor		N	N	
Bulge (mm)	0			
Measured At Ring No.				
Abrasion (Y/N)	No			
Circumferential Seams		N	N	
Separation (mm)	30			
Longitudinal Seams		N	N	@ SP.
Total No. of Cracked Rings	0			
Total No. of Rings with Two Cracked Seams				
Min. Remaining Steel Between Cracks (mm)				
Proper Lap (Y/N)	Yes			
Longitudinal Stagger (Y/N)	No			
Coating		N	N	Minor superficial corrosion
Corrosion By Soil (Y/N)				
Corrosion By Water (Y/N)	Yes			

Bridge Culvert Barrel				
Culvert Component		Last	Now	Explanation of Condition
(Pipe # : 2, Secondary Span, Location Code: MAIN, Span (mm): , Rise (mm): 1800, Type: MP)				
Camber POS/ZERO/NEG	ZERO			
Ponding (Y/N)	No			
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		N	N	

Downstream End				
Culvert Component		Last	Now	Explanation of Condition
(Pipe # : 2, Span Type: Secondary Span)				
Direction		N		West culvert - north end.
End Treatment (Concrete, Steel, Others, None)	NONE			
Headwall		X	X	
Collar		X	X	
Wingwalls (Shape :)		X	X	
Cutoff Wall		X	X	
Bevel End		X	X	
Heaving (mm)				
Invert Above/Below Stream Bed	BELOW			
Above/Below (mm)	200			
Scour Protection (Type : RIP RAP) (Avg. Rock Size(mm) : 150)		8	8	
Scour/Erosion		8	8	
Beavers (Y/N)	No			
Downstream End General Rating		8	8	

Structure Usage				
		Last	Now	Explanation of Condition
Channel (U/S and D/S)				
Alignment		9	9	
Bank Stability		8	8	
HWM (m below Top of Culvert)	0.5			
Drift (Y/N)	No			
Channel Bottom Degrading/Aggrading				
Beavers (Y/N)	No			
(Fish Compensation Measure 1 : NONE)				
(Fish Compensation Measure 2 : NONE)				

Structure Usage				
		Last	Now	Explanation of Condition
Channel General Rating		9	9	

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) (%)	55.6/55.6	Sufficiency Rating (Last/Now) (%)	70.0/70.0	Est. Repl. Yr	2034	Maint. Req. (Y/N)	No
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	Tom Carey		Previous Assistant's Name				
Next Inspection Date	12-Aug-2013		Previous Inspection Date	25-Jun-2010			
Inspection Cycle (Default) (months)	21						
Comment							