Bridge Inspection

Bridge File Number	01741 -1 Bridge	Form Type	PSR CON
Year Built/Year Supstr	1961/1961	Lot No.	4
		Inspector Name	Garry Roberts
Bridge or Town Name	LONGVIEW	Inspector Class	BR CLS A
Located Over	HIGHWOOD RIVER, 2.13.27, WATERCRS-ST	Assistant Name	
		Assistant Class	
Located On	22:10 C1 37.818	Inspection Date	17-Jun-2012
Water Body Cl./Year		Data Entry By	Erin Roberts
Navigabil. Cl./Year		Data Entry Date	16-Jul-2012
Legal Land Location	NE SEC 17 TWP 18 RGE 2 W5M	Reviewer Name	Joel Wozney
Longitude, Latitude	-114:14:03, 50:31:22	Review Date	27-Jun-2012
Road Authority	Alberta Transportation (AIT)	Dept. Reviewer Name	Tim Davies
Contract Main. Area	CMA27	Dept. Review Date	17-Jul-2012
Clear Roadway/Skew	7.9 /	Follow-Up By	
AADT/Year	1,850 / 2011 (A)		
Road Classification	RAU-209-110		
Detour Length (km)	50		

Allowable Load (t):	Single	CS1 41 GIRDER	Semi	CS2 48 GIRDER	Train	CS3 61 GIRDER	---> On Critical Spans --->Critical Member
Design Loading:		HS20					---> Primary Span

Posting Information

Required Load Posting (t)			Single		Semi	49	Truck Train	62
Posted Loading (t)			Single		Semi		Truck Train	
Posted:	Lane	NB	At Junction (Y/N)	No	In Advance (Y/N)	No	At Bridge (Y/N)	No
Posted:	Lane	SB	At Junction (Y/N)	No	In Advance (Y/N)	No	At Bridge (Y/N)	No
Remarks	Not required.							

Hazard Marker At Bridge (Y/N)	Yes
Remarks	
Other Sign Types	8% grade, Windgust advisory. Curve, 70 km/hr

Utilities (Located at)

Utility Attachments	GAS UTILITIES-GAS LINE; OTHER UTILITIES-OTHER LINES; TELEPHONE UTILITIES-PHONE LINE		
Telephone	Conduit under West curb.	Gas	Under North span & @ NE.
Power		Municipal	
Others		Problem (Y/N)	No
Remarks			

Approach Road

		Last	Now	Explanation of Condition
Horizontal Alignment		6	6	Curves and hills both ends.
Vertical Alignment		5	5	
Roadway Width (m)	10.000			
Approach Bump		6	7	
Guardrail (Y/N)	Yes			Wrong lap at NW and SE. Missing 9 splice bolts at SE. Type VI @ NE & NW.
Guardrail		4	4	
Length (m)	26.000			
Current Standard (Y/N)	Yes			
Termination Type	TURNED DOWN			
Drainage		5	6	
Approach Road General Rating		**5**	**5**	

Superstructure

Bridge Component		Last	Now	Explanation of Condition
(Primary Span : **PO, 5 Spans, Lengths(m): 26.8-26.8-22.3-20.1-9.1, A-Ident Number:**)				
Special Features				
Special Feature		7	7	Gabion wall. @ North headslope.
(SType : **EXT SHEAR STIRRUP**)				
Special Feature			7	
(Type :)				
Wearing Surface/Deck Top Detail Ratings				
	N (%)	1 (%)	2 (%)	3 (%)
Last	0	0	0	0
Now	0.0	0.0	0.0	0.0
Wearing Surface		4	5	Chipcoat on epoxy on concrete - 80mm total thickness.
(Material Type : **CONVENTIONAL CHIP SEAL COAT**)				
(Thickness(mm) :)				
Lateral Connection Problem (Y/N)	No			
Deck Top		N	N	
Deck Rideability		6	7	
Deck Joints		7	7	All 6 joints WB ACME EFE - 400. Natural rubber seals.
Temperature (deg. C)	12			
(Expansion Type : **GLAND (WABO-MAUER, TRANSFLEX, ETC)**)				
(Fixed Type :)				
Gap Size (mm)	Gap Location			
70	South abutment			
75	Pier 1			
50	Pier 2			
75	Pier 3			
70	Pier 4			
Deck Drainage		7	7	
Drains Clogged (Y/N)	No			
Curbs/Median		4	6	Repaired. Medium width transverse cracks in curbs 1.0m apart.
(Curb Type : **Standard**)				
Scaling (Percent Area)	5			
Bridge Rail		5	8	Retro- fit tube rail placed in front of original. Original and retro-fit rails both galvanized.
(Type : **GALVANIZED STEEL BRIDGE TUBE**)				
Bridge Rail Posts		3	7	
(Type : **GALVANIZED POST STEEL;GALVANIZED POST STEEL**)				
Bridge Rail/Posts Coating		3	7	
(Type : **GALVANIZED**)				
Sidewalk		X	X	
Girder Detail Ratings				
	N (count)	1 (count)	2 (count)	3 (count)
Last	0	0	0	0
Now	0	0	0	0
Girders		7	7	Typical shoe plate cracks @ South abutment. Sp 1 and 2 have 4 girders each. Sp 3 and 4 have 5 girders each. Sp 5 is CS span
Cracking (Y/N)	Yes			
Spalling (Percent Area)	0			
(Number Of Girders : **18**)				

Superstructure				
Bridge Component		**Last**	**Now**	**Explanation of Condition**
(Primary Span : **PO, 5 Spans, Lengths(m): 26.8-26.8-22.3-20.1-9.1, A-Ident Number:**)				
Diaphragms/Cross Frame		6	7	
Bearings		6	7	
Temperature (deg. C)	12			
(Expansion Type :)				
(Fixed Type :)				
Coating Adequate (Y/N)	Yes			
Functioning (Y/N)	Yes			
Deck Underside		5	7	
Stains (Percent Area)	2			
Span Alignment Problems				
Vertical (Y/N)	No			
Horizontal (Y/N)	No			
Superstructure General Rating		**5**	**7**	

Superstructure				
Bridge Component		**Last**	**Now**	**Explanation of Condition**
(Secondary Span : **CS**)				
Special Features				
Special Feature				
(Type :)				
Special Feature				
(Type :)				
Wearing Surface/Deck Top Detail Ratings				

	N (%)	1 (%)	2 (%)	3 (%)
Last	0	0	0	0
Now	0.0	0.0	0.0	0.0

Wearing Surface	6	6	Chipcoat on epoxy on concrete 80mm total thickness.
(Material Type : **CONVENTIONAL CHIP SEAL COAT**)			
(Thickness(mm) :)			
Deck Top	N	N	
Deck Rideability	6	7	
Deck Joints	7	7	
Temperature (deg. C) 12			
(Expansion Type : **GLAND (WABO-MAUER, TRANSFLEX, ETC)**)			
(Fixed Type :)			

Gap Size (mm)	Gap Location
90	North abut.

Deck Drainage	6	7	No drains. Drains on grade to south
Drains Clogged (Y/N) No			
Curbs/Median	5	6	Medium width transverse cracks in curbs spaced 1.0m apart.
(Curb Type : **Standard**)			
Scaling (Percent Area) 2			

Superstructure				
Bridge Component		**Last**	**Now**	**Explanation of Condition**
(Secondary Span : **CS**)				
Bridge Rail		3	8	Retro - fit rail placed in front of original rail system - both are galvanized.
(Type : **GALVANIZED STEEL BRIDGE TUBE**)				
Bridge Rail Posts		3	7	
(Type : **GALVANIZED POST STEEL;GALVANIZED POST STEEL**)				
Bridge Rail/Posts Coating		3	8	
(Type : **GALVANIZED**)				
Sidewalk		X	X	
Girders		6	7	
Diaphragms/Cross Frame		X	X	
Bearings		X	X	
Temperature (deg. C)				
(Expansion Type :)				
(Fixed Type :)				
Coating Adequate (Y/N)				
Functioning (Y/N)				
Deck Underside		7	7	
Stains (Percent Area)	1			
Span Alignment Problems				
Vertical (Y/N)	No			
Horizontal (Y/N)	No			
Superstructure General Rating		**6**	**7**	

Substructure				
Bridge Component		**Last**	**Now**	**Explanation of Condition**
Abutments				
Bearing Seats		7	7	
(Type : **CONCRETE**)				
Backwalls/Breastwalls		5	7	Repaired.
Wingwalls		7	7	
Piles		N	N	Buried
Paint/Coating		X	X	
Abutment Stability		7	7	
Scour/Erosion		7	7	
Piers/Bents				
(Type : **PIER-COLUMN**)				
Bearing Seats/Caps		6	7	
(Type : **CONCRETE**)				
(Total Number of Bearing Piles : **0:0:0:0**)				Repaired.
Pier Shaft/Piles		4	7	
Bracing/Struts/Sheathing		X	X	
Nose Plate		7	7	

Substructure				
Bridge Component		**Last**	**Now**	**Explanation of Condition**
Paint/Coating		4	4	Tight corrosion at nose plates
(Colour Description :)				
(Colour Code :)				
Pier Stability		7	7	
Scour		6	6	
Debris (Y/N)	No			
Substructure General Rating		**4**	**7**	

Structure Usage				
		Last	**Now**	**Explanation of Condition**
Channel				
(U/S Direction : **W**)				
(D/S Direction : **E**)				
Alignment		7	7	
Bank Stability		7	7	
HWM (m below Top of Curb)	14.0			No visible HWM Trees @ banks.
Drift (Y/N)	Yes			
Slope Protection		7	7	Natural @ South & concrete bag. Gabion wall & Class 2 & Class 3 @ North.
(Type : **RIP RAP; RIP RAP**)				
Guidebank/Spurs		X	X	
Adequacy of Opening		8	8	
(Fish Compensation Measure 1 : **NONE**)				
(Fish Compensation Measure 2 : **NONE**)				
Channel General Rating		**7**	**7**	

Maintenance Recommendations

Inspector Recommendations	Year	Inspector Comments	Department Comments	Target Year	Est. Cost	Cat #
REPAIR/REPLACE BRIDGE RAIL						
GALVANIZE/PAINT BRIDGE RAIL						
RETROFIT BRIDGE RAIL						
SEAL CURBS						
PATCH DECK						
SEAL DECK						
OVERLAY DECK						
REPAIR/REPLACE DECK JOINTS						
RESET/ PAINT BEARINGS						
WASHING						
SHOTCRETE REPAIRS						
REPAIR ABUTMENT SCOUR/EROSION						
PLACE ADDITIONAL RIP RAP						
REMOVE DRIFT ACCUMULATION						
OTHER ACTION						
OTHER ACTION						
OTHER ACTION						
OTHER ACTION						

Structural Condition Rating (Last/Now) (%)	**50.0/77.8**	**Sufficiency Rating (Last/Now) (%)**	**49.2/63.2**	Est. Repl. Yr	2035	Maint. Reqd. (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	Garry Roberts	Previous Assistant's Name	
Next Inspection Date	17-Mar-2014	Previous Inspection Date	06-Oct-2010
Inspection Cycle (Default) (months)	21		
Comment			