

Bridge Inspection									
Bridge File Number	82401 S1-2 Bridge				Form Type	PSR			
Year Built/Year Supstr	2009/2007				Lot No.	2			
Bridge or Town Name	Deerfoot - Stoney Trail North Interchange				Inspector Name	Garry Roberts			
Located Over	201:08 L1 23.877				Inspector Class	BR CLS A			
Located On	2:15 L1 48.859				Assistant Name				
Water Body Cl./Year					Assistant Class				
Navigabil. Cl./Year					Inspection Date	21-Aug-2011			
Legal Land Location	SW SEC 33 TWP 25 RGE 29 W4M				Data Entry By	Erin Roberts			
Longitude, Latitude	-114:00:04, 51:10:31				Data Entry Date	06-Sep-2011			
Road Authority	Alberta Transportation (AIT)				Reviewer Name	Tom Carey			
Contract Main. Area	DEERFOOT/STONEY				Review Date	24-Aug-2011			
Clear Roadway/Skew	24.3 /				Dept. Reviewer Name	Tim Davies			
AADT/Year	66,090 / 2010 (A)				Dept. Review Date	08-Sep-2011			
Road Classification					Follow-Up By				
Detour Length (km)									
Allowable Load (t):	Single	CS1 28	Semi	CS2 49	Train	CS3 62	----> On Critical Spans ---->Critical Member		
Design Loading:	CL800						----> Primary Span		

Posting Information									
Required Vert. Clearance Posting (m)	UNDER: 201 C1-10L 7.1m, 201 L1 6.9m								
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)
Remarks	Adjacent N/B bridge is posted 5.4m								
Required Load Posting (t)	Single		Semi		Truck Train				
Posted Loading (t)	Single		Semi		Truck Train				
Posted:	Lane	WB	At Junction (Y/N)	In Advance (Y/N)	At Bridge (Y/N)				
Posted:	Lane	EB	At Junction (Y/N)	In Advance (Y/N)	At Bridge (Y/N)				
Remarks	Not req.								
Hazard Marker At Bridge (Y/N)	No								
Remarks	Not req.								
Other Sign Types									

Utilities (Located at)									
Utility Attachments									
Telephone					Gas				
Power	Lighting under deck				Municipal				
Others	Light standards				Problem (Y/N)	No			
Remarks									

Approach Road									
			Last	Now	Explanation of Condition				
Horizontal Alignment			7	7	1 missing bolt at SW thriebeam post to steel block. 2 loose thriebeam transition bolts at NE.				
Vertical Alignment			8	8					
Roadway Width (m)									
Approach Bump			8	8					
Guardrail (Y/N)	Yes								
Guardrail			4	4					
Length (m)	99.000								
Current Standard (Y/N)	Yes								
Termination Type	Attenuator								
Drainage			7	7					
Approach Road General Rating			7	7					

Superstructure						
Bridge Component		Last	Now	Explanation of Condition		
(Primary Span : NU, 2 Spans, Lengths(m): 37.5-37.5, A-Ident Number:)						
Special Features						
Special Feature			X			
(Type :)						
Special Feature			X			
(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			8	8		
(Material Type : ACP)						
(Thickness(mm) : 90)						
Lateral Connection Problem (Y/N)		No				
Deck Top			N	N	Paved over.	
Deck Rideability			8	8		
Deck Joints			8	8		
Temperature (deg. C)		23				
(Expansion Type : GLAND (WABO-MAUER, TRANSFLEX, ETC))						
(Fixed Type :)						
Gap Size (mm)		Gap Location				
65		Abut.1				
65		Abut. 2				
Deck Drainage			7	7		
Drains Clogged (Y/N)		No				
Curbs/Median			8	8		
(Curb Type :)						
Scaling (Percent Area)		0				
Bridge Rail			X	X	Pigmented sealer at parapet exteriors	
(Type :)						
Bridge Rail Posts			X	X		
(Type :)						
Bridge Rail/Posts Coating			8	8		
(Type :)						
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			4	7	No visible cracks at abut. ends of girders. Appears to be hairline diagonal web cracks at pier ends.	
Cracking (Y/N)		Yes				
Spalling (Percent Area)		0				
(Number Of Girders : 9)						
Diaphragms/Cross Frame			9	8		

Superstructure				
Bridge Component		Last	Now	Explanation of Condition
(Primary Span : NU, 2 Spans, Lengths(m): 37.5-37.5, A-Ident Number:)				
Bearings		9	8	Exp. bearings both abuts. No A/B on 3 exterior girders- by design.
Temperature (deg. C)	23			
(Expansion Type : REINFORCED NEOPRENE BEARING WITH TEFLON AND STAINLESS STEEL)				
(Fixed Type :)				
Coating Adequate (Y/N)	Yes			
Functioning (Y/N)	Yes			
Deck Underside		7	7	Minor honeycomb at isolated areas.
Stains (Percent Area)	0			
Span Alignment Problems				
Vertical (Y/N)	No			
Horizontal (Y/N)	No			
Superstructure General Rating		4	4	
Substructure				
Bridge Component		Last	Now	Explanation of Condition
Abutments				
Bearing Seats/Caps		8	8	
(Type : CONCRETE)				
Backwalls/Breastwalls		7	7	Access hatch at G4-G5. Missing 3 lower bolts at A2. Isolated vertical cracks.
Wingwalls		8	8	
Piles		N	N	Buried.
Paint/Coating		7	7	Pigmented sealer
Abutment Stability		9	8	
Scour/Erosion		5	7	
Piers/Bents				
(Type : PIER-COLUMN)				
Bearing Seats/Caps		9	8	
(Type : CONCRETE)				
(Total Number of Bearing Piles : 0)				
Pier Shaft/Piles		9	8	
Bracing/Struts/Sheathing		X	X	
Nose Plate		X	X	Pigmented sealer
Paint/Coating		7	7	
(Colour Description :)				
(Colour Code :)				
Pier Stability		9	8	
Scour		6	7	
Debris (Y/N)	No			
Substructure General Rating		8	8	

Structure Usage				
		Last	Now	Explanation of Condition
Grade Separation				
Road Alignment		7	7	
Traffic Safety Features		X	X	
Type				
Slope Protection		8	8	
(Type : CONCRETE; CONCRETE)				
Bank Stability		5	7	
Drainage		7	7	
Grade Separation General Rating		5	7	

Maintenance Recommendations							
Inspector Recommendations	Year	Inspector Comments	Department Comments	Target Year	Est. Cost	Cat #	
REPAIR/REPLACE BRIDGE RAIL	2012	Install 1 missing bolt at SW- tighten 2 bolts at NE					
GALVANIZE/PAINT 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	2012	Install 3 access hatch bolts at North abut					
OTHER ACTION							
OTHER ACTION							
Structural Condition Rating (Last/Now) (%)	66.7/66.7	Sufficiency Rating (Last/Now) (%)	58.8/62.0	Est. Repl. Yr	2078	Maint. Req. (Y/N)	Yes
Special Comments for Next Inspection	Re-rate girder cracks after AT girder rating guide for NU girders is available- expected early 2010 (G.Roberts Nov 27/09)		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	21-May-2013		Previous Inspection Date	26-Nov-2009			
Inspection Cycle (Default) (months)	21						
Comment							