

Bridge Inspection										
Bridge File Number	82401 N1-3 Bridge				Form Type	PSR				
Year Built/Year Supstr	2007/2007				Lot No.	3				
Bridge or Town Name	Deerfoot - Stoney Trail North Interchange				Inspector Name	Garry Roberts				
Located Over	201:02 R1 0.016				Inspector Class	BR CLS A				
Located On	2:15 R1 48.565				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	Alyssa Boynton				
Longitude, Latitude	-114:00:03, 51:10:25				Data Entry Date	09-Sep-2011				
Road Authority	Alberta Transportation (AIT)				Reviewer Name	Tom Carey				
Contract Main. Area	DEERFOOT/STONEY				Review Date	24-Aug-2011				
Clear Roadway/Skew	31.1 /				Dept. Reviewer Name	Tim Davies				
AADT/Year	66,090 / 2010 (A)				Dept. Review Date	16-Sep-2011				
Road Classification					Follow-Up By					
Detour Length (km)	1									
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 R1 6.0m								
Posted Vertical Clearance (Y/N)	No								
Posted:	Lane	NB	On Bridge (m)	In Advance (Y/N)	Lane	SB	On Bridge (m)	In Advance (Y/N)	
Remarks	S/B bridge #4 is posted								
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	Under deck				Municipal	Light standards				
Others	Unknown electrical at SE				Problem (Y/N)	No				
Remarks										

Approach Road				
		Last	Now	Explanation of Condition
Horizontal Alignment		7	7	Thriebeam is missing 2 bolts at post to block connection of 7 posts each corner. Also other loose and missing bolts. 3 loose transition plate bolts at NW approach to bridge barrier connection and 4 loose at SE
Vertical Alignment		8	8	
Roadway Width (m)				
Approach Bump		5	7	
Guardrail (Y/N)	Yes			
Guardrail		3	4	
Length (m)	99.000			
Current Standard (Y/N)	Yes			
Termination Type	Attenuator			
Drainage		4	5	
<b>Approach Road General Rating</b>		<b>7</b>	<b>7</b>	

Superstructure							
Bridge Component		Last	Now	Explanation of Condition			
(Primary Span : <b>NU, 1 Spans, Lengths(m): 44.3, A-Ident Number: )</b>							
<b>Special Features</b>							
Special Feature			X				
(Type : )							
Special Feature			X				
(Type : )							
Wearing Surface/Deck Top Detail Ratings							
	N (%)	1 (%)	2 (%)	3 (%)			
<b>Last</b>	0	0	0	0			
<b>Now</b>	0.0	0.0	0.0	0.0			
Wearing Surface			6	7			
(Material Type : <b>ACP</b> )							
(Thickness(mm) : <b>90</b> )							
Lateral Connection Problem (Y/N)		No					
Deck Top			N	N	Paved over.		
Deck Rideability			8	8			
Deck Joints			4	8	Gland at Abut. 1		
Temperature (deg. C)		23					
(Expansion Type : <b>GLAND (WABO-MAUER, TRANSFLEX, ETC)</b> )							
(Fixed Type : )							
Gap Size (mm)		Gap Location					
70		Abut. 1					
20		Abut. 2					
Deck Drainage			7	7			
Drains Clogged (Y/N)		No					
Curbs/Median			7	7	Cable barrier median separates 3 through lanes 2. Wide vertical cracks		
(Curb Type : <b>JERSEY/F SHAPE</b> )							
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			
<b>Girder Detail Ratings</b>							
	N (count)	1 (count)	2 (count)	3 (count)			
<b>Last</b>	0	0	0	0			
<b>Now</b>	0	0	0	0			
Girders			4	4	Hairline longitudinal and diagonal cracks in end blocks of G1-G2-G10 at Abut.1 and G3-G4, G5, G7-G8, G9, G10 at Abut. 2. Marked from 2008 Level 2 inspection.		
Cracking (Y/N)		Yes					
Spalling (Percent Area)		0					
(Number Of Girders : <b>10</b> )							
Diaphragms/Cross Frame			9	8			

Superstructure				
Bridge Component		Last	Now	Explanation of Condition
(Primary Span : NU, 1 Spans, Lengths(m): 44.3, A-Ident Number: )				
Bearings		9	8	Exp. at Abut. 1 Fixed at Abut. 2. Exterior 3 girders at Abut. 2 have teflon sliders
Temperature (deg. C)	23			
(Expansion Type : REINFORCED PAD BEARING)				
(Fixed Type : REINFORCED PAD BEARING)				
Coating Adequate (Y/N)	Yes			
Functioning (Y/N)	Yes			
Deck Underside		8	8	
Stains (Percent Area)	0			
<b>Span Alignment Problems</b>				
Vertical (Y/N)	No			
Horizontal (Y/N)	No			
<b>Superstructure General Rating</b>		<b>4</b>	<b>4</b>	
Substructure				
Bridge Component		Last	Now	Explanation of Condition
<b>Abutments</b>				
Bearing Seats/Caps		9	8	
(Type : CONCRETE)				
Backwalls/Breastwalls		7	7	Isolated wide vertical cracks. Access hatch between G5-G6
Wingwalls		8	8	
Piles		N	N	Buried.
Paint/Coating		4	7	
Abutment Stability		9	8	
Scour/Erosion		5	7	
<b>Piers/Bents</b>				
(Type : )				
Bearing Seats/Caps		X	X	
(Type : )				
(Total Number of Bearing Piles : )				
Pier Shaft/Piles		X	X	
Bracing/Struts/Sheathing		X	X	
Nose Plate		X	X	
Paint/Coating		X	X	
(Colour Description : )				
(Colour Code : )				
Pier Stability		X	X	
Scour		X	X	
Debris (Y/N)	No			
<b>Substructure General Rating</b>		<b>9</b>	<b>8</b>	
Structure Usage				
		Last	Now	Explanation of Condition
<b>Grade Separation</b>				
Road Alignment		7	7	

Structure Usage				
		Last	Now	Explanation of Condition
Traffic Safety Features		X	X	
Type				
Slope Protection		8	7	Isolated crack at top South East corner.
(Type : <b>CONCRETE; CONCRETE</b> )				
Bank Stability		5	7	
Drainage		7	7	
<b>Grade Separation General Rating</b>		<b>5</b>	<b>7</b>	

Maintenance Recommendations							
Inspector Recommendations	Year	Inspector Comments	Department Comments	Target Year	Est. Cost	Cat #	
REPAIR/REPLACE BRIDGE RAIL	2012	Install approx. 60 missing approach rail bolts (3) and tighten 2 transition bolts at North West end and 4 at South East.					
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							
OTHER ACTION							
OTHER ACTION							
<b>Structural Condition Rating (Last/Now) (%)</b>	<b>72.2/66.7</b>	<b>Sufficiency Rating (Last/Now) (%)</b>	<b>61.2/62.0</b>	Est. Repl. Yr	2081	Maint. Reqd. (Y/N)	Yes
Special Comments for Next Inspection	Adjust NU girder ratings after AT produces girder rating guide - expected in early 2010 (G.Roberts Nov. 25/09)		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	25-Nov-2009			
Inspection Cycle (Default) (months)	21						
Comment							