

Bridge Inspection									
Bridge File Number	75935 S-1 Bridge					Form Type	SG		
Year Built/Year Supstr	1968/1968					Lot No.	2		
Bridge or Town Name	EDMONTON					Inspector Name	Wade Nanninga		
Located Over	SHERWOOD PARK FREEWAY:02 R1 2.635;SHERWOOD PARK FREEWAY:02 L1 2.641					Inspector Class	BR CLS A		
Located On	RAMP 83-1 A;LOCAL ROAD					Assistant Name			
Water Body Cl./Year						Assistant Class			
Navigabil. Cl./Year						Inspection Date	14-Jan-2013		
Legal Land Location	SE SEC 29 TWP 52 RGE 23 W4M					Data Entry By	Lisa Fairhurst		
Longitude, Latitude	-113:21:18, 53:30:52					Data Entry Date	26-Mar-2013		
Road Authority	Alberta Transportation (AIT)					Reviewer Name	Eric Carcoux		
Contract Main. Area	ANTHONY HENDAY DRIVE					Review Date	25-Mar-2013		
Clear Roadway/Skew	7.3 / 22 deg. (RHF)					Dept. Reviewer Name	Brent Herrick		
AADT/Year	4,400 / 2013 (E)					Dept. Review Date	26-Mar-2013		
Road Classification	RAU-209-110					Follow-Up By			
Detour Length (km)	1								
Allowable Load (t):	Single		Semi		Train				----> On Critical Spans ---->Critical Member
Design Loading:	HS20								----> Primary Span

Posting Information												
Required Vert. Clearance Posting (m)	UNDER: SHERWOOD PARK FREEWAY L1 5.3m, SHERWOOD PARK FREEWAY R1 5.3m											
Posted Vertical Clearance (Y/N)	Yes											
Posted:	Lane	EB	On Bridge (m)	5.6	In Advance (Y/N)	Yes	Lane	WB	On Bridge (m)	5.3	In Advance (Y/N)	Yes
Remarks												
Required Load Posting (t)	Single				Semi				Truck Train			
Posted Loading (t)	Single				Semi				Truck Train			
Posted:	Lane	NB	At Junction (Y/N)		In Advance (Y/N)			At Bridge (Y/N)				
Posted:	Lane	SB	At Junction (Y/N)	No	In Advance (Y/N)		No	At Bridge (Y/N)		No		
Remarks												
Hazard Marker At Bridge (Y/N)	No											
Remarks	None required.											
Other Sign Types	Information, Speed, Directional.											

Utilities (Located at)									
Utility Attachments									
Telephone						Gas			
Power						Municipal			
Others	Street lighting.{Abandoned on parapet. July 20, 2010 CP inspection}					Problem (Y/N)	No		
Remarks									

Approach Road									
		Last	Now	Explanation of Condition					
Horizontal Alignment		5	5	Access to bridge from Sherwood Park Freeway has tight curve.					
Vertical Alignment		6	6						
Roadway Width (m)	7.200								
Approach Bump		5	5						
Guardrail (Y/N)	Yes								
Guardrail		3	3	{Missing 1 splice bolt. Not connected to parapet @ NW corner. 1 cracked recycled plastic post @ NW. July 20, 2010 CP inspection} Turndown NE. Turnouts at SE & SW. Not connected to BR at NW.-photo No thrie beam, missing posts @ corners.					
Length (m)	58.000								
Current Standard (Y/N)	No								
Termination Type	Turned Down								
Drainage		6	6						

Approach Road				
		Last	Now	Explanation of Condition
Approach Road General Rating		5	5	
Superstructure				
Bridge Component		Last	Now	Explanation of Condition
(Primary Span : RB, 4 Spans, Lengths(m): 13.1-28.7-24.7-13.1, A-Ident Number: A0591-01)				
Special Features				
Special Feature			X	
(Type :)				
Special Feature			X	
(Type :)				
Wearing Surface/Deck Top Detail Ratings				
	N (%)	1 (%)	2 (%)	3 (%)
Last				
Now	80.0	0.0	0.0	0.0
Wearing Surface		7	7	
(Material Type : ACP)				
(Thickness(mm) : 50)				
Deck Top		N	N	
Deck Rideability		7	7	
Deck Joints		3	3	{SE curb coverplate corroded through. Trough conditions under deck drainage. July 20, 2010 CP inspection} Slight vertical misalignment of fingers. North drain trough failed. South drain trough corroded and leaking. North paving lip deteriorated, 1m length - photo. South paving lip deteriorated, 0.8m length.
Temperature (deg. C)		-5		
(Expansion Type : FINGER PLATES)				
(Fixed Type :)				
Gap Size (mm)		Gap Location		
8		North abutment - expansion		
35		South abutment - expansion		
Deck Drainage		3	3	South drain trough rusted, hole 300mm long @ c/l of bridge. North abutment drain trough 40% rusted away and missing - photo.
Drains Clogged (Y/N)		No		
Curbs/Median		4	N	No drains. Spalling along bottom edge and at joints. Vertical cracks at 0.4m spacing in curb parapet. Small spalls along cracks throughout. Peeling 30% failure.
(Curb Type : JERSEY/F SHAPE)				
Scaling (Percent Area)		20		
Bridge Rail		X	X	There is no bridgerail.
(Type :)				
Bridge Rail Posts		X	X	
(Type :)				
Bridge Rail/Posts Coating		X	X	
(Type :)				
Sidewalk		X	X	
Girder/Beam				
Cover Plate		7	7	Very slight sag in bottom flanges of exterior girders of north span.
Flange		6	6	
Web		7	7	
Stiffeners		7	7	
Splice		7	7	
Weld		7	7	

Superstructure					
Bridge Component		Last	Now	Explanation of Condition	
(Primary Span : RB, 4 Spans, Lengths(m): 13.1-28.7-24.7-13.1, A-Ident Number: A0591-01)					
Diaphragms/Cross Frame		7	7		
Paint Condition		4	4	Pitting rust about 20% of bottom flange. Rust on 10% of diaphragms. Green.	
(Colour Description :)					
(Colour Code :)					
Touchup Required (Y/N)	No				
Bearings		4	4	{Bearings 1, 2 & 3 fully extended at 22 degree. July 20, 2010 CP inspection} Bearing 1 @ A2 has pack rust and has jacked up 10mm. Bearing 2 & 3 @ A2, anchor bolt bent. Bearing 4 @ A2 East anchor bolt broken off.	
Temperature (deg. C)	-5				
(Expansion Type : SLIDING PLATE)					
(Fixed Type : PINNED BEARING)					
Coating Adequate (Y/N)	No				
Functioning (Y/N)	Yes				
Deck Underside		4	4	Transverse cracks with rust stain and/or efflorescence. Staining and scaling around weep tubes. Spalling with exposed rebar between G3G4 @ S2, S3 & S4. Similar on spans 1, 2 & 3.	
Stains (Percent Area)	15				
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		7	7		
(Type : CONCRETE)					
Backwalls/Breastwalls		5	5		
Wingwalls		5	5		
Piles		N	N		
Paint/Coating		4	4	Staining @ abutments	
Abutment Stability		6	6		
Scour/Erosion		4	4	(Slope protection buckled July 2010)	
Piers/Bents					
(Type : PIER-COLUMN)					
Bearing Seats/Caps		5	5		
(Type : CONCRETE)					
(Total Number of Bearing Piles : 2:2:2)					
Pier Shaft/Piles		5	5		
Bracing/Struts/Sheathing		X	X		
Nose Plate		X	X		
Paint/Coating		4	4	40% of paint is cracked & peeling. Grey.	
(Colour Description :)					
(Colour Code :)					
Pier Stability		5	5		
Scour		X	X		
Debris (Y/N)	No				

Substructure				
Bridge Component		Last	Now	Explanation of Condition
Substructure General Rating		5	5	
Structure Usage				
		Last	Now	Explanation of Condition
Grade Separation				
Road Alignment		8	8	
Traffic Safety Features		4	6	
Type	Flexbeam/H.M.			
Slope Protection		4	4	{Buckled @ NW by pier 3. July 20, 2010 CP inspection}
(Type : CONCRETE; CONCRETE)				
Bank Stability		6	6	
Drainage		5	5	
Grade Separation General Rating		4	4	

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	2014	{Patch next major rehab. July 20, 2010 CP inspection}					
SEAL DECK							
OVERLAY DECK							
REPAIR/REPLACE DECK JOINTS	2013	Replace abutment drain troughs.					
RESET/ PAINT BEARINGS	2014	{Repair bearings next rehab. July 20, 2010 CP inspection} Consider re-setting/repairing bearings @ A2.					
REPAINT SUPERSTRUCTURE	2015	{Paint within 5 years. July 20, 2010 CP inspection}					
STRAIGHTEN/REPLACE MEMBERS							
WASHING							
SHOTCRETE REPAIRS							
REPAIR ABUTMENT SCOUR/EROSION							
PLACE ADDITIONAL RIP RAP							
REMOVE DRIFT ACCUMULATION							
OTHER ACTION	2013	Repair paving lips @ A1 & A2.					
OTHER ACTION	2013	Connect GR to Jersey barrier @ NW.					
OTHER ACTION	2013	{Replace 1 recycled plastic guardrail post and attach guardrail to bridge @ NW & install 1 splice bolt @ NW. If not done}					
OTHER ACTION	2013	{Replace pier hazard markers. July 20, 2010 CP inspection}					
Structural Condition Rating (Last/Now) (%)	50.0/50.0	Sufficiency Rating (Last/Now) (%)	49.4/49.4	Est. Repl. Yr	2022	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	Randy Bredo		Previous Assistant's Name	Bryce Clayton			
Next Inspection Date	14-Apr-2016		Previous Inspection Date	08-Mar-2011			
Inspection Cycle (Default) (months)	39						

Comment	
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