APPENDIX C

2011 Routine Bridge Inspection Report

BRIDGE INSPECTION REPORT
Wisconsin Dept. of Transportion
DT2007 2003 s.84.17 Wis. Stats. Type = ROUTINE INSPECTION

Inventory Data

Feature On: S 6TH ST		Maintainer: CITY		Structure No: B-40-413-000A
Feature Under: CENTRAL PACIFIC RR		Sect/Twn/Rng: S32 T07N R22E		
Location: 0.2M S JCT CANAL ST		County: MILWAUKE	Municipality: CITY-MILWAUKEE(40251)	
Inv Rating: HS22	Rdwy Width (ft): 58.0	Deck Width (ft): 81.0, 96.0	Existing Posting:	
Oper Rating: HS30	Total Length (ft): 575.0	Deck Area(ft2): 50887	ADT On: 17750 Yr: 2000	ADT Under: Yr:

Inspection Type (* = Supplemental Form Required)

	Routine Visual	Fracture Critical*	In-Depth*	UW-Dive*	UW-Surv*	UW-Probe/Visual*	Movable*
Last Insp.	10-27-09						
Frequency	24						
Recom. Freq.							
	Initial*	Damage	Interim	Load Posted	SI & A Field Review*		
Last Insp.	02-28-03						
Frequency	N/A						
Recom. Freq.	N/A				Item No. Needing Change		

Load Rating Information

Overburden	Measurement (in):	Date:	Deck Surface Type: CONCRETE	
Section Loss	File Meas. (%):	File Insp. Date: 10-27-09	Insp. Measurement (%):	Describe:
Re-rate for load capacity?		Reason:		Date Last Rated:

Expansion Joints

Location	Type	File Insp. Date	File Insp. (in)	New Insp. (in)
		Temp:	50	53
N ABUT	STRIPSEA		3.5	2.5
S ABUT	STRIPSEA		3.5	2.4

Signing Condition

Type of Marker	File	Y/N	Comments
Bridge Markers	N	N	
Narrow Bridge	N	N	
One Lane Road	N	N	
Vertical Clearance	N	N	
Weight Limit Post	N	N	
Other(Addl. Sign)	N	N	

Clearances(Cardinal = N or E)	File Meas. (ft.)	File Date	New Meas. (ft.)
Min. Vertical Clearance Under (Cardinal)			
Min. Veritcal Clearance Under (non-Cardinal)			
Min. Vertical Clearance On			

Structure Type

Material	Configuration	# of Spans	Overall Length (ft)
CONT CONCRETE	OTHER GIRDER		123.0
CONT CONCRETE	OTHER GIRDER		195.0
CONT CONCRETE	OTHER GIRDER		67.0
CONT CONCRETE	OTHER GIRDER		67.0
CONT CONCRETE	OTHER GIRDER		67.0

Construction/Rehabilitation History

Year	Work Performed	Plan	Shop
2002	NEW STRUCTURE		

Inspection Information

Special Requirements	Y/N	Comments
Traffic Control	Y	
Access Equipment	Y	
Other	Y	

Inspector Information

Team Leader Name and No. Printed: Washington, James (2523)	Team Member(s) Name(s) Printed: Jonathan Thomas	
Team Leader Signature:	Inspection Date: 11-01-11	Inspection Agency: CITY (3)
District/Local Manager and No. Printed:	District/Local Manager Signature:	Review Date:

Element Inspection (X) Check Elements Inspected

Ck	Elem./Env.	Description	Unit	Total QTY.	Quantity in Condition States 1	2	3	4	5
X	147 / 4	Misc Cable Coated	EA	24	24				
X	205 / 2	R/Conc Column	EA	8	8				
	Some hairline cracks.								
X	215 / 3	R/Conc Abutment	LF	91	87	4			
	North abutment has moderate-sized vertical cracks at the bearings. Diagonal crack at utility at east side of the north abutment. Both abutments have some hairline cracks.								
X	300 / 4	Strip Seal Exp Joint	LF	174	174				
	Needs to be cleaned. North Abutment Strip Seal Holding Water.								
X	310 / 4	Elastomeric Bearing	EA	6	6				
X	321 / 4	R/Conc Approach Slab	EA	1		1			
	Cracks in approach pavement.								
X	334 / 4	Metal Rail Coated	LF	1762	1762				
	(Includes 2-line guardrail & 3-line railings)								
X	341 / 2	Asphaltic Slope Prot	EA	1	1				
	At south abutment.								
X	358 / 4	Deck Cracking SmFlag	EA	1		1			
	Deck map cracking.								
X	359 / 4	Und Dk Surf Sm Flag	EA	1	1				
	Some hairline cracks.								
X	400 / 3	Concrete Wingwall	EA	2	2				
X	405 / 2	Drainage	EA	6	6				
X	415 / 4	Sidewalk/Median	LF	1116		1116			
	Cracks in sidewalk in area of cable anchors (314LF W. & 294LF E., measured in 2009). Hairline to moderate sized cracks throughout both sidewalks.								
X	448 / 4	Conc Slab-Prot CO	SF	51418		51418			
	(Post-tensioned with 2" conc overlay) Map cracking in several locations. Concrete is cracked/crushed at northwest bearing.								

General Inspection/Maintenance Notes

Reinforced Concrete Pylon (2 EA) - cracking every 15 inches. Water leakage - paint peeling adjacent to W. bearing @ N. end of deck. Minor cracks on underside of deck.

NBI Ratings

NBI	File	New	NBI	File	New
Deck	7	7	Culvert	N	N
Superstructure	7	7	Channel	N	N
Substructure	7	7	Waterway	N	N

Maintenance Recommendations (See standard code items & numbers)

Maintenance Item:
Amount: Date(YYYY-MM-DD):
Maintenance item comment:

Maintenance Item:
Amount: Date(MM-DD-YY):
Maintenance item comment:

Maintenance Item:
Amount: Date(MM-DD-YY):
Maintenance item comment:

STRUCTURE INVENTORY AND APPRAISAL FIELD REVIEW FORM

B-40-413-000A
S 6TH ST over CENTRAL PACIFIC RR

LOCATION

(3) Municipality:	CITY-MILWAUKEE(40251)
(16) Latitiude(° ' "):	43°01'39.56"N
(17) Longitude(° ' "):	87°55'05.30"W

TRAFFIC SERVICE

(28A) Lanes On:	4
(28B) Lanes Under:	
(102) Traffic Pattern On:	-NO TRAFFIC -ONE WAY TRAFFIC X-TWO WAY TRAFFIC
(102) Traffic Pattern Under:	X-NO TRAFFIC -ONE WAY TRAFFIC -TWO WAY TRAFFIC
(19) Detour Length(mi):	2

GEOMETRY

(49) Structure Length(ft):	575.0	
(50) Sidewalk Width(ft):	Left: 8.5	Right: 8.5
(50) Curb Width(ft):		
(52) Culvert Barrel Length(ft):		
(34) Skew:	Angle(°):	Direction: -RIGHT FORWARD -LEFT FORWARD
	Cardinal Width	Non-Cardinal Width
(51) Bridge Roadway(ft):	58.0	58.0
(52) Deck(ft):	81.0	96.0
(32) Approach Roadway(ft):	58	58
	Cardinal Under Clearance	Non-Cardinal Under Clearance
(47) Minimum Horizontal(ft):		
(55) Minimum Right Lateral(ft):		
(55) Minimum Left Lateral(ft):		

RAILING APPRAISAL

(36A) Bridge Rail Adequacy:	-SUB-STANDARD X-STANDARD -NOT APPLICABLE
(36B) Transition Adequacy:	-SUB-STANDARD -STANDARD X-NOT APPLICABLE
(36C) Approach Guardrail Adequacy:	-SUB-STANDARD -STANDARD X-NOT APPLICABLE
(36D) Guardrail Termination Adequacy:	-SUB-STANDARD -STANDARD X-NOT APPLICABLE

Outer Rail:

Left	Right	Type
		TYPE F (TWO SQUARE TUBES) - STEEL(8)
		TYPE F (3 SQUARE TUBES) - STEEL(65)
		TYPE F (4 SQUARE TUBES) - STEEL(72)
		TYPE M-STEEL 3 SQUARE TUBES(93)
		SLOPED FACE PARAPET LF(91)
		SLOPED FACE PARAPET HF(92)
		VERTICAL FACE PARAPET TYPE A(74)
		TYPE W-THRIE BEAM(79)
		TYPE H ON VERTICAL PARAPET(80)
		TIMBER(38)
X	X	OTHER(99) (Please specify) **Left:** TYPE A ROADWAY - ALUMINUM(2) **Right:** TYPE A ROADWAY - ALUMINUM(2)

Transition Type:

	CONT GUARD RAIL
	NO APP GRDRL
	NO ATTACHMENT
	22 MM(7/8") BOLT (Please enter quantity)
	25 MM(1") BOLT (Please enter quantity)
	OTHER (Please specify)

Guardrail Termination Type:

	(01) ENERGY ABSORBING TERMINAL/EAT
	(02) TURN DOWN
	(99) OTHER (Please specify)

ROADWAY ALIGNMENT APPRAISAL

(72) Approach Alignment Appraisal:

	(3) INTOLERABLE- Horizontal or Vertical curvature requires a substantial reduction in vhicle operating speed
	(6) FAIR- Horizontal or Vertical curvature requires a very minor speed reduction
X	(8) GOOD- No speed reduction required

BRIDGE INSPECTION REPORT
Wisconsin Dept. of Transportion
DT2007 2003 s.84.17 Wis. Stats. Type = ROUTINE INSPECTION

Inventory Data

Feature On: N 6TH ST		Maintainer: CITY		Structure No: B-40-414-000C
Feature Under: ST PAUL AV,HINMAN,		Sect/Twn/Rng: S29 T07N R22E		
Location: 0.3M N JCT CANAL ST		County: MILWAUKE	Municipality: CITY-MILWAUKEE(40251)	
Inv Rating: HS22	Rdwy Width (ft): 58.0	Deck Width (ft): 81.0, 96.0	Existing Posting:	
Oper Rating: HS30	Total Length (ft): 668.9	Deck Area(ft2): 59197	ADT On: 17750 Yr: 2000	ADT Under: Yr:

Inspection Type (* = Supplemental Form Required)

	Routine Visual	Fracture Critical*	In-Depth*	UW-Dive*	UW-Surv*	UW-Probe/Visual*	Movable*
Last Insp.	10-27-09						
Frequency	24					24	
Recom. Freq.							
	Initial*	Damage	Interim	Load Posted	SI & A Field Review*		
Last Insp.	02-28-03						
Frequency	N/A						
Recom. Freq.	N/A				Item No. Needing Change		

Load Rating Information

Overburden	Measurement (in):	Date:	Deck Surface Type: CONCRETE	
Section Loss	File Meas. (%):	File Insp. Date: 10-27-09	Insp. Measurement (%):	Describe:
Re-rate for load capacity?		Reason:		Date Last Rated:

Expansion Joints

Location	Type	Temp: File Insp. Date	50 File Insp. (in)	53 New Insp. (in)
BASC PIE	STRIPSEA		3.0	2.8
POST OFF	STRIPSEA		3.0	1.8
N ABUT	STRIPSEA		3.0	2.0

Signing Condition

Type of Marker	File	Y/N	Comments
Bridge Markers	N	N	
Narrow Bridge	N	N	
One Lane Road	N	N	
Vertical Clearance	N	N	
Weight Limit Post	N	N	
Other(Addl. Sign)	N	N	

Clearances(Cardinal = N or E)	File Meas. (ft.)	File Date	New Meas. (ft.)
Min. Vertical Clearance Under (Cardinal)	16.75	05-14-03	
Min. Veritcal Clearance Under (non-Cardinal)			
Min. Vertical Clearance On			

Structure Type

Material	Configuration	# of Spans	Overall Length (ft)
CONT CONCRETE	OTHER GIRDER		55.2
CONT CONCRETE	OTHER GIRDER		67.0
CONT CONCRETE	OTHER GIRDER		195.0
CONT CONCRETE	OTHER GIRDER		115.0
CONT CONCRETE	OTHER GIRDER		120.0

Construction/Rehabilitation History

Year	Work Performed	Plan	Shop
2002	NEW STRUCTURE		

Inspection Information

Special Requirements	Y/N	Comments
Traffic Control	Y	
Access Equipment	Y	
Other	Y	

Inspector Information

Team Leader Name and No. Printed: Washington, James (2523)	Team Member(s) Name(s) Printed: Jonathan Thomas	
Team Leader Signature:	Inspection Date: 11-01-11	Inspection Agency: CITY (3)
District/Local Manager and No. Printed:	District/Local Manager Signature:	Review Date:

Element Inspection (X) Check Elements Inspected

Ck	Elem./Env.	Description	Unit	Total QTY.	Quantity in Condition States 1	2	3	4	5
X	147 / 4	Misc Cable Coated	EA	24	24				
X	205 / 4	R/Conc Column	EA	8	8				
X	215 / 3	R/Conc Abutment	LF	65	62	3			
	At north. Full height cracks in abutment. Spall near the center of the abutment.								
X	300 / 4	Strip Seal Exp Joint	LF	200		200			
	Standing water and debris in expansion joint.								
X	310 / 4	Elastomeric Bearing	EA	4	4				
X	321 / 4	R/Conc Approach Slab	EA	1		1			
	At north. Cracks in approach slab.								
X	334 / 4	Metal Rail Coated	LF	2036	2036				
	(Includes 2-line guardrail and 3-line rail)								
X	358 / 4	Deck Cracking SmFlag	EA	1		1			
	Overlay has moderate map cracking throughout.								
X	359 / 4	Und Dk Surf Sm Flag	EA	1	1				
X	400 / 3	Concrete Wingwall	EA	2	2				
X	405 / 2	Drainage	EA	10	10				
X	415 / 4	Sidewalk/Median	LF	1261		1261			
	Cracks throughout sidewalk. Cracks in sidewalk (most are sealed) in areas of cable anchors - 318ft W & 321ft E. Cracks are wider (greater than .06") at the northeast cable connections. (Measured in 2009)								
X	448 / 4	Conc Slab-Prot CO	SF	59348		59348			
	(Post-tensioned w/2" conc overlay as part of original design). Map cracked. Standing water at curbline near center of the bridge (over W. St. Paul Ave.)								

General Inspection/Maintenance Notes

Reinforced concrete pylons - 2 EA - cracking north side of pylon. Sidewalks are cracking.

NBI Ratings

NBI	File	New	NBI	File	New
Deck	7	7	Culvert	N	N
Superstructure	7	7	Channel	N	N
Substructure	7	7	Waterway	N	N

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	Cardinal Under Clearance	Non-Cardinal Under Clearance
(47) Minimum Horizontal(ft):	48.0	
(55) Minimum Right Lateral(ft):	18.0	
(55) Minimum Left Lateral(ft):		

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