

## Special Bridge Repairs - 2009-11 Biennium - Olympic Region

(Sorted by Priority#)

Bridge Number:	Bridge Name:	BMS Description:	Repair Description:	Region:	2009-11 Priority#:	Bridge\$'s:	Total\$'s:	
005/342N-E	MCALLISTER CR	Concrete Submerged Pile/Column	Repair deteriorated submerged columns in pier 3.	OL	1	\$200,000	\$350,000	
005/342E	MCALLISTER CR	Concrete Submerged Pile/Column	Repair the submerged concrete columns in pier 2.	OL	1	\$50,000	\$75,000	
005/345E	NISQUALLY RIVER	Steel Stringer	Modify steel stringer connections to mitigate the cracking problem in the webs along the top flange.	OL	1		\$1,798,526	
101/508E	MUD BAY	Concrete Submerged Pile/Column	Repair salt water deteriorated columns in piers 4, 5 & 6.	OL	1	\$150,000	\$513,753	
101/508W	MUD BAY	Concrete Submerged Pile/Column	Repair salt water deteriorated columns in piers 4, 5 & 6.	OL	1	\$150,000	\$513,753	
005/321	CAPITOL LAKE	Strip Seal Expansion Joint	Replace strip seal expansion joint.	OL	5	\$300,000	\$528,000	
005/342W-S	MCALLISTER CR	Concrete Submerged Pile/Column	Repair salt water deteriorated columns @ piers 2 & 4.	OL	32	\$200,000	\$350,000	
005/452W	PORTLAND AVE OC	Exp Jnt - Rubber Bolt Down	Replace the rubber bolt down expansion joints.	OL	46	\$131,000	\$393,000	
005/453	SR 167 E-N RAMP OC	Exp Jnt - Rubber Bolt Down	Replace the rubber bolt down expansion joints.	OL	47	\$75,000	\$442,500	
005/455	EAST T ST SEWER OC	Exp Joint - Rubber Bolt Down	Replace the rubber bolt down expansion joints.	OL	48	\$130,000	\$390,000	
104/005.1	HOOD CANAL-WEST HALF	Floating Bridge - Anchor Cable	Replace 18 anchor cables.	OL	53	\$4,500,000	\$5,400,000	
101/269	FULTON CR	Concrete Submerged Column	Repair and encase section of concrete columns exposed to saltwater.	OL	54	\$320,000	\$600,000	
101/432E	KENNEDY CR	Concrete Submerged Column	Clean and encase concrete columns	OL	55	\$720,000	\$1,080,000	
101/432W	KENNEDY CR	Concrete Submerged Column	Clean and encase concrete columns	OL	56	\$720,000	\$1,080,000	
167/032E	VALLEY AVE & UPRR O'XING	Steel Sliding Plate Exp Joint	Replace Expansion joints @ piers 4 and 6.	OL	57	\$100,000	\$250,000	
167/040E	8TH ST E O'XING	Concrete Bridge Rail	Replace 56 feet of bridge rail.	OL	64	\$25,000	\$50,000	
410/031	WHITE R (STUCK R)	Exp Jnt - Rubber Bolt down	Replace rubber bolt down expansion joints.	OL	66	\$108,000	\$216,000	
012/012N	WISHKAH R CS1413	Concrete Girder	Rehabilitate deteriorated concrete elements.	OL	68		\$100,000	
107/004	CHEHALIS R	Timber Deck	Remove and replace the timber deck and bridge rails on the timber approach span.	OL	73	\$1,600,000	\$3,200,000	
101/115N-W	N-W RAMP	Bolt Down Panel - Molded Rubbe	Replace bolt down panels expansion joint system.	OL	84	\$40,000	\$120,000	
012/118	I-5 OC	Exp Jnt - Rubber Bolt Down	Replace the rubber bolt down expansion joints.	OL	89	\$120,500	\$361,500	
21 Repairs						Sum of Bridge \$'s =	\$9,639,500	\$17,812,032

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005/342E	MCALLISTER CR	Concrete Submerged Pile/Column	Repair the submerged concrete columns in pier 2.	OL	1	\$50,000	\$75,000	
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005/453	SR 167 E-N RAMP OC	Exp Jnt - Rubber Bolt Down	Replace the rubber bolt down expansion joints.	OL	47	\$75,000	\$442,500	
005/455	EAST T ST SEWER OC	Exp Joint - Rubber Bolt Down	Replace the rubber bolt down expansion joints.	OL	48	\$130,000	\$390,000	
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101/432W	KENNEDY CR	Concrete Submerged Column	Clean and encase concrete columns	OL	56	\$720,000	\$1,080,000	
101/508E	MUD BAY	Concrete Submerged Pile/Column	Repair salt water deteriorated columns in piers 4, 5 & 6.	OL	1	\$150,000	\$513,753	
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104/005.1	HOOD CANAL-WEST HALF	Floating Bridge - Anchor Cable	Replace 18 anchor cables.	OL	53	\$4,500,000	\$5,400,000	
107/004	CHEHALIS R	Timber Deck	Remove and replace the timber deck and bridge rails on the timber approach span.	OL	73	\$1,600,000	\$3,200,000	
167/032E	VALLEY AVE & UPRR O'XING	Steel Sliding Plate Exp Joint	Replace Expansion joints @ piers 4 and 6.	OL	57	\$100,000	\$250,000	
167/040E	8TH ST E O'XING	Concrete Bridge Rail	Replace 56 feet of bridge rail.	OL	64	\$25,000	\$50,000	
410/031	WHITE R (STUCK R)	Exp Jnt - Rubber Bolt down	Replace rubber bolt down expansion joints.	OL	66	\$108,000	\$216,000	
21 Repairs						Sum of Bridge \$'s =	\$9,639,500	\$17,812,032

Bridge Number: 5 / 342E	Structure ID 0008100E	Bridge Name: MCALLISTER CR	Milepost: 114.09	Region: Olympic
Year Built / YR Widened: 1968	Bridge Type: PCB	Bridge Length: 272 ft	Bridge Width (curb-curb): 48.0 ft	Sufficiency Rating: 70.78
Average Daily Traffic: 35,496	Truck% 12%	Detour (miles) 2	Num of Lanes: 3	
Date Inspected: 11/15/2005	Structr Adequacy: 5	Superstr Code: 7	Safe Load: 5	
Substr Code: 5	Scour: 5			
BMS Element Num: 227	BMS Element Descr: Concrete Submerged Pile/Column			
BMS Element Quantity: 1 Each				
Project Number: 300507K	2009-11 Priority#: 1			
Repair Year: 2008	2007-09 Priority#: 13			
CPMS Ad Date: 6/30/2008	Bridge \$'s: \$50,000			
	Repair Total\$'s: \$75,000			



**Repair Description:**

Repair the submerged concrete columns in pier 2.

**COMMENTS**

The steel reinforcing is corroding causing concrete spalling in the columns in Pier 2. The east column will be repaired with a carbon fiber wrap. A future Seismic Retrofit project will retrofit all the columns.

The repair project is scheduled for 2008.

Bridge Number: 5 / 342N-E	Structure ID 0008100G	Bridge Name: MCALLISTER CR	Milepost: 114.09	Region: Olympic
Year Built / YR Widened: 1968	Bridge Type: CS	Bridge Length: 216 ft	Bridge Width (curb-curb): 23.0 ft	Sufficiency Rating: 66.47 SD
Average Daily Traffic: 880	Truck% 2%	Detour (miles) 6	Num of Lanes: 1	
Date Inspected: 11/15/2005	Structr Adequacy: 4	Superstr Code: 6	Safe Load: 5	
Substr Code: 4	Scour: 8			
BMS Element Num: 227	BMS Element Descr: Concrete Submerged Pile/Column			
BMS Element Quantity: 4 Each				
Project Number: 300507K	2009-11 Priority#: 1			
Repair Year: 2008	2007-09 Priority#: 14			
CPMS Ad Date: 6/30/2008	Bridge \$'s: \$200,000			
	Repair Total\$'s: \$350,000			



**Repair Description:**

Repair deteriorated submerged columns in pier 3.

**COMMENTS**

The steel reinforcing is corroding causing the concrete column to crack. The repair will add new steel jackets to the existing columns in pier 3.

This repair work is scheduled for 2008.

Bridge Number: 5 / 345E	Structure ID 0002069A	Bridge Name: NISQUALLY RIVER	Milepost: 114.86	Region: Olympic
Year Built / YR Widened: 1937 / 1982	Bridge Type: ST PCB	Bridge Length: 447 ft	Bridge Width (curb-curb): 42.6 ft	Sufficiency Rating: 40.22 SD
Average Daily Traffic: 41,057	Truck% 12%	Detour (miles) 6	Num of Lanes: 3	
Date Inspected: 4/21/2007	Superstr Code: 4	Substr Code: 7	Structr Adequacy: 4	Safe Load: 5
BMS Element Num: <b>113</b>		BMS Element Descr: <b>Steel Stringer</b>		
BMS Element Quantity: 2,580 feet				
Project Number: 300522B	2009-11 Priority#: 1	Repair Year: 2009	2007-09 Priority#: 9	Bridge \$'s:
CPMS Ad Date: 2/11/2009	Repair Total\$'s: \$1,798,526			



**Repair Description:**

Modify steel stringer connections to mitigate the cracking problem in the webs along the top flange.

**COMMENTS**

There are eight lines of stringers (A-H). There is a 90° cope detail at both the top and bottom of all stringer webs at the floorbeam connections. Several of the stringers have a history of cracks or overcut notches in the copes as noted in the Bridge Inspection Report File #6 "Stringer cope crack / repair tracker " and File #8 "Cope Crack Map".

A contract in 2009 will repair the cracked stringers and seal the deck joints above the Floorbeams.

Bridge Number: 101 / 508E	Structure ID 0005677A	Bridge Name: MUD BAY	Milepost: 362.83	Region: Olympic
Year Built / YR Widened: 1958	Bridge Type: CS (Hollow)	Bridge Length: 290 ft	Bridge Width (curb-curb): 28.0 ft	Sufficiency Rating: 53.19 SD
Average Daily Traffic: 13,448	Truck% 8%	Detour (miles) 2	Num of Lanes: 2	
Date Inspected: 7/24/2006	Structr Adequacy: 4	Superstr Code: 6	Safe Load: 5	
Substr Code: 4	Scour: 8			
BMS Element Num: 227	BMS Element Descr: Concrete Submerged Pile/Column			
BMS Element Quantity: 33 Each				
Project Number: 310150C	2009-11 Priority#: 1	2007-09 Priority#: 8	Bridge \$'s: \$150,000	
Repair Year: 2008	CPMS Ad Date: 1/9/2008	Repair Total\$'s: \$513,753		



**Repair Description:**

Repair salt water deteriorated columns in piers 4, 5 & 6.

**COMMENTS**

Each pile/column is approximately 16" in diameter and 3 feet on center. There are 11 piles per pier, 33 total that need to be repaired. The repair will consist of cleaning the column and then adding a new fiberglass concrete jacket around each column.

The contract is being advertised in January 2008 with construction planned for the summer of 2008.

Bridge Number: 101 / 508W	Structure ID 0005677B	Bridge Name: MUD BAY	Milepost: 362.83	Region: Olympic
Year Built / YR Widened: 1958	Bridge Type: CS (Hollow)	Bridge Length: 290 ft	Bridge Width (curb-curb): 28.0 ft	Sufficiency Rating: 53.19 SD
Average Daily Traffic: 13,448	Truck% 8%	Detour (miles) 2	Num of Lanes: 2	
Date Inspected: 8/22/2006	Superstr Code: 6	Substr Code: 4	Structr Adequacy: 4	Safe Load: 5
BMS Element Num: 227		BMS Element Descr: Concrete Submerged Pile/Column		
BMS Element Quantity: 33 Each				
Project Number: 310150C	2009-11 Priority#: 1	2007-09 Priority#: 7	Bridge \$'s: \$150,000	
Repair Year: 2008	Repair Total\$'s: \$513,753		CPMS Ad Date: 1/9/2008	



**Repair Description:**

Repair salt water deteriorated columns in piers 4, 5 & 6.

**COMMENTS**

Each pile/column is approximately 16" in diameter and 3 feet on center. There are 11 piles per pier, 33 total that need to be repaired. The repair will consist of cleaning the column and then adding a new fiberglass concrete jacket around each column.

The contract is being advertised in January 2008 with construction planned for the summer of 2008.

Bridge Number: 5 / 321	Structure ID 0005090A	Bridge Name: CAPITOL LAKE	Milepost: 104.52	Region: Olympic
Year Built / YR Widened: 1956 / 1986	Bridge Type: CBox	Bridge Length: 392 ft	Bridge Width (curb-curb): 171.8 ft	Sufficiency Rating: 85.00
Average Daily Traffic: 45,733	Truck% 12%	Detour (miles) 13	Num of Lanes: 11	
Date Inspected: 11/3/2005	Structr Adequacy: 7	Superstr Code: 7	Safe Load: 5	
Substr Code: 7	Scour: 5			
BMS Element Num: 412	BMS Element Descr: <b>Strip Seal Expansion Joint</b>			
BMS Element Quantity: 176				
Project Number:	2009-11 Priority#:	5		
Repair Year:	2007-09 Priority#:			
CPMS Ad Date:	Bridge \$'s:	\$300,000		
	Repair Total\$'s:	\$528,000		
				
<p><b>Repair Description:</b> Replace strip seal expansion joint.</p>				
<p><b>COMMENTS</b></p>				
<p>This expansion joint was installed in 1986 under contract 2620. Region Maintenance crews have done several emergency repairs. The existing joint allows water through which has eroded the fill around the supporting pier.</p> <p>Bridge Item cost based on \$1,000 / ft. Total project cost based on \$3,000 / ft.</p>				

Bridge Number: 5 / 342W-S		Structure ID 0008100H		Bridge Name: MCALLISTER CR		Milepost: 114.09		Region: Olympic				
Year Built / YR Widened: 1968		Bridge Type: CS		Bridge Length: 168 ft		Bridge Width (curb-curb): 23.0 ft		Sufficiency Rating: 84.57				
Average Daily Traffic: 830		Truck% 2%	Detour (miles) 6		Num of Lanes: 1							
Date Inspected: 7/27/2006		Structr Adequacy: 5		Superstr Code: 7		Safe Load: 5						
Substr Code: 5		Scour: 8		BMS Element Num: 227		BMS Element Descr: Concrete Submerged Pile/Column						
BMS Element Quantity:		Project Number:		2009-11 Priority#: 32		Repair Year:				2007-09 Priority#:		
CPMS Ad Date:		Bridge \$'s: \$200,000		Repair Total\$'s: \$350,000								
<p><b>Repair Description:</b> Repair salt water deteriorated columns @ piers 2 &amp; 4.</p>												
<p><b>COMMENTS</b></p> <p>The columns are showing signs of corrosion in the reinforcing steel. Repair with fiberglass jackets.</p>												

Bridge Number: 5 / 452W		Structure ID 0006792B		Bridge Name: PORTLAND AVE OC		Milepost: 134.87		Region: Olympic	
Year Built / YR Widened: 1962 / 1990		Bridge Type: PCB		Bridge Length: 216 ft		Bridge Width (curb-curb): 72.0 ft		Sufficiency Rating: 85.19	
Average Daily Traffic: 85,811		Truck% 8%		Detour (miles) 2		Num of Lanes: 5			
Date Inspected: 12/11/2006		Structr Adequacy: 7		Superstr Code: 7		Safe Load: 5			
Substr Code: 7		Scour: N							
BMS Element Num: 415		BMS Element Descr: Exp Jnt - Rubber Bolt Down				BMS Element Quantity: 262 Feet			
Project Number:		2009-11 Priority#:		46					
Repair Year:		2007-09 Priority#:		32					
CPMS Ad Date:		Bridge \$'s:		\$131,000					
		Repair Total\$'s:		\$393,000					
									
<p><b>Repair Description:</b> Replace the rubber bolt down expansion joints.</p>									
<p><b>COMMENTS</b></p>									
<p>The rubber bolt down expansion joints were installed in 1984 along with the modified concrete overlay. These joints have been repaired many times by Region Maintenance.</p>									
<p>Bridge Item cost based on \$500 / ft. Total project cost based on \$1,500 / ft.</p>									

Bridge Number: 5 / 453	Structure ID 0006821A	Bridge Name: SR 167 E-N RAMP OC	Milepost: 135.17	Region: Olympic		
Year Built / YR Widened: 1962 / 1970	Bridge Type: PCB	Bridge Length: 121 ft	Bridge Width (curb-curb): 143.3 ft	Sufficiency Rating: 85.00		
Average Daily Traffic: 148,843	Truck% 8%	Detour (miles) 2	Num of Lanes: 9	<b>No Photo Available</b>		
Date Inspected: 11/8/2006	Superstr Code: 7	Substr Code: 7	Structr Adequacy: 7		Safe Load: 5	Scour: N
BMS Element Num: 415	BMS Element Descr: <b>Exp Jnt - Rubber Bolt Down</b>					
BMS Element Quantity: 295 Feet						
Project Number: Repair Year: CPMS Ad Date:	2009-11 Priority#: 2007-09 Priority#: Bridge \$'s: Repair Total\$'s:	47 31 \$75,000 \$442,500				



**Repair Description:**

Replace the rubber bolt down expansion joints.

**COMMENTS**

The rubber bolt down expansion joints in the SB lanes (west side of bridge) were installed in 1984 along with the modified concrete overlay. These joints have been repaired many times by Region Maintenance.

Bridge Item cost based on \$500 / ft. Total project cost based on \$1,500 / ft.

Bridge Number: 5 / 455	Structure ID 0006979B	Bridge Name: EAST T ST SEWER OC	Milepost: 135.17	Region: Olympic		
Year Built / YR Widened: 1963 / 1970	Bridge Type: PCB	Bridge Length: 150 ft	Bridge Width (curb-curb): 120.0 ft	Sufficiency Rating: 84.00		
Average Daily Traffic: 148,843	Truck% 8%	Detour (miles) 2	Num of Lanes: 7	<b>No Photo Available</b>		
Date Inspected: 11/8/2006	Superstr Code: 7	Substr Code: 7	Structr Adequacy: 7		Safe Load: 5	Scour: N
BMS Element Num: 415	BMS Element Descr: <b>Exp Joint - Rubber Bolt Down</b>					
BMS Element Quantity: 260 Feet						
Project Number: Repair Year: CPMS Ad Date:	2009-11 Priority#: 2007-09 Priority#: Bridge \$'s: Repair Total\$'s:	48 33 \$130,000 \$390,000				



**Repair Description:**

Replace the rubber bolt down expansion joints.

**COMMENTS**

The rubber bolt down expansion joints in the SB lanes (west side of bridge) were installed in 1984 along with the modified concrete overlay. These joints have been repaired many times by Region Maintenance.

Bridge Item cost based on \$500 / ft. Total project cost based on \$1,500 / ft.

# Bridge Preservation Program (P2)

# Bridge Repair Form

Bridge Number: 104 / 5.1		Structure ID 0011964A		Bridge Name: HOOD CANAL-WEST HALF		Milepost: 13.93		Region: Olympic					
Year Built / YR Widened: 1982		Bridge Type: CFP PCG STRus		Bridge Length: 4,245 ft		Bridge Width (curb-curb): 28.0 ft		Sufficiency Rating: 47.98					
Average Daily Traffic: Truck% 13,327		Detour (miles)		Num of Lanes: 2									
Date Inspected:		Structr Adequacy:		Superstr Code:						Safe Load:		Substr Code:	
BMS Element Num: <b>148</b>		BMS Element Descr: <b>Floating Bridge - Anchor Cable</b>		BMS Element Quantity: <b>18 Each</b>						Project Number: 2009-11 Priority#: <b>53</b>		Repair Year: 2007-09 Priority#:	
CPMS Ad Date:		Bridge \$'s: \$4,500,000		Repair Total\$'s: \$5,400,000									
						No Photo Available							
<b>Repair Description:</b> Replace 18 anchor cables.													
<b>COMMENTS</b>													
The bridge has 24 anchor cables that are 3 inches in diameter, of which 18 are 25 years old. These 18 should be programmed for replacement before they reach 30 years old.													



Bridge Number: 101 / 269	Structure ID 0000987A	Bridge Name: FULTON CR	Milepost: 313.55	Region: Olympic
Year Built / YR Widened: 1926	Bridge Type: CTB	Bridge Length: 127 ft	Bridge Width (curb-curb): 24.0 ft	Sufficiency Rating: 46.21 FO
Average Daily Traffic: 2,063	Truck% 17%	Detour (miles) 26	Num of Lanes: 2	
Date Inspected: 7/12/2006	Structr Adequacy: 5	Superstr Code: 7	Safe Load: 5	
Substr Code: 5	Scour: 3			
BMS Element Num: <b>227</b>	BMS Element Descr: <b>Concrete Submerged Column</b>			
BMS Element Quantity: 8				
Project Number:	2009-11 Priority#: 54			
Repair Year:	2007-09 Priority#:			
CPMS Ad Date:	Bridge \$'s: \$320,000			
	Repair Total\$'s: \$600,000			
				
<p><b>Repair Description:</b> Repair and encase section of concrete columns exposed to saltwater.</p>				
<p><b>COMMENTS</b></p>				

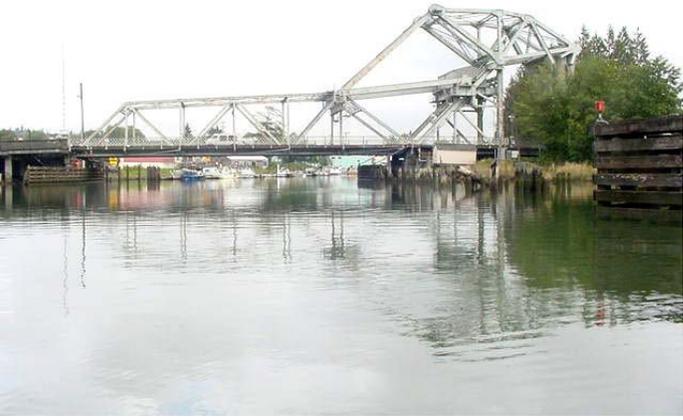
Bridge Number: 101 / 432E		Structure ID 0006383B		Bridge Name: KENNEDY CR		Milepost: 356.17		Region: Olympic		
Year Built / YR Widened: 1960		Bridge Type: CVS		Bridge Length: 129 ft		Bridge Width (curb-curb): 28.0 ft		Sufficiency Rating: 66.79 FO		
Average Daily Traffic: 8,357		Truck% 7%	Detour (miles) 2		Num of Lanes: 2					
Date Inspected: 7/25/2006		Structr Adequacy: 5		Superstr Code: 6		Safe Load: 5				
Substr Code: 5		Scour: 3		BMS Element Num: 227		BMS Element Descr: Concrete Submerged Column				
BMS Element Quantity: 18		Project Number:		2009-11 Priority#: 55		Repair Year:				
CPMS Ad Date:		2007-09 Priority#:		Bridge \$'s: \$720,000		Repair Total\$'s: \$1,080,000				
			<h2>No Photo Available</h2>							
<p><b>Repair Description:</b> Clean and encase concrete columns</p>										
<p><b>COMMENTS</b></p>										
<p>Need to get current pictures of the columns.</p>										

Bridge Number: 101 / 432W		Structure ID 0006383A		Bridge Name: KENNEDY CR		Milepost: 356.17		Region: Olympic	
Year Built / YR Widened: 1960		Bridge Type: CVS		Bridge Length: 129 ft		Bridge Width (curb-curb): 28.0 ft		Sufficiency Rating: 57.77 FO	
Average Daily Traffic: 8,357		Truck% 7%		Detour (miles) 2		Num of Lanes: 2			
Date Inspected: 7/24/2006		Structr Adequacy: 5		Superstr Code: 7		Safe Load: 5			
Substr Code: 5		Scour: 3		BMS Element Num: 227		BMS Element Descr: Concrete Submerged Column			
BMS Element Quantity: 18		Project Number:		2009-11 Priority#: 56		Repair Year:			
CPMS Ad Date:		2007-09 Priority#:		Bridge \$'s: \$720,000		Repair Total\$'s: \$1,080,000		<p style="text-align: center; font-size: 2em; font-weight: bold; transform: rotate(-10deg);">No Photo Available</p>	
<p style="text-align: center; font-size: 2em; font-weight: bold; transform: rotate(-10deg);">No Photo Available</p>		<p style="text-align: center; font-size: 2em; font-weight: bold; transform: rotate(-10deg);">No Photo Available</p>							
				<p><b>Repair Description:</b> Clean and encase concrete columns</p>					
<p><b>COMMENTS</b></p> <p>Need to get current pictures of the columns.</p>									

Bridge Number: 167 / 32E	Structure ID 0009075D	Bridge Name: VALLEY AVE & UPRR O'XING	Milepost: 7.22	Region: Olympic
Year Built / YR Widened: 1973	Bridge Type: PCG	Bridge Length: 925 ft	Bridge Width (curb-curb): 50.5 ft	Sufficiency Rating: 94.49
Average Daily Traffic: 26,125	Truck% 8%	Detour (miles) 2	Num of Lanes: 2	
Date Inspected: 12/12/2006	Structr Adequacy: 7	Superstr Code: 7	Safe Load: 5	
Substr Code: 7	Scour: N			
BMS Element Num: 408	BMS Element Descr: Steel Sliding Plate Exp Joint			
BMS Element Quantity: 100				
Project Number:	2009-11 Priority#:	57		
Repair Year:	2007-09 Priority#:			
CPMS Ad Date:	Bridge \$'s:	\$100,000		
	Repair Total\$'s:	\$250,000		
				
<p><b>No Photo Available</b></p>				
<p><b>Repair Description:</b> Replace Expansion joints @ piers 4 and 6.</p>				
<p><b>COMMENTS</b></p>				
<p>Bridge Item cost based on \$1,000 / ft. Total project cost based on \$2,500 / ft.</p>				

Bridge Number: 167 / 40E		Structure ID 0010558A		Bridge Name: 8TH ST E O'XING		Milepost: 10.62		Region: Olympic				
Year Built / YR Widened: 1977		Bridge Type: PCG		Bridge Length: 185 ft		Bridge Width (curb-curb): 38.0 ft		Sufficiency Rating: 91.36				
Average Daily Traffic: 26,125		Truck% 8%	Detour (miles) 2		Num of Lanes: 2							
Date Inspected: 12/5/2005		Structr Adequacy: 7		Superstr Code: 7		Safe Load: 5						
Substr Code: 7		Scour: N		BMS Element Num: 331		BMS Element Descr: Concrete Bridge Rail						
BMS Element Quantity: 56		Project Number:		2009-11 Priority#: 64		Repair Year:				2007-09 Priority#:		
CPMS Ad Date:		Bridge \$'s: \$25,000		Repair Total\$'s: \$50,000								
												
<p><b>Repair Description:</b> Replace 56 feet of bridge rail.</p>												
<p><b>COMMENTS</b></p>												
<p>Southeast six sections of bridge rail has severe exfoliation of top 1 foot, and requires repair/replacement. Also, Northwest end section has severe exfoliation of top 1 foot, and requires repair/replacement. -- (Revised the priority to 2 from 4 per GCS. RLS 12/19/05).</p>												

Bridge Number: 410 / 31	Structure ID 0008746A	Bridge Name: WHITE R (STUCK R)	Milepost: 8.99	Region: Olympic
Year Built / YR Widened: 1971	Bridge Type: PCG CBox	Bridge Length: 442 ft	Bridge Width (curb-curb): 102.0 ft	Sufficiency Rating: 86.46
Average Daily Traffic: 44,586	Truck% 7%	Detour (miles) 6	Num of Lanes: 6	
Date Inspected: 8/31/2005	Structr Adequacy: 6	Superstr Code: 6	Safe Load: 5	
Substr Code: 7	Scour: 8			
BMS Element Num: 415	BMS Element Descr: <b>Exp Jnt - Rubber Bolt down</b>			
BMS Element Quantity: 216				
Project Number:	2009-11 Priority#:	66		
Repair Year:	2007-09 Priority#:			
CPMS Ad Date:	Bridge \$'s:	\$108,000		
	Repair Total\$'s:	\$216,000		
				
<p><b>Repair Description:</b> Replace rubber bolt down expansion joints.</p>				
<p><b>COMMENTS</b></p>				
<p>Bridge Item cost based on \$500 / ft. Total project cost based on \$1,000 / ft.</p>				

Bridge Number: 12 / 12N	Structure ID 0002311A	Bridge Name: WISHKAH R	CS1413	Milepost: 0.08	Region: Olympic
Year Built / YR Widened: 1925 / 2003	Bridge Type: BAS ST CTB CS		Bridge Length: 363 ft	Bridge Width (curb-curb): 27.0 ft	Sufficiency Rating: 42.98
Average Daily Traffic: 7,500	Truck% 12%	Detour (miles) 2	Num of Lanes: 2		
Date Inspected: 6/6/2005	Structr Adequacy: 4				
Superstr Code: 5	Safe Load: 5				
Substr Code: 5	Scour: 3				
BMS Element Num: <b>110</b> BMS Element Descr: <b>Concrete Girder</b> BMS Element Quantity: 0					
Project Number:	2009-11 Priority#:	68			
Repair Year:	2007-09 Priority#:				
CPMS Ad Date:	Bridge \$'s:				
	Repair Total\$'s:	\$100,000			
					
<b>Repair Description:</b> Rehabilitate deteriorated concrete elements.					
<b>COMMENTS</b>					

Bridge Number: 107 / 4	Structure ID 0005827A	Bridge Name: CHEHALIS R	Milepost: 6.83	Region: Olympic
Year Built / YR Widened: 1958	Bridge Type: ST CBOX TTT	Bridge Length: 1,302 ft	Bridge Width (curb-curb): 26.0 ft	Sufficiency Rating: 40.45 SD
Average Daily Traffic: 4,392	Truck% 16%	Detour (miles) 40	Num of Lanes: 2	
Date Inspected: 3/19/2007	Structr Adequacy: 5	Superstr Code: 6	Safe Load: 5	
Substr Code: 5	Scour: 3			
BMS Element Num: 31	BMS Element Descr: Timber Deck	BMS Element Quantity: 20,226 SF		
Project Number:	2009-11 Priority#:	73		
Repair Year:	2007-09 Priority#:	47		
CPMS Ad Date:	Bridge \$'s:	\$1,600,000		
	Repair Total\$'s:	\$3,200,000		



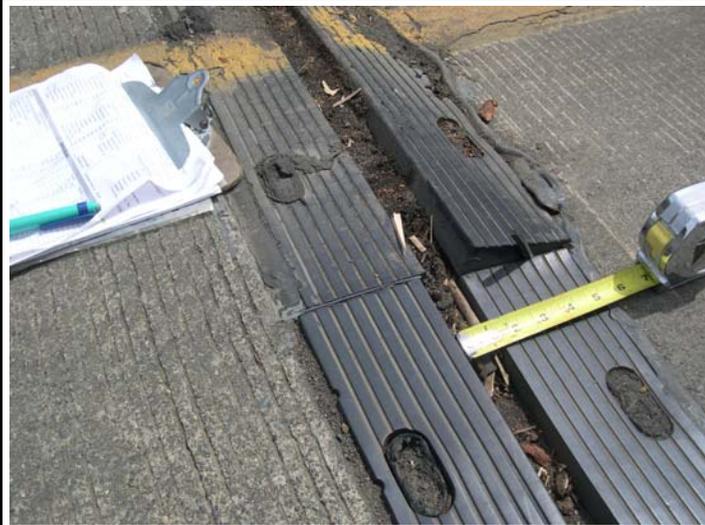
**Repair Description:**

Remove and replace the timber deck and bridge rails on the timber approach span.

**COMMENTS**

The timber deck has many areas that are deteriorated as evident by the failure in the ACP overlay. The Olympic Region Maintenance office indicates that they have repaired the timber deck in many areas. The 8/12/2003 Bridge Inspection Report indicates: There are 5 areas breaking up or potholed. Four patched areas have replaced 4 deck planks with one 12" x 4" timber. Most spans between the timber piers have cracks in the ACP.

Bridge Number: 101 / 115N-W	Structure ID 0012643A	Bridge Name: N-W RAMP	Milepost: 83.12	Region: Olympic
Year Built / YR Widened: 1985	Bridge Type: SG	Bridge Length: 1,456 ft	Bridge Width (curb-curb): 20.0 ft	Sufficiency Rating: 96.26
Average Daily Traffic: 4,623	Truck% 0%	Detour (miles) 0	Num of Lanes: 1	
Date Inspected: 6/7/2005	Structr Adequacy: 6	Superstr Code: 7	Safe Load: 5	
Substr Code: 6	Scour: N			
BMS Element Num: 415	BMS Element Descr: Bolt Down Panel - Molded Rubbe			
BMS Element Quantity: 80 LF				
Project Number:	2009-11 Priority#:	84		
Repair Year:	2007-09 Priority#:			
CPMS Ad Date:	Bridge \$'s:	\$40,000		
	Repair Total\$'s:	\$120,000		



**No Photo Available**

**Repair Description:**

Replace bolt down panels expansion joint system.

**COMMENTS**

The rubber bolt down expansion joints are deteriorated. The new Expansion Joint will be RCS with Polyester Concrete headers.

Bridge Item cost based on \$500 / ft. Total project cost based on \$1,500 / ft.

Bridge Number: 12 / 118	Structure ID 0007026B	Bridge Name: I-5 OC	Milepost: 46.57	Region: Olympic
Year Built / YR Widened: 1962 / 1987	Bridge Type: PCB	Bridge Length: 255 ft	Bridge Width (curb-curb): 45.0 ft	Sufficiency Rating: 69.13
Average Daily Traffic: 12,972	Truck% 13%	Detour (miles) 13	Num of Lanes: 3	
Date Inspected: 5/22/2006	Structr Adequacy: 6	Superstr Code: 6	Safe Load: 5	
Substr Code: 7	Scour: N			
BMS Element Num: 415	BMS Element Descr: Exp Jnt - Rubber Bolt Down			
BMS Element Quantity: 241 Feet				
Project Number:	2009-11 Priority#:	89		
Repair Year:	2007-09 Priority#:	46		
CPMS Ad Date:	Bridge \$'s:	\$120,500		
	Repair Total\$'s:	\$361,500		



**Repair Description:**

Replace the rubber bolt down expansion joints.

**COMMENTS**

The rubber bolt down expansion joints are deteriorated. Maintenance has removed and replaced sections of the expansion joint.

Bridge Item cost based on \$500 / ft. Total project cost based on \$1,500 / ft.