

Inspection sheet of visual survey

Bridge No. 11

Photo No. (~)


Bridge name		RAMA VIII Bridge		Route name		-		Authority		BMA		Code of authority		-		
Place		from Khat Bang Phlat to Khet Phra Nakhon		Distance		from km+ 0 to km+ 0						No.		-		
												Survey date		23-Oct-2009		
Bridge properties	Bridge type(1)	main road · side road · ramp														
	Bridge type(2)	bridge · viaduct · plank pass														
	Bridge type(3)	4-span composite 2 l girder cable stayed bridge														
	Total length	475.00 (m)														
	Span	75 + 50 + 50 + 300 (m)														
	Nos. of span	4 span														
	Width	29.20 (m) / (m)														
	Completion	2002														
Road information	Horizontal	Straight · incli (θ = 2 %) · Curve (R m)														
	Gradient	One way (↗ · ↘) parabo (▽ · ▹)														
	Nearby tunnel	yes · no (m)														
	Nearby crossing	yes · no (ramp way)														
	Traffic	Much · Medium · Little														
	Commercial traffic	Much · Medium · Little														
Environ	1. Urban				2. Suburbs				3. Mountain				4. Seaside			
	5. Industrial				6. Harbor				7. Residential				8. Business			
	9. Salty				10. Cold and snow				11. Heavy snow				12. Others			
Under brid	1. Shinkanser				2. Railway				3. Highway				4. Road			
	5. River				6. Lake				7. Ravine				8. Valley			
	9. Waterway				10. Parking				11. Bike parkin				12. Park			
	13. Vacant				14. Harbor				Name (Chao Phraya)							
Access method	Superstructure	1. Inspection car 2. Falsework 3. On ground 4. Ladder 5. Lift car 6. On boat 7. Special camera 8. Others (Inspection vehicle)														
	Substructure	1. Inspection car 2. Falsework 3. On ground 4. Ladder 5. Lift car 6. On boat 7. Special camera 8. Others (Inspection vehicle)														
	Reason	· Center span section is on the water · If inspection car is not available, false work will be required														
Survey result	Joint	Camber deform	yes · no													
		Difference in glade	yes · no													
		Continuous of barrier	yes · no													
		Continuous of curve	yes · no													
		Noise	yes · no													
	Out line of damage	Space change	yes · no													
		difference grade	yes · no													
		draining damage	yes · no													
		Blocked drainage	yes · no													
		Crack of pavement	yes · no													
Inspection way	Damage of lighting	yes · no														
	Damage of sign	-														
	Damage of handrail	yes · no														
	Possibility of scour	yes · no														
	Walkway	yes · no														
Diagnosis is	Vehicle	yes · no														
	Height of girde	about 10m														
	◆ Deterioration of bridge ◆ deficient · fair · good															
	◆ Noticeable point ◆ · Leakage form cable															
Impressions	Item	Type	State													
	Main girder	Composite l girder	-													
	Cross beam	l section steel	-													
	Stringer	-	-													
History of repair	Cross frame	-	-													
	Lateral brace	-	-													
	Slab	-	(cannot see from outside due to decorative plate)													
	Abutment	-	-													
	Pier	Rectangular	Free lime at cross beam													
	Bearing	Slide bearing	-													
	Barrier	Steel	Generally healthy													
	Railing	Steel	Generally healthy													
	Curb	-	-													
	Pavement	asphalt · concrete	Pot hole													
Surveyor ;	Joint	drained · undrained														
	Drainage	yes · no														
History of repair		Repaint ; - yy - mm														
Surveyor ;		Mr. Chujo, Mr. Kudo														

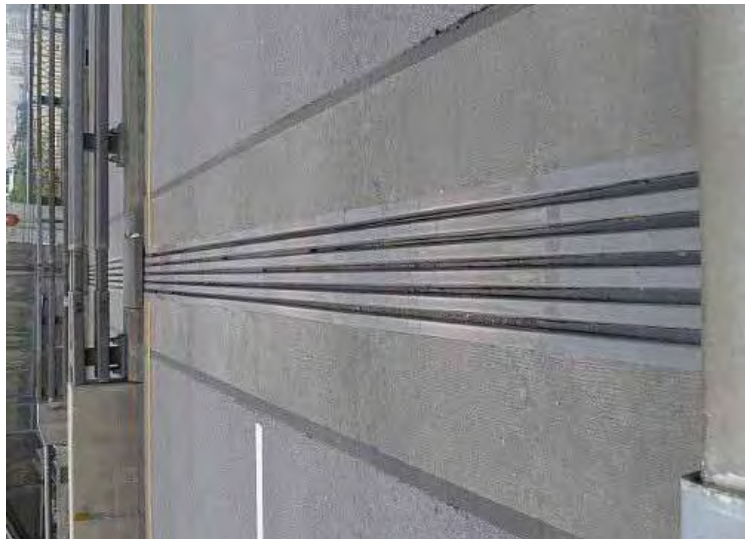
Present state (1 / 8)


Authority	BMA	Address	Bangkok	Data	23-Oct-09
Bridge	RAMA VIII				

[illegible][illegible][illegible]


Present state (2 / 8)					
Authority	BMA	Address	Bangkok	Data	23-Oct-09
Bridge	RAMA VIII				

	Picture No.	4
	Span	1
	Member	Pylon
	<i>*Survey on board, 31-oct</i>	


	Picture No.	5
	Span	1
	Member	Expansion joint
	Modular type	

	Picture No.	6
	Span	1
	Member	Expansion joint
	Lack of bolt	
	Soil dump	


Present state (3 / 8)					
Authority	BMA	Address	Bangkok	Data	23-Oct-09
Bridge	RAMA VIII				



Picture No.	7
Span	1
Member	View of cable
Helical type wind resistance	




Picture No.	8
Span	1
Member	Cable
Leakage from cable	




Picture No.	9
Span	1
Member	Cable
Leakage from cable	
Opening under side of cable cover for drainage	


Present state (4 / 8)					
Authority	BMA	Address	Bangkok	Data	23-Oct-09
Bridge	RAMA VIII				



Picture No.	10
Span	1
Member	Cable fixing structure
Gap and calking between cable and slab. And mounted up around cable to prevent remaining water.	



Picture No.	11
Span	1
Member	Cable fixing structure
slab. And mounted up around cable to prevent remaining water.	



Picture No.	12
Span	1
Member	Cable fixing structure
Calking and name plate of cable	
well maintained but aging	

Present state (5 / 8)

Authority	BMA	Address	Bangkok	Data	23-Oct-09
Bridge	RAMA VIII				



Picture No.	7
Span	1
Member	Side span and approach

side span is 3+2 lane for ramp wa



Picture No.	8
Span	1
Member	Anchorage




Picture No.	9
Span	1
Member	Newel


Present state (6 / 8)


Authority	BMA	Address	Bangkok	Data	23-Oct-09
Bridge	RAMA VIII				

[illegible][illegible][illegible]


Present state (7 / 8)					
Authority	BMA	Address	Bangkok	Data	23-Oct-09
Bridge	RAMA VIII				


	Picture No.	7
	Span	1
	Member	Barrier
	Lack of bolt cap	

	Picture No.	8
	Span	1
	Member	Hand rail of walkway

	Picture No.	9
	Span	1
	Member	Cable fixing of pylon

Present state (8 / 8)					
Authority	BMA	Address	Bangkok	Data	23-Oct-09
Bridge	RAMA VIII				

	Picture No.	10
	Span	1
	Member	Decorative plate
	leakage line	

	Picture No.	11
	Span	1
	Member	Bearing

	Picture No.	12
	Span	1
	Member	

Inspection sheet of visual survey

Bridge No. 12

Photo No. (~)


Bridge name		Pinklao Bridge		Route name		-		Authority		DRR		Code of authority		-		
Place		from Khat Bangkok Noi to Khet Phra Nakhon		Distance		from km+ 0 to km+ 0						No.		-		
												Survey date		2009/10/23		
Bridge properties	Bridge type(1)	main road · side road · ramp														
	Bridge type(2)	bridge · viaduct · plank pass														
	Bridge type(3)	3-span continuous PC box girder														
	Total length	276.00 (m)														
	Span	83 + 110 + 83 (m)														
	Nos. of span	4 span														
	Width	32.21 (m) / (m)														
	Completion	1973														
Road information	Horizontal	Straight · incli ($\theta =$ °) · Curve (R m)														
	Gradient	One way (↗ · ↘) parabo ($\frac{1}{4}$ · $\frac{3}{4}$)														
	Nearby tunnel	yes · no (m)														
	Nearby crossing	yes · no (m)														
	Traffic	Much · Medium · Little														
	Commercial traffic	Much · Medium · Little														
Environ	1. Urban	2. Suburbs	3. Mountain	4. Seaside												
	5. Industrial	6. Harbor	7. Residential	8. Business												
	9. Salty	10. Cold and snow	11. Heavy snow	12. Others												
Under brid	1. Shinkanser	2. Railway	3. Highway	4. Road												
	5. River	6. Lake	7. Ravine	8. Valley												
	9. Waterway	10. Parking	11. Bike parkin	12. Park												
	13. Vacant	14. Harbor	Name (Chao Phraya)													
Access method	Superstructure	1. Inspection car 2. Falsework 3. On ground 4. Ladder 5. Lift car 6. On boat 7. Special camera 8. Others ()														
	Substructure	1. Inspection car 2. Falsework 3. On ground 4. Ladder 5. Lift car 6. On boat 7. Special camera 8. Others ()														
	Reason	· All bridge section is on the water · If inspection car is not available, false work will be required														
Survey result	Joint	Camber deform	yes · no													
		Difference in glade	yes · no													
		Continuous of barrier	yes · no													
		Continuous of curve	yes · no													
	Out line of damage	Noise	yes · no													
		Space change	yes · no													
		difference grade	yes · no													
		draining damage	yes · no													
Inspection way	Blocked drainage	yes · no														
	Crack of pavement	yes · no														
	Damage of lighting	yes · no														
	Damage of sign	-														
Diagnosis is	Damage of handrail	yes · no														
	Possibility of scour	yes · no														
	Walkway yes · no															
	Vehicle yes · no															
Impressions	Height of girde	about 11.5m														
	· Sever leakage from expansion joint · Water flow in box girder may cause defect in box. · Crack of pier of approach bridge															
History of repair		Repaint ; - yy - mm														
Surveyor ;		Mr. Chujo, Mr. Kudo														

Present state (1 / 7)


Authority	DRR	Address	Bangkok	Data	23-Oct-09
Bridge	Phra Pin Klao Bridge				

	Picture No.	1
	Span	1
	Member	Side view
	Picture No.	2
	Span	1
	Member	View on road
	Picture No.	3
	Span	1
	Member	View under girder


Present state (2 / 7)					
Authority	DRR	Address	Bangkok	Data	23-Oct-09
Bridge	Phra Pin Klao Bridge				



Picture No.	4
Span	1
Member	Hinge



Picture No.	5
Span	1
Member	Expansion joint
Corrosion at end	



Picture No.	6
Span	1
Member	Expansion joint
Corrosion	

Present state (3 / 7)

Authority	DRR	Address	Bangkok	Data	23-Oct-09
Bridge	Phra Pin Klao Bridge				



Picture No.	7
Span	1
Member	Expansion joint
Center hinge part	



Picture No.	8
Span	1
Member	Expansion joint
Deterioration of drain function	
Bangkok side	
No door in manhole	



Picture No.	9
Span	1
Member	bottom slab
Deterioration of drain function	
Thon Buri side	

Present state (4 / 7)

Authority	DRR	Address	Bangkok	Data	23-Oct-09
Bridge	Phra Pin Klao Bridge				



Picture No.	10
Span	1
Member	Approach bridge
Crack	




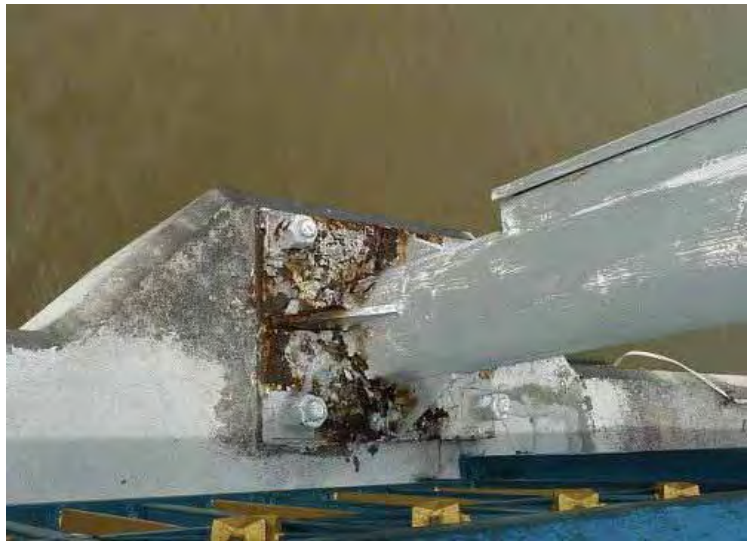
Picture No.	11
Span	1
Member	Man hole
Leakage from manhole	
Leakage from water supply?	




Picture No.	12
Span	1
Member	Pylon
Mark of leakage from joint of barrier	

Present state (5 / 7)					
Authority	DRR	Address	Bangkok	Data	23-Oct-09
Bridge	Phra Pin Klao Bridge				

	Picture No.	13
	Span	1
	Member	Drainage
	Blocking	

	Picture No.	14
	Span	1
	Member	Lighting pole
	Deterioration of corrosion proofi	

	Picture No.	15
	Span	1
	Member	Walkway
	Graffiti	
	Fracture of decorative plate	

Present state (6 / 7)

Authority	DRR	Address	Bangkok	Data	23-Oct-09
Bridge	Phra Pin Klao Bridge				



Picture No.	16
Span	1
Member	Slab
Free lime from construction joint	
<i>*Survey on board, 31-oct</i>	




Picture No.	17
Span	1
Member	Hinge
Leakage	
<i>*Survey on board, 31-oct</i>	



Picture No.	18
Span	1
Member	Slab
Nest harm	
<i>*Survey on board, 31-oct</i>	

Present state (7 / 7)

Authority	DRR	Address	Bangkok	Data	23-Oct-09
Bridge	Phra Pin Klao Bridge				

	Picture No.	19
	Span	1
	Member	Substructure
	<i>*Survey on board, 31-oct</i>	
	Picture No.	20
	Span	1
	Member	
	Picture No.	21
	Span	1
	Member	


Inspection sheet of visual survey


Bridge No. 13


Photo No. (~)

Bridge name		Memorial Bridge		Route name		-		Authority		DRR		Code of authority		-	
Place		from Khat Thon Buri to Khet Phra Nakhon		Distance		from km+ 0 to km+ 0						No.		-	
												Survey date		2009/10/23	
Bridge properties	Bridge type(1)	main road · side road · ramp													
	Bridge type(2)	bridge · viaduct · plank pass													
	Bridge type(3)	3-span steel truss													
	Total length	234.00 (m)													
	Span	78 + 78 + 78 (m)													
	Nos. of span	3 span													
	Width	10.00 (m) / (m)													
	Completion	1932													
Road information	Horizontal	Straight · incli ($\theta =$ °) · Curve (R m)													
	Gradient	One way (↗ · ↘) parabo ($\frac{1}{4}$ · $\frac{3}{4}$)													
	Nearby tunnel	yes · no (m)													
	Nearby crossing	yes · no (m)													
	Traffic	Much · Medium · Little													
	Commercial traffic	Much · Medium · Little													
Survey result	Camber deform		yes · no												
	Difference in grade		yes · no												
	Continuous of barrier		yes · no												
	Continuous of curve		yes · no												
	Noise		yes · no												
	Space change		yes · no												
	difference grade		yes · no												
	draining damage		yes · no												
Out line of damage	Blocked drainage		yes · no												
	Crack of pavement		yes · no												
	Damage of lighting		yes · no												
	Damage of sign		-												
	Damage of handrail		yes · no												
	Possibility of scour		yes · no												
	Walkway		yes · no (center span)												
	Vehicle		yes · no (center span)												
Inspection way	Walkway		yes · no												
	Vehicle		yes · no (center span)												
Impressions	· Serious damage by ship collision and vehicle collision was seen. · 1 cross frame of center span was dropped off · Remaining water was found in chord member · Longitudinal crack located between walkway and roadway might be caused by insufficient rigidity of support member of walkway. More detailed survey is recommended. · Some rivet was lost														
Access method	Superstructure	1. Inspection car 2. Falsework 3. On ground 4. Ladder 5. Lift car 6. On boat 7. Special camera 8. Others (Inspection vehicle)													
	Substructure	1. Inspection car 2. Falsework 3. On ground 4. Ladder 5. Lift car 6. On boat 7. Special camera 8. Others ()													
	Reason	· All bridge section is on the water · If inspection car is not available, false work will be required for center span													
Diagnosis	◆ Deterioration of bridge ◆ deficient · fair · good ◆ Noticeable point ◆ · Deformation by collision · Corrosion of some member · Crack under walkway														
History of repair	· Maintenance and repairing work was done by ODA at 1984 Repaint ; - yy - mm														
Surveyor ;		Mr. Chujo, Mr. Kudo													

Present state (1 / 18)					
Authority	DRR	Address	Bangkok	Data	23-Oct-09
Bridge	Memorial Bridge				

	Picture No.	1
	Span	1
	Member	Side view

	Picture No.	2
	Span	1
	Member	View on road

	Picture No.	3
	Span	1
	Member	View under girder
	Inspection vehicle of side span.	
	No inspection vehicle in center span	

Present state (2 / 18)

Authority	DRR	Address	Bangkok	Data	23-Oct-09
Bridge	Memorial Bridge				



Picture No.	4
Span	1
Member	Side view of side span



Picture No.	5
Span	2
Member	side view of center sp



Picture No.	6
Span	1
Member	View of walkway

Present state (3 / 18)

Authority	DRR	Address	Bangkok	Data	23-Oct-09
Bridge	Memorial Bridge				



Picture No.	7
Span	1
Member	material

The material made in England

It's seems that same fabricator provide material for repairing work



Picture No.	8
Span	1
Member	Material

A325 (ASTM), NYM

High tension bolt produced MISUBOSHI



Picture No.	9
Span	1
Member	Inspection vehicle

Han powered inspection vehicle.

Present state (4 / 18)

Authority	DRR	Address	Bangkok	Data	23-Oct-09
Bridge	Memorial Bridge				



Picture No.	10
Span	1
Member	Expansion joint
Bangkok side	



Picture No.	11
Span	1
Member	Expansion joint
Bangkok side	
Deterioration of corrosion proofi	



Picture No.	12
Span	1
Member	Expansion joint
between side span and center span	
Peeling of surface layer	

Present state (5 / 18)

Authority	DRR	Address	Bangkok	Data	23-Oct-09
Bridge	Memorial Bridge				



Picture No.	7
Span	1
Member	Bearing
Deterioration of corrosion proofi	



Picture No.	8
Span	1
Member	Bearing
Remaining water	



Picture No.	9
Span	1
Member	Bearing
Mark of remarkable corrosion	
There is no remaining water at survey. Improved?	

Present state (6 / 18)

Authority	DRR	Address	Bangkok	Data	23-Oct-09
Bridge	Memorial Bridge				



Picture No.	10
Span	1
Member	Stay cable
Connection between steel and slab	
It looks make gap around steel member from bottom side.	



Picture No.	11
Span	1
Member	Inspection vehicle
Mounted up around steel member to prevent remaining water.	
It looks no gap around steel member from top side.	



Picture No.	12
Span	1
Member	slab
It looks no gap around steel member from top side.	

Present state (7 / 18)

Authority	DRR	n	Bangkok	Data	23-Oct-09
Bridge	Memorial Bridge				



Picture No.	13
Span	1
Member	slab
Reinforcement by additional plate	
Original structure is connected by rivet	
Reinforcement structure is connected by high tension bolt.	



Picture No.	14
Span	1
Member	slab
Reinforcement plate top and bottom of member	



Picture No.	15
Span	1
Member	slab
Remaining water is seen inside of chord member	

Present state (8 / 18)

Authority	DRR	Address	Bangkok	Data	23-Oct-09
Bridge	Memorial Bridge				



Picture No.	16
Span	1
Member	slab
Remaining water It will make corrosion	



Picture No.	17
Span	1
Member	slab
Remarkable reduced section	



Picture No.	18
Span	1
Member	slab
Rivet is not changed to bolt.	
Reinforcement plate was connected only center by bolt.	

Present state (9 / 18)

Authority	DRR	Address	Bangkok	Data	23-Oct-09
Bridge	Memorial Bridge				



Picture No.	13
Span	1
Member	slab
Deterioration of corrosion proofi	



Picture No.	14
Span	1
Member	slab
Corrosion of diaphragm	
Accumulation of soil	



Picture No.	15
Span	1
Member	Lighting pole
Corrosion of diaphragm	

Present state (10/18)

Authority	DRR	Address	Bangkok	Data	23-Oct-09
Bridge	Memorial Bridge				



Picture No.	16
Span	1
Member	Chord member
Repaired member	



Picture No.	17
Span	1
Member	Bolt
Rivet was replaced by bolt	



Picture No.	18
Span	1
Member	Bolt
Looseness of bolt	

Present state (11 / 18)					
Authority	DRR	Address	Bangkok	Data	23-Oct-09
Bridge	Memorial Bridge				



Picture No.	19
Span	1
Member	Bolt
Falling of rivet	



Picture No.	20
Span	1
Member	Upper chord
Deformation	



Picture No.	21
Span	1
Member	Lighting pole
Corrosion	

Present state (12/18)

Authority	DRR	Address	Bangkok	Data	23-Oct-09
Bridge	Memorial Bridge				



Picture No.	22
Span	1
Member	Stringer
Stringer is connected by high tension bolt.	
All stringer might be replaced at repairing work	



Picture No.	23
Span	1
Member	Bottom chord
Deformation by vehicle collision	
Limit of vehicle height is 3.5m	
No warning frame is set before bridge at Thon Buri side	



Picture No.	24
Span	1
Member	Bottom chord
Deformation by vehicle collision	
Thon Buri side	

Present state (13 / 18)

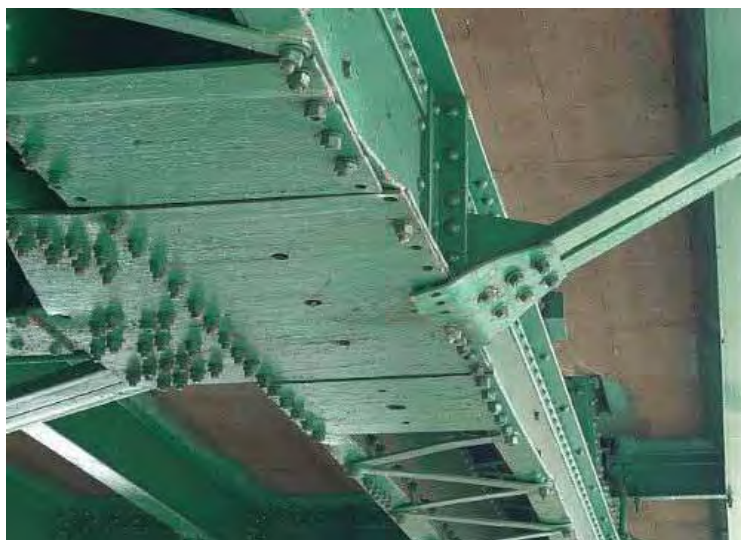
Authority	DRR	Address	Bangkok	Data	23-Oct-09
Bridge	Memorial Bridge				



Picture No.	25
Span	1
Member	Cross frame
Thon Buri side	
Buckling by vehicle collision	



Picture No.	26
Span	1
Member	End cross beam
Deformation	



Picture No.	27
Span	1
Member	Bottom chord
Rupture of rivet by vehicle collision	

Present state (14 / 18)

Authority	DRR	Address	Bangkok	Data	23-Oct-09
Bridge	Memorial Bridge				



Picture No.	28
Span	1
Member	Monitoring camera



Picture No.	29
Span	1
Member	Worning frame

There is warning frame at Bangkok
side



Picture No.	30
Span	1
Member	slab

Crack on slab

Present state (15/18)

Authority	DRR	Address	Bangkok	Data	23-Oct-09
Bridge	Memorial Bridge				



Picture No.	31
Span	1
Member	slab
Replaced slab	
Free lime is seen on slab of center span and walkway	



Picture No.	32
Span	1
Member	slab
Crack and free lime	



Picture No.	33
Span	1
Member	Drainage
Blocked	

Present state (16/18)

Authority	DRR	Address	Bangkok	Data	23-Oct-09
Bridge	Memorial Bridge				



Picture No.	34
Span	1
Member	Slab
Longitudinal crack between road and walkway	
Insufficiency of rigidity of bracket member of walkway?	
*Survey on board, 31-oct	



Picture No.	35
Span	1
Member	Slab
Longitudinal crack between road and walkway	
*Survey on board, 31-oct	



Picture No.	36
Span	1
Member	Slab
Longitudinal crack between road and walkway	
Fracture of surface	
*Survey on board, 31-oct	

Present state (17/18)					
Authority	DRR	Address	Bangkok	Data	23-Oct-09
Bridge	Memorial Bridge				

	Picture No.	37
	Span	1
	Member	slab
	Crack and free lime on bottom surface of slab	
	Deformation of cross frame by ship collision	
	<i>*Survey on board, 31-oct</i>	

	Picture No.	38
	Span	1
	Member	Inspection car rail
	Lack of bolt	
	<i>*Survey on board, 31-oct</i>	

	Picture No.	39
	Span	1
	Member	Cross frame
	Drop off 1 member by ship collision	
	<i>*Survey on board, 31-oct</i>	

Present state (18 / 18)

Authority	DRR	Address	Bangkok	Data	23-Oct-09
Bridge	Memorial Bridge				



Picture No.	40
Span	1
Member	Gusset plate
Damage by ship collision	
<i>*Survey on board, 31-oct</i>	

[illegible][illegible]

Inspection sheet of visual survey

Bridge No. 14

Photo No. (~)

Bridge name		Phra Pokklao Bridge		Route name		-		Authority		DRR		Code of authority		-			
Place		from Khat Bangkok Noi to Khet Phra Nakhon		Distance		from km+ 0 to km+ 0						No.		-			
												Survey date		2009/10/23			
Bridge properties	Bridge type(1)	main road · side road · ramp															
	Bridge type(2)	bridge · viaduct · plank pass															
	Bridge type(3)	3-span continuous PC box girder															
	Total length	212.00 (m)															
	Span	56 + 100 + 56 (m)															
	Nos. of span	3 span															
	Width	13.2 X 2 (m) / (m)															
	Completion	1984															
Road information	Horizontal	Straight · incli (θ = °) · Curve (R m)															
	Gradient	One way (↗ · ↘) parabola (〇 · 〇)															
	Nearby tunnel	yes · no (m)															
	Nearby crossing	yes · no (m)															
	Traffic	Much · Medium · Little															
	Commercial traffic	Much · Medium · Little															
Environ	1. Urban	2. Suburbs		3. Mountain		4. Seaside											
	5. Industrial	6. Harbor		7. Residential		8. Business											
	9. Salty	10. Cold and snow		11. Heavy snow		12. Others											
Under brid	1. Shinkanser	2. Railway		3. Highway		4. Road											
	5. River	6. Lake		7. Ravine		8. Valley											
	9. Waterway	10. Parking		11. Bike parkin		12. Park											
	13. Vacant	14. Harbor		Name (Chao Phraya)													
Access method	Superstructure	1. Inspection car 2. Falsework 3. On ground 4. Ladder 5. Lift car 6. On boat 7. Special camera 8. Others ()															
	Substructure	1. Inspection car 2. Falsework 3. On ground 4. Ladder 5. Lift car 6. On boat 7. Special camera 8. Others ()															
	Reason	· All bridge section is on the water · If inspection car is not available, false work will be required															
Survey result	Joint	Camber deform	yes · no														
		Difference in glade	yes · no														
		Continuous of barrier	yes · no														
		Continuous of curve	yes · no														
		Noise	yes · no														
	Out line of damage	Space change	yes · no														
		difference grade	yes · no														
		draining damage	yes · no														
		Blocked drainage	yes · no														
		Crack of pavement	yes · no														
Inspection way	Inspection way	Damage of lighting	yes · no														
		Damage of sign	-														
		Damage of handrail	yes · no														
		Possibility of scour	yes · no														
		Walkway yes · no															
	Impressions	Impressions	Vehicle yes · no														
Diagnosis	Diagnosis	◆ Deterioration of bridge ◆ deficient · fair · good															
		◆ Noticeable point ◆															
History of repair	History of repair	Surveyor ; Mr. Chujo, Mr. Kudo															
		Repaint ; - yy - mm															

Present state (1 / 4)					
Authority	DRR	Address	Bangkok	Data	23-Oct-09
Bridge	Phra Pokklao Bridge				



Picture No.	1
Span	1
Member	Side view



Picture No.	2
Span	1
Member	View on road



Picture No.	3
Span	1
Member	View under girder

Present state (2 / 4)

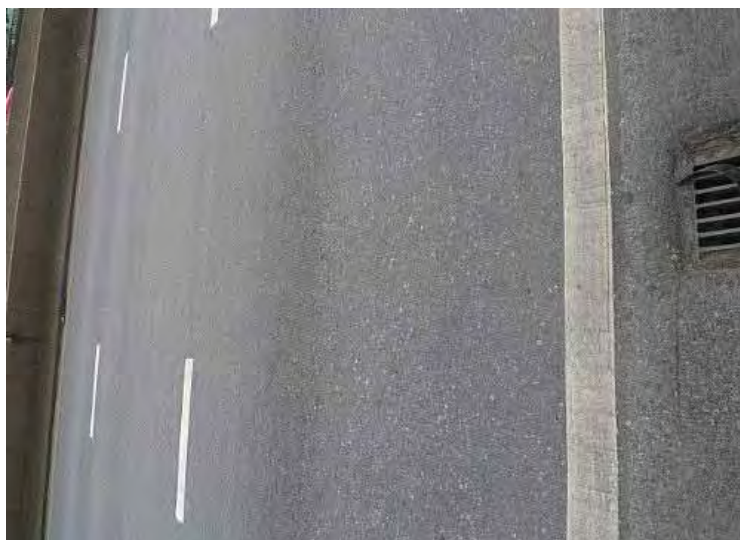
Authority	DRR	Address	Bangkok	Data	23-Oct-09
Bridge	Phra Pokklao Bridge				



Picture No.	4
Span	1
Member	Approach bridge
Settlement around pier	



Picture No.	5
Span	1
Member	Catch basin



Picture No.	6
Span	1
Member	Catch basin
Cross fall is parabola?	
Catch basin is installed at both side	

Present state (3 / 4)

Authority	DRR	Address	Bangkok	Data	23-Oct-09
Bridge	Phra Pokklao Bridge				



Picture No.	7
Span	1
Member	Side barrier
Exfoliation of concrete	



Picture No.	8
Span	1
Member	Center barrier
Fracture of concrete surface	



Picture No.	9
Span	1
Member	
Free lime	
Deterioration of drain function	
<i>*Survey on board, 31-oct</i>	

Present state (4 / 4)

Authority	DRR	Address	Bangkok	Data	23-Oct-09
Bridge	Phra Pokklao Bridge				



Picture No.	10
Span	1
Member	Drainage
Scratch by ship collision	



Picture No.	11
Span	1
Member	Substructure



Picture No.	12
Span	1
Member	Pylon

添付資料

Photo No. (~)


添付-178

Present state (1 / 8)


Authority	DRR	Address	Bangkok	Data	27-Oct-09
Bridge	Taksin bridge				

[illegible][illegible][illegible]


Present state (2 / 8)					
Authority	DRR	Address	Bangkok	Data	27-Oct-09
Bridge	Taksin bridge				



Picture No.	4
Span	1
Member	Expansion Joint
Replaced expansion joint	



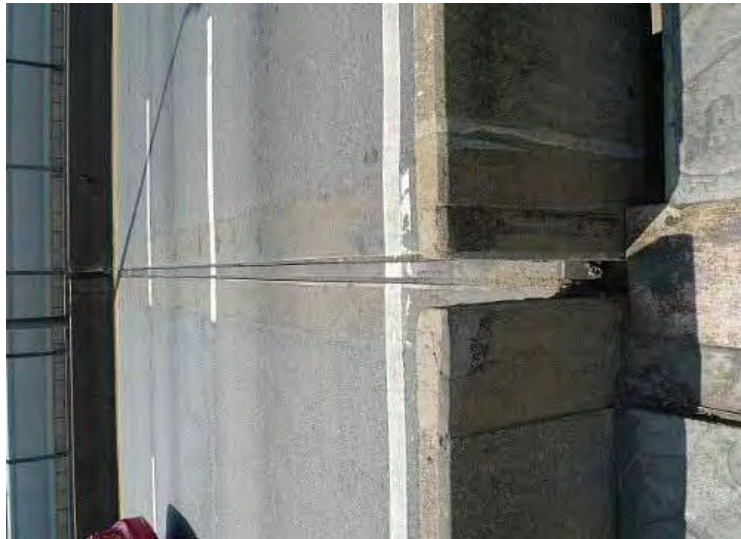
Picture No.	5
Span	1
Member	Expansion joint
Spacing is wider than 3cm than other joint	
Bangkok side, down stream	



Picture No.	6
Span	1
Member	Expansion joint
Lack of cover of barrier and curv	

Present state (3 / 8)

Authority	DRR	Address	Bangkok	Data	27-Oct-09
Bridge	Taksin bridge				



Picture No.	7
Span	1
Member	Water supply
modular type is applied for the bridge of upstream	
Lack of cover of barrier	



Picture No.	8
Span	1
Member	Bearing
Movement of bearing.	
Bangkok side	
Already reach to end of sliding plate	



Picture No.	9
Span	1
Member	Bearing
Movement of Thon Buri side is sma	

Present state (4 / 8)

Authority	DRR	Address	Bangkok	Data	27-Oct-09
Bridge	Taksin bridge				



Picture No.	10
Span	1
Member	Expansion joint
Deterioration of drain function	
Mark of leakage	




Picture No.	11
Span	1
Member	Vertical alignment
Bent angle between main bridge and approach bridge	




Picture No.	12
Span	1
Member	Slab
Free lime	


Present state (5 / 8)					
Authority	DRR	Address	Bangkok	Data	27-Oct-09
Bridge	Taksin bridge				



Picture No.	7
Span	1
Member	Box girder
Shear crack or severe cold joint Detailed study is recommended	
Free lime from filled hole Without waterproofing?	



Picture No.	8
Span	1
Member	Catch basin
Free lime from filled hole Without waterproofing?	



Picture No.	9
Span	1
Member	Barrier
Exposure of rebar	

Present state (6 / 8)

Authority	DRR	Address	Bangkok	Data	27-Oct-09
Bridge	Taksin bridge				



Picture No.	10
Span	1
Member	Slab
Mark of repair	



Picture No.	11
Span	1
Member	Bearing
Leakage from joint	
Upstream, Thon Buri side	



Picture No.	12
Span	1
Member	Lighting pole
Free lime (lower)	
Crack (upper)	
Upstream, Bangkok side	

Present state (7 / 8)

Authority	DRR	Address	Bangkok	Data	27-Oct-09
Bridge	Taksin bridge				



Picture No.	7
Span	1
Member	Catch basin
Blocking	



Picture No.	8
Span	1
Member	Pavement
Uneavenness of pavement	
Upstream, Bangkok side	



Picture No.	9
Span	1
Member	Walkway
Feeling uneasy due to wide gap	

Present state (8 / 8)

Authority	DRR	Address	Bangkok	Data	27-Oct-09
Bridge	Taksin bridge				



Picture No.	10
Span	1
Member	Girder
Free lime from construction joint	



Picture No.	11
Span	1
Member	Girder
Acumuration of soil	



Picture No.	12
Span	1
Member	Pier
Test of carbonation is recommended	