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## **APPENDICES**

## Appendix A

### Road Inventory Attributes (Section: 1 Vientiane to Sikodthabong)

#### General Information

Segment	Road id	Link id	Node id	Segment id	LRP start	LRP end	Station start	Station end	District
Segment1	13N	DA	001	1	1	2	0+000	0+200	Sikodthabong
Segment2	13N	DA	001	2	1	2	0+200	0+400	Sikodthabong
Segment3	13N	DA	001	3	1	2	0+400	0+600	Sikodthabong
Segment4	13N	DA	001	4	1	2	0+600	0+800	Sikodthabong
Segment5	13N	DA	001	5	1	2	0+800	1+000	Sikodthabong
Segment6	13N	DA	001	6	1	2	1+000	1+200	Sikodthabong
Segment7	13N	DA	001	7	1	2	1+200	1+400	Sikodthabong
Segment8	13N	DA	001	8	1	2	1+400	1+600	Sikodthabong
Segment9	13N	DA	001	9	1	2	1+600	1+800	Sikodthabong
Segment10	13N	DA	001	10	1	2	1+800	2+000	Sikodthabong
Segment11	13N	DA	001	11	1	2	2+000	2+200	Sikodthabong
Segment12	13N	DA	001	12	1	2	2+200	2+400	Sikodthabong
Segment13	13N	DA	001	13	1	2	2+400	2+600	Sikodthabong
Segment14	13N	DA	001	14	1	2	2+600	2+800	Sikodthabong
Segment15	13N	DA	001	15	1	2	2+800	3+000	Sikodthabong
Segment16	13N	DA	001	16	1	2	3+000	3+200	Sikodthabong
Segment17	13N	DA	001	17	1	2	3+200	3+400	Sikodthabong
Segment18	13N	DA	001	18	1	2	3+400	3+600	Sikodthabong
Segment19	13N	DA	001	19	1	2	3+600	3+800	Sikodthabong
Segment20	13N	DA	001	20	1	2	3+800	4+000	Sikodthabong
Segment21	13N	DA	001	21	1	2	4+000	4+200	Sikodthabong
Segment22	13N	DA	001	22	1	2	4+200	4+400	Sikodthabong

## Road Inventory Attributes

Station Start	Station End	Road Name	Road class	No lane	Lane width	Surface type	Surface width	Shoulder width
0+000	0+200	13N	National	2 lanes	3.50 m	Surface treatment	7.00 m	0.5 m
0+200	0+400	13N	National	2 lanes	3.50 m	Surface treatment	7.00 m	0.5 m
0+400	0+600	13N	National	2 lanes	3.50 m	Surface treatment	7.00 m	0.5 m
0+600	0+800	13N	National	2 lanes	3.50 m	Surface treatment	7.00 m	0.5 m
0+800	1+000	13N	National	2 lanes	3.50 m	Surface treatment	7.00 m	0.5 m
1+000	1+200	13N	National	2 lanes	3.50 m	Surface treatment	7.00 m	0.5 m
1+200	1+400	13N	National	2 lanes	3.50 m	Surface treatment	7.00 m	0.5 m
1+400	1+600	13N	National	2 lanes	3.50 m	Surface treatment	7.00 m	0.5 m
1+600	1+800	13N	National	2 lanes	3.50 m	Surface treatment	7.00 m	0.5 m
1+800	2+000	13N	National	2 lanes	3.50 m	Surface treatment	7.00 m	0.5 m
2+000	2+200	13N	National	2 lanes	3.50 m	Surface treatment	7.00 m	0.5 m
2+200	2+400	13N	National	2 lanes	3.50 m	Surface treatment	7.00 m	0.5 m
2+400	2+600	13N	National	2 lanes	3.50 m	Surface treatment	7.00 m	0.5 m
2+600	2+800	13N	National	2 lanes	3.50 m	Surface treatment	7.00 m	0.5 m
2+800	3+000	13N	National	2 lanes	3.50 m	Surface treatment	7.00 m	0.5 m
3+000	3+200	13N	National	2 lanes	3.50 m	Surface treatment	7.00 m	0.5 m
3+200	3+400	13N	National	2 lanes	3.50 m	Surface treatment	7.00 m	0.5 m
3+400	3+600	13N	National	2 lanes	3.50 m	Surface treatment	7.00 m	0.5 m
3+600	3+800	13N	National	2 lanes	3.50 m	Surface treatment	7.00 m	0.5 m
3+800	4+000	13N	National	2 lanes	3.50 m	Surface treatment	7.00 m	0.5 m
4+000	4+200	13N	National	2 lanes	3.50 m	Surface treatment	7.00 m	0.5 m
4+200	4+400	13N	National	2 lanes	3.50 m	Surface treatment	7.00 m	0.5 m



## Road Direction and Topography

Station start	Station end	Direction	Topography	Access Constraint	Access level	Road project	Road Budget
0+000	0+200	VT-VV	Flat: if <5m/km	Open all year	Accessible	ADB	Financial
0+200	0+400	VT-VV	Flat: if <5m/km	Open all year	Accessible	ADB	Financial
0+400	0+600	VT-VV	Flat: if <5m/km	Open all year	Accessible	ADB	Financial
0+600	0+800	VT-VV	Flat: if <5m/km	Open all year	Accessible	ADB	Financial
0+800	1+000	VT-VV	Flat: if <5m/km	Open all year	Accessible	ADB	Financial
1+000	1+200	VT-VV	Flat: if <5m/km	Open all year	Accessible	ADB	Financial
1+200	1+400	VT-VV	Flat: if <5m/km	Open all year	Accessible	ADB	Financial
1+400	1+600	VT-VV	Flat: if <5m/km	Open all year	Accessible	ADB	Financial
1+600	1+800	VT-VV	Flat: if <5m/km	Open all year	Accessible	ADB	Financial
1+800	2+000	VT-VV	Flat: if <5m/km	Open all year	Accessible	ADB	Financial
2+000	2+200	VT-VV	Flat: if <5m/km	Open all year	Accessible	ADB	Financial
2+200	2+400	VT-VV	Flat: if <5m/km	Open all year	Accessible	ADB	Financial
2+400	2+600	VT-VV	Flat: if <5m/km	Open all year	Accessible	ADB	Financial
2+600	2+800	VT-VV	Flat: if <5m/km	Open all year	Accessible	ADB	Financial
2+800	3+000	VT-VV	Flat: if <5m/km	Open all year	Accessible	ADB	Financial
3+000	3+200	VT-VV	Flat: if <5m/km	Open all year	Accessible	ADB	Financial
3+200	3+400	VT-VV	Flat: if <5m/km	Open all year	Accessible	ADB	Financial
3+400	3+600	VT-VV	Flat: if <5m/km	Open all year	Accessible	ADB	Financial
3+600	3+800	VT-VV	Flat: if <5m/km	Open all year	Accessible	ADB	Financial
3+800	4+000	VT-VV	Flat: if <5m/km	Open all year	Accessible	ADB	Financial
4+000	4+200	VT-VV	Flat: if <5m/km	Open all year	Accessible	ADB	Financial
4+200	4+400	VT-VV	Flat: if <5m/km	Open all year	Accessible	ADB	Financial

## Road Historical

Station start	Station end	Construct year	Reconstruct year	Construct by	Survey id	Inspector	Date_inspect
0+000	0+200	1954	1978	French	1	Khao	24/11/2005
0+200	0+400	1954	1978	French	1	Khao	24/11/2005
0+400	0+600	1954	1978	French	1	Khao	24/11/2005
0+600	0+800	1954	1978	French	1	Khao	24/11/2005
0+800	1+000	1954	1978	French	1	Khao	24/11/2005
1+000	1+200	1954	1978	French	1	Khao	24/11/2005
1+200	1+400	1954	1978	French	1	Khao	24/11/2005
1+400	1+600	1954	1978	French	1	Khao	24/11/2005
1+600	1+800	1954	1978	French	1	Khao	24/11/2005
1+800	2+000	1954	1978	French	1	Khao	24/11/2005
2+000	2+200	1954	1978	French	1	Khao	24/11/2005
2+200	2+400	1954	1978	French	1	Khao	24/11/2005
2+400	2+600	1954	1978	French	1	Khao	24/11/2005
2+600	2+800	1954	1978	French	1	Khao	24/11/2005
2+800	3+000	1954	1978	French	1	Khao	24/11/2005
3+000	3+200	1954	1978	French	1	Khao	24/11/2005
3+200	3+400	1954	1978	French	1	Khao	24/11/2005
3+400	3+600	1954	1978	French	1	Khao	24/11/2005
3+600	3+800	1954	1978	French	1	Khao	24/11/2005
3+800	4+000	1954	1978	French	1	Khao	24/11/2005
4+000	4+200	1954	1978	French	1	Khao	24/11/2005
4+200	4+400	1954	1978	French	1	Khao	24/11/2005

## Road Inventory Attributes

### (Section: 2 Sikodthabong to Naxaithong)

#### General Road Information

Segment	Road id	Link id	Node id	Segment id	LRP start	LRP end	Station start	Station end	District
Segment1	13N	DA	001	40	4	5	6+000	6+200	Naxaithong
Segment2	13N	DA	001	41	4	5	6+200	6+400	Naxaithong
Segment3	13N	DA	001	42	4	5	6+400	6+600	Naxaithong
Segment4	13N	DA	001	43	4	5	6+600	6+800	Naxaithong
Segment5	13N	DA	001	44	4	5	6+800	7+000	Naxaithong
Segment6	13N	DA	001	45	4	5	7+000	7+200	Naxaithong
Segment7	13N	DA	001	46	4	5	7+200	7+400	Naxaithong
Segment8	13N	DA	001	47	4	5	7+400	7+600	Naxaithong
Segment9	13N	DA	001	48	4	5	7+600	7+800	Naxaithong
Segment10	13N	DA	001	49	4	5	7+800	8+000	Naxaithong
Segment11	13N	DA	001	50	4	5	8+000	8+200	Naxaithong
Segment12	13N	DA	001	51	4	5	8+200	8+400	Naxaithong
Segment13	13N	DA	001	52	4	5	8+400	8+600	Naxaithong
Segment14	13N	DA	001	53	4	5	8+600	8+800	Naxaithong
Segment15	13N	DA	001	54	4	5	8+800	9+000	Naxaithong
Segment16	13N	DA	001	55	4	5	9+000	9+200	Naxaithong
Segment17	13N	DA	001	56	4	5	9+200	9+400	Naxaithong
Segment18	13N	DA	001	40	4	5	9+400	9+600	Naxaithong
Segment19	13N	DA	001	50	4	5	9+600	9+800	Naxaithong
Segment20	13N	DA	001	51	4	5	9+800	10+000	Naxaithong
Segment21	13N	DA	001	52	4	5	10+000	10+200	Naxaithong
Segment22	13N	DA	001	53	4	5	10+200	10+400	Naxaithong
Segment23	13N	DA	001	54	4	5	10+400	10+600	Naxaithong
Segment24	13N	DA	001	55	4	5	10+600	10+800	Naxaithong
Segment25	13N	DA	001	56	4	5	10+800	11+000	Naxaithong
Segment26	13N	DA	001	40	4	5	11+200	11+400	Naxaithong

## Road Inventory Attributes

Station start	Station end	Road Nam	Road class	No lane	Lane width	Surface type	Surface width	Should width
6+000	6+200	13N	National	2	3.50	Surface treatment	7.00	0.5 m
6+200	6+400	13N	National	2	3.50	Surface treatment	7.00	0.5 m
6+400	6+600	13N	National	2	3.50	Surface treatment	7.00	0.5 m
6+600	6+800	13N	National	2	3.50	Surface treatment	7.00	0.5 m
6+800	7+000	13N	National	2	3.50	Surface treatment	7.00	0.5 m
7+000	7+200	13N	National	2	3.50	Surface treatment	7.00	0.5 m
7+200	7+400	13N	National	2	3.50	Surface treatment	7.00	0.5 m
7+400	7+600	13N	National	2	3.50	Surface treatment	7.00	0.5 m
7+600	7+800	13N	National	2	3.50	Surface treatment	7.00	0.5 m
7+800	8+000	13N	National	2	3.50	Surface treatment	7.00	0.5 m
8+000	8+200	13N	National	2	3.50	Surface treatment	7.00	0.5 m
8+200	8+400	13N	National	2	3.50	Surface treatment	7.00	0.5 m
8+400	8+600	13N	National	2	3.50	Surface treatment	7.00	0.5 m
8+600	8+800	13N	National	2	3.50	Surface treatment	7.00	0.5 m
8+800	9+000	13N	National	2	3.50	Surface treatment	7.00	0.5 m
9+000	9+200	13N	National	2	3.50	Surface treatment	7.00	0.5 m
9+200	9+400	13N	National	2	3.50	Surface treatment	7.00	0.5 m
9+400	9+600	13N	National	2	3.50	Surface treatment	7.00	0.5 m
9+600	9+800	13N	National	2	3.50	Surface treatment	7.00	0.5 m
9+800	10+000	13N	National	2	3.50	Surface treatment	7.00	0.5 m
10+000	10+200	13N	National	2	3.50	Surface treatment	7.00	0.5 m
10+200	10+400	13N	National	2	3.50	Surface treatment	7.00	0.5 m
10+400	10+600	13N	National	2	3.50	Surface treatment	7.00	0.5 m
10+600	10+800	13N	National	2	3.50	Surface treatment	7.00	0.5 m
10+800	11+000	13N	National	2	3.50	Surface treatment	7.00	0.5 m
11+200	11+400	13N	National	2	3.50	Surface treatment	7.00	0.5 m

## Road Direction and Topography

Station start	Station end	Direction	Topography	Access Constraint	Access level	Road Budget
6+000	6+200	VV-LPB	Flat: if <5m/km	Open all year	Accessible	Financial
6+200	6+400	VV-LPB	Flat: if <5m/km	Open all year	Accessible	Financial
6+400	6+600	VV-LPB	Flat: if <5m/km	Open all year	Accessible	Financial
6+600	6+800	VV-LPB	Flat: if <5m/km	Open all year	Accessible	Financial
6+800	7+000	VV-LPB	Flat: if <5m/km	Open all year	Accessible	Financial
7+000	7+200	VV-LPB	Flat: if <5m/km	Open all year	Accessible	Financial
7+200	7+400	VV-LPB	Flat: if <5m/km	Open all year	Accessible	Financial
7+400	7+600	VV-LPB	Flat: if <5m/km	Open all year	Accessible	Financial
7+600	7+800	VV-LPB	Flat: if <5m/km	Open all year	Accessible	Financial
7+800	8+000	VV-LPB	Flat: if <5m/km	Open all year	Accessible	Financial
8+000	8+200	VV-LPB	Flat: if <5m/km	Open all year	Accessible	Financial
8+200	8+400	VV-LPB	Flat: if <5m/km	Open all year	Accessible	Financial
8+400	8+600	VV-LPB	Flat: if <5m/km	Open all year	Accessible	Financial
8+600	8+800	VV-LPB	Flat: if <5m/km	Open all year	Accessible	Financial
8+800	9+000	VV-LPB	Flat: if <5m/km	Open all year	Accessible	Financial
9+000	9+200	VV-LPB	Flat: if <5m/km	Open all year	Accessible	Financial
9+200	9+400	VV-LPB	Flat: if <5m/km	Open all year	Accessible	Financial
9+400	9+600	VV-LPB	Flat: if <5m/km	Open all year	Accessible	Financial
9+600	9+800	VV-LPB	Flat: if <5m/km	Open all year	Accessible	Financial
9+800	10+000	VV-LPB	Flat: if <5m/km	Open all year	Accessible	Financial
10+000	10+200	VV-LPB	Flat: if <5m/km	Open all year	Accessible	Financial
10+200	10+400	VV-LPB	Flat: if <5m/km	Open all year	Accessible	Financial
10+400	10+600	VV-LPB	Flat: if <5m/km	Open all year	Accessible	Financial
10+600	10+800	VV-LPB	Flat: if <5m/km	Open all year	Accessible	Financial
10+800	11+000	VV-LPB	Flat: if <5m/km	Open all year	Accessible	Financial
11+200	11+400	VV-LPB	Flat: if <5m/km	Open all year	Accessible	Financial

## Road Historical

Station start	Station end	Construct year	Reconstruct year	Construct by	Survey id	Inspector	Date inspect
6+000	6+200	1954	1978	French	1	Khao	25/11/2005
6+200	6+400	1954	1978	French	1	Khao	25/11/2005
6+400	6+600	1954	1978	French	1	Khao	25/11/2005
6+600	6+800	1954	1978	French	1	Khao	25/11/2005
6+800	7+000	1954	1978	French	1	Khao	25/11/2005
7+000	7+200	1954	1978	French	1	Khao	25/11/2005
7+200	7+400	1954	1978	French	1	Khao	25/11/2005
7+400	7+600	1954	1978	French	1	Khao	25/11/2005
7+600	7+800	1954	1978	French	1	Khao	25/11/2005
7+800	8+000	1954	1978	French	1	Khao	25/11/2005
8+000	8+200	1954	1978	French	1	Khao	25/11/2005
8+200	8+400	1954	1978	French	1	Khao	25/11/2005
8+400	8+600	1954	1978	French	1	Khao	25/11/2005
8+600	8+800	1954	1978	French	1	Khao	25/11/2005
8+800	9+000	1954	1978	French	1	Khao	25/11/2005
9+000	9+200	1954	1978	French	1	Khao	25/11/2005
9+200	9+400	1954	1978	French	1	Khao	25/11/2005
9+400	9+600	1954	1978	French	1	Khao	25/11/2005
9+600	9+800	1954	1978	French	1	Khao	25/11/2005
9+800	10+000	1954	1978	French	1	Khao	25/11/2005
10+000	10+200	1954	1978	French	1	Khao	25/11/2005
10+200	10+400	1954	1978	French	1	Khao	25/11/2005
10+400	10+600	1954	1978	French	1	Khao	25/11/2005
10+600	10+800	1954	1978	French	1	Khao	25/11/2005
10+800	11+000	1954	1978	French	1	Khao	25/11/2005
11+200	11+400	1954	1978	French	1	Khao	25/11/2005

## Road Inventory Attributes

### (Section: 3 Vangvieng to Luangprabang)

#### General Road Information

Segment	Road id	Link id	Node id	Segment id	LRP start	LRP end	Station start	Station end	District
Segment1	13N	F	005	80	8	9	138+000	138+200	Vangvieng
Segment2	13N	F	005	81	8	9	138+200	138+400	Vangvieng
Segment3	13N	F	005	82	8	9	138+400	138+600	Vangvieng
Segment4	13N	F	005	83	8	9	138+600	138+800	Vangvieng
Segment5	13N	F	005	84	8	9	138+800	139+000	Vangvieng
Segment6	13N	F	005	85	8	9	139+000	139+200	Vangvieng
Segment7	13N	F	005	86	8	9	139+200	139+400	Vangvieng
Segment8	13N	F	005	87	8	9	139+400	139+600	Vangvieng
Segment9	13N	F	005	88	8	9	139+600	139+800	Vangvieng
Segment10	13N	F	005	89	8	9	139+800	140+000	Vangvieng
Segment11	13N	F	005	90	8	9	140+000	140+200	Vangvieng
Segment12	13N	F	005	91	8	9	140+200	140+400	Vangvieng
Segment13	13N	F	005	92	8	9	140+400	140+600	Vangvieng
Segment14	13N	F	005	93	8	9	140+600	140+800	Vangvieng
Segment15	13N	F	005	94	8	9	140+800	141+000	Vangvieng
Segment16	13N	F	005	95	8	9	141+000	141+200	Vangvieng
Segment17	13N	F	005	96	8	9	141+200	141+400	Vangvieng
Segment18	13N	F	005	97	8	9	141+400	141+600	Vangvieng
Segment19	13N	F	005	98	8	9	141+600	141+800	Vangvieng
Segment20	13N	F	005	99	8	9	141+800	142+000	Vangvieng
Segment21	13N	F	005	80	8	9	142+000	142+200	Vangvieng
Segment22	13N	F	005	81	8	9	142+200	142+400	Vangvieng
Segment23	13N	F	005	82	8	9	142+600	142+800	Vangvieng
Segment24	13N	F	005	83	8	9	142+800	143+000	Vangvieng
Segment25	13N	F	005	84	8	9	143+000	143+200	Vangvieng
Segment26	13N	F	005	85	8	9	143+200	143+400	Vangvieng
Segment27	13N	F	005	86	8	9	143+400	143+600	Vangvieng
Segment28	13N	F	005	87	8	9	143+600	143+800	Vangvieng
Segment29	13N	F	005	88	8	9	143+800	144+000	Vangvieng
Segment30	13N	F	005	89	8	9	144+000	144+200	Vangvieng
Segment31	13N	F	005	90	8	9	144+200	144+400	Vangvieng
Segment32	13N	F	005	91	8	9	144+400	144+600	Vangvieng
Segment33	13N	F	005	92	8	9	144+600	144+800	Vangvieng
Segment34	13N	F	005	93	8	9	144+800	145+000	Vangvieng
Segment35	13N	F	005	94	8	9	145+000	145+200	Vangvieng
Segment36	13N	F	005	95	8	9	145+200	145+400	Vangvieng
Segment37	13N	F	005	96	8	9	145+400	145+600	Vangvieng
Segment38	13N	F	005	97	8	9	145+600	145+800	Vangvieng
Segment39	13N	F	005	98	8	9	145+800	146+000	Vangvieng
Segment40	13N	F	005	99	8	9	146+000	146+200	Vangvieng
Segment41	13N	F	005	95	8	9	146+200	146+400	Vangvieng
Segment42	13N	F	005	96	8	9	146+400	146+600	Vangvieng
Segment43	13N	F	005	97	8	9	146+600	146+800	Vangvieng
Segment44	13N	F	005	98	8	9	146+800	147+000	Vangvieng
Segment45	13N	F	005	99	8	9	147+000	147+200	Vangvieng

## Road Inventory Attributes

Station start	Station end	Road name	Road class	No lane	Lane width	Surface type	Surface width	Shoulder width
138+000	138+200	13N	National	2	3.50	Surface treatment	7.00	0.5 m
138+200	138+400	13N	National	2	3.50	Surface treatment	7.00	0.5 m
138+400	138+600	13N	National	2	3.50	Surface treatment	7.00	0.5 m
138+600	138+800	13N	National	2	3.50	Surface treatment	7.00	0.5 m
138+800	139+000	13N	National	2	3.50	Surface treatment	7.00	0.5 m
139+000	139+200	13N	National	2	3.50	Surface treatment	7.00	0.5 m
139+200	139+400	13N	National	2	3.50	Surface treatment	7.00	0.5 m
139+400	139+600	13N	National	2	3.50	Surface treatment	7.00	0.5 m
139+600	139+800	13N	National	2	3.50	Surface treatment	7.00	0.5 m
139+800	140+000	13N	National	2	3.50	Surface treatment	7.00	0.5 m
140+000	140+200	13N	National	2	3.50	Surface treatment	7.00	0.5 m
140+200	140+400	13N	National	2	3.50	Surface treatment	7.00	0.5 m
140+400	140+600	13N	National	2	3.50	Surface treatment	7.00	0.5 m
140+600	140+800	13N	National	2	3.50	Surface treatment	7.00	0.5 m
140+800	141+000	13N	National	2	3.50	Surface treatment	7.00	0.5 m
141+000	141+200	13N	National	2	3.50	Surface treatment	7.00	0.5 m
141+200	141+400	13N	National	2	3.50	Surface treatment	7.00	0.5 m
141+400	141+600	13N	National	2	3.50	Surface treatment	7.00	0.5 m
141+600	141+800	13N	National	2	3.50	Surface treatment	7.00	0.5 m
141+800	142+000	13N	National	2	3.50	Surface treatment	7.00	0.5 m
142+000	142+200	13N	National	2	3.50	Surface treatment	7.00	0.5 m
142+200	142+400	13N	National	2	3.50	Surface treatment	7.00	0.5 m
142+400	142+600	13N	National	2	3.50	Surface treatment	7.00	0.5 m
142+600	142+800	13N	National	2	3.50	Surface treatment	7.00	0.5 m
142+800	143+000	13N	National	2	3.50	Surface treatment	7.00	0.5 m
143+000	143+200	13N	National	2	3.50	Surface treatment	7.00	0.5 m
143+200	143+400	13N	National	2	3.50	Surface treatment	7.00	0.5 m
143+400	143+600	13N	National	2	3.50	Surface treatment	7.00	0.5 m
143+600	143+800	13N	National	2	3.50	Surface treatment	7.00	0.5 m
143+800	144+000	13N	National	2	3.50	Surface treatment	7.00	0.5 m
144+000	144+200	13N	National	2	3.50	Surface treatment	7.00	0.5 m
144+200	144+400	13N	National	2	3.50	Surface treatment	7.00	0.5 m
144+400	144+600	13N	National	2	3.50	Surface treatment	7.00	0.5 m
144+600	144+800	13N	National	2	3.50	Surface treatment	7.00	0.5 m
144+800	145+000	13N	National	2	3.50	Surface treatment	7.00	0.5 m
145+000	145+200	13N	National	2	3.50	Surface treatment	7.00	0.5 m
145+200	145+400	13N	National	2	3.50	Surface treatment	7.00	0.5 m
145+400	145+600	13N	National	2	3.50	Surface treatment	7.00	0.5 m
145+600	145+800	13N	National	2	3.50	Surface treatment	7.00	0.5 m
145+800	146+000	13N	National	2	3.50	Surface treatment	7.00	0.5 m
146+000	146+200	13N	National	2	3.50	Surface treatment	7.00	0.5 m
146+200	146+400	13N	National	2	3.50	Surface treatment	7.00	0.5 m
146+400	146+600	13N	National	2	3.50	Surface treatment	7.00	0.5 m
146+600	146+800	13N	National	2	3.50	Surface treatment	7.00	0.5 m
146+800	147+000	13N	National	2	3.50	Surface treatment	7.00	0.5 m
147+000	147+200	13N	National	2	3.50	Surface treatment	7.00	0.5 m





## Road Historical

Station start	Station end	Construct year	Reconstruct year	Construct by	Survey id	Inspector	Date inspect
138+000	138+200	1954	1978	French	1	Khao	25/11/2005
138+200	138+400	1954	1978	French	1	Khao	25/11/2005
138+400	138+600	1954	1978	French	1	Khao	25/11/2005
138+600	138+800	1954	1978	French	1	Khao	25/11/2005
138+800	139+000	1954	1978	French	1	Khao	25/11/2005
139+000	139+200	1954	1978	French	1	Khao	25/11/2005
139+200	139+400	1954	1978	French	1	Khao	25/11/2005
139+400	139+600	1954	1978	French	1	Khao	25/11/2005
139+600	139+800	1954	1978	French	1	Khao	25/11/2005
139+800	140+000	1954	1978	French	1	Khao	25/11/2005
140+000	140+200	1954	1978	French	1	Khao	25/11/2005
140+200	140+400	1954	1978	French	1	Khao	25/11/2005
140+400	140+600	1954	1978	French	1	Khao	25/11/2005
140+600	140+800	1954	1978	French	1	Khao	25/11/2005
140+800	141+000	1954	1978	French	1	Khao	25/11/2005
141+000	141+200	1954	1978	French	1	Khao	25/11/2005
141+200	141+400	1954	1978	French	1	Khao	25/11/2005
141+400	141+600	1954	1978	French	1	Khao	25/11/2005
141+600	141+800	1954	1978	French	1	Khao	25/11/2005
141+800	142+000	1954	1978	French	1	Khao	25/11/2005
142+000	142+200	1954	1978	French	1	Khao	25/11/2005
142+200	142+400	1954	1978	French	1	Khao	25/11/2005
142+400	142+600	1954	1978	French	1	Khao	25/11/2005
142+600	142+800	1954	1978	French	1	Khao	25/11/2005
142+800	143+000	1954	1978	French	1	Khao	25/11/2005
143+000	143+200	1954	1978	French	1	Khao	25/11/2005
143+200	143+400	1954	1978	French	1	Khao	25/11/2005
143+400	143+600	1954	1978	French	1	Khao	25/11/2005
143+600	143+800	1954	1978	French	1	Khao	25/11/2005
143+800	144+000	1954	1978	French	1	Khao	25/11/2005
144+000	144+200	1954	1978	French	1	Khao	25/11/2005
144+200	144+400	1954	1978	French	1	Khao	25/11/2005
144+400	144+600	1954	1978	French	1	Khao	25/11/2005
144+600	144+800	1954	1978	French	1	Khao	25/11/2005
144+800	145+000	1954	1978	French	1	Khao	25/11/2005
145+000	145+200	1954	1978	French	1	Khao	25/11/2005
145+200	145+400	1954	1978	French	1	Khao	25/11/2005
145+400	145+600	1954	1978	French	1	Khao	25/11/2005
145+600	145+800	1954	1978	French	1	Khao	25/11/2005
145+800	146+000	1954	1978	French	1	Khao	25/11/2005
146+000	146+200	1954	1978	French	1	Khao	25/11/2005
146+200	146+400	1954	1978	French	1	Khao	25/11/2005
146+400	146+600	1954	1978	French	1	Khao	25/11/2005
146+600	146+800	1954	1978	French	1	Khao	25/11/2005
146+800	147+000	1954	1978	French	1	Khao	25/11/2005
147+000	147+200	1954	1978	French	1	Khao	25/11/2005



STAT1	STAT2	POTHOL LENGTH	POTHOL WIDTH	POTHOL AREA	DISTEGRA LENGTH	DISTE WIDTH	DIST AREA
0+000	0+200	0.00	0.00	0.00	0.00	0.00	0.00
0+200	0+400	0.00	0.00	0.00	0.00	0.00	0.00
0+400	0+600	0.00	0.00	0.00	0.00	0.00	0.00
0+600	0+800	0.00	0.00	0.00	0.00	0.00	0.00
0+800	1+000	0.00	0.00	0.00	0.00	0.00	0.00
1+000	1+200	0.00	0.00	0.00	0.00	0.00	0.00
1+200	1+400	0.00	0.00	0.00	0.00	0.00	0.00
1+400	1+600	0.00	0.00	0.00	0.00	0.00	0.00
1+600	1+800	0.00	0.00	0.00	0.00	0.00	0.00
1+800	2+000	0.00	0.00	0.00	0.00	0.00	0.00
2+000	2+200	0.00	0.00	0.00	0.00	0.00	0.00

STAT1	STAT2	TOTAL AREA	MINOR AREA	MAJOR AREA	PAVE MENT MINOR AREA	PAVE MENT MAJOR AREA	MINOR CONDI TION	MAJOR CONDI TION
0+000	0+200	0.00	0.00	0.00	0.00	0.00	1	0
0+200	0+400	0.00	0.00	0.00	0.00	0.00	0	0
0+400	0+600	0.00	0.00	0.00	0.00	0.00	0	0
0+600	0+800	0.00	0.00	0.00	0.00	0.00	1	0
0+800	1+000	0.00	0.00	0.00	0.00	0.00	1	0
1+000	1+200	0.00	0.00	0.00	0.00	0.00	1	0
1+200	1+400	0.00	0.00	0.00	0.00	0.00	1	0
1+400	1+600	0.00	0.00	0.00	0.00	0.00	1	0
1+600	1+800	0.00	0.00	0.00	0.00	0.00	1	0
1+800	2+000	0.00	0.00	0.00	0.00	0.00	1	0
2+000	2+200	0.00	0.00	0.00	0.00	0.00	1	0

## Shoulder Condition Defect

STAT1	STAT2	SHOULDER DEFECT LENGTH	SHOULD DEFECT WIDTH	SHOULD DEFECT W MAX	SHOULD DEFECT AREA	SHOULD DEFECT TOTAL	SHOULDER CONDI TION
0+000	0+200	0.00	0.00	0.00	0.00	NO	0
0+200	0+400	0.00	0.00	0.00	0.00	NO	0
0+400	0+600	0.00	0.00	0.00	0.00	NO	0
0+600	0+800	0.00	0.00	0.00	0.00	NO	0
0+800	1+000	0.00	0.00	0.00	0.00	NO	0
1+000	1+200	0.00	0.00	0.00	0.00	NO	0
1+200	1+400	0.00	0.00	0.00	0.00	NO	0
1+400	1+600	0.00	0.00	0.00	0.00	NO	0
1+600	1+800	0.00	0.00	0.00	0.00	NO	0
1+800	2+000	0.00	0.00	0.00	0.00	NO	0
2+000	2+200	0.00	0.00	0.00	0.00	NO	0

## Side Drain Condition Defec

STAT 1	STAT 2	SIDE DRAIN DEFECT LENGTH	SIDE DRAIN DEFECT WIDTH	SIDE DRAIN DEFECT DEEP	SIDE DRAIN DEFECT AREA	SIDE DRAIN DEFECT TOTAL	SIDE DRAIN CONDITION
0+000	0+200	0.00	0.00	0.00	0.00	NO	0
0+200	0+400	0.00	0.00	0.00	0.00	NO	0
0+400	0+600	0.00	0.00	0.00	0.00	NO	0
0+600	0+800	0.00	0.00	0.00	0.00	NO	0
0+800	1+000	0.00	0.00	0.00	0.00	NO	0
1+000	1+200	0.00	0.00	0.00	0.00	NO	0
1+200	1+400	0.00	0.00	0.00	0.00	NO	0
1+400	1+600	0.00	0.00	0.00	0.00	NO	0
1+600	1+800	0.00	0.00	0.00	0.00	NO	0
1+800	2+000	0.00	0.00	0.00	0.00	NO	0
2+000	2+200	0.00	0.00	0.00	0.00	NO	0

## Culvert Condition Defect

STAT 1	STAT 2	CUL VERT DEFECT LENGTH	CUL VERT DEFECT WIDTH	CUL VERT DEFECT DEEP	CUL VERT DEFECT AREA	CUL VERT DEFECT TOTAL	CUL VERT CONDITION
0+000	0+200	0.00	0.00	0.00	0.00	NO	0
0+200	0+400	0.00	0.00	0.00	0.00	NO	0
0+400	0+600	0.00	0.00	0.00	0.00	NO	0
0+600	0+800	0.00	0.00	0.00	0.00	NO	0
0+800	1+000	0.00	0.00	0.00	0.00	NO	0
1+000	1+200	0.00	0.00	0.00	0.00	NO	0
1+200	1+400	0.00	0.00	0.00	0.00	NO	0
1+400	1+600	0.00	0.00	0.00	0.00	NO	0
1+600	1+800	0.00	0.00	0.00	0.00	NO	0
1+800	2+000	0.00	0.00	0.00	0.00	NO	0
2+000	2+200	0.00	0.00	0.00	0.00	NO	0

## Slope Condition Defect

STAT 1	STAT 2	SLOPE DEFECT LENGTH	SLOPE DEFECT WIDTH	SLOPE DEFECT DEEP	SLOPE DEFECT AREA	SLOPE DEFECT TOTAL	SLOPE CONDITION
0+000	0+200	0.00	0.00	0.00	0.00	NO	0
0+200	0+400	0.00	0.00	0.00	0.00	NO	0
0+400	0+600	0.00	0.00	0.00	0.00	NO	0
0+600	0+800	0.00	0.00	0.00	0.00	NO	0
0+800	1+000	0.00	0.00	0.00	0.00	NO	0
1+000	1+200	0.00	0.00	0.00	0.00	NO	0
1+200	1+400	0.00	0.00	0.00	0.00	NO	0
1+400	1+600	0.00	0.00	0.00	0.00	NO	0
1+600	1+800	0.00	0.00	0.00	0.00	NO	0
1+800	2+000	0.00	0.00	0.00	0.00	NO	0
2+000	2+200	0.00	0.00	0.00	0.00	NO	0

## Road Furniture Defect

STAT 1	STAT 2	ROAD FURNITURE DEFECT LENGTH	ROAD FURNITURE DEFECT WIDTH	ROAD FURNITURE DEFECT NO	ROAD FURNITURE DEFECT TOTAL	ROAD FURNITURE CONDITION
0+000	0+200	0.00	0.00	0	NO	0
0+200	0+400	0.00	0.00	0	NO	0
0+400	0+600	0.00	0.00	0	NO	0
0+600	0+800	0.00	0.00	0	MA	0
0+800	1+000	0.00	0.00	0	MA	0
1+000	1+200	0.00	0.00	0	NO	0
1+200	1+400	0.00	0.00	0	NO	0
1+400	1+600	0.00	0.00	0	NO	0
1+600	1+800	0.00	0.00	0	MA	0
1+800	2+000	0.00	0.00	0	MA	0
2+000	2+200	0.00	0.00	0	NO	0

## Right of way Condition Defect

STAT 1	STAT 2	ROW DEFECT LENGTH	ROW DEFECT WIDTH	ROW DEFECT M_WIDTH	ROW DEFECT TOTAL LENGTH	ROW DEFECT TOTAL	ROW CONDITION
0+000	0+200	0.00	0.00	0.00	0.00	NO	0
0+200	0+400	0.00	0.00	0.00	0.00	NO	0
0+400	0+600	0.00	0.00	0.00	0.00	NO	0
0+600	0+800	0.00	0.00	0.00	0.00	NO	0
0+800	1+000	0.00	0.00	0.00	0.00	NO	0
1+000	1+200	0.00	0.00	0.00	0.00	NO	0
1+200	1+400	0.00	0.00	0.00	0.00	NO	0
1+400	1+600	0.00	0.00	0.00	0.00	NO	0
1+600	1+800	0.00	0.00	0.00	0.00	NO	0
1+800	2+000	0.00	0.00	0.00	0.00	NO	0
2+000	2+200	0.00	0.00	0.00	0.00	NO	0

## Road Element Rating

STAT 1	STAT 2	PAVE MENT	SHOULD	SIDE DRAIN	CUL VERT	SLOPE	ROAD FURNITURE	R.O.W
0+000	0+200	1	1	1	1	1	1	1
0+200	0+400	1	1	1	1	1	1	1
0+400	0+600	1	1	1	1	1	1	1
0+600	0+800	1	1	1	1	1	1	1
0+800	1+000	1	1	1	1	1	1	1
1+000	1+200	1	1	1	1	1	1	1
1+200	1+400	1	1	1	1	1	1	1
1+400	1+600	1	1	1	1	1	1	1
1+600	1+800	1	1	1	1	1	1	1
1+800	2+000	1	1	1	1	1	1	1
2+000	2+200	1	1	1	1	1	1	1

## Evaluate of road condition

STAT 1	STAT 2	ACCESS CONS TRAIINT	ACCESS LEVEL	ROAD CONDITION SURVEY ID	INSPEC DATE	INSPECTOR
0+000	0+200	None	Open all year	1	25/11/2005	Khao
0+200	0+400	None	Open all year	1	25/11/2005	Khao
0+400	0+600	None	Open all year	1	25/11/2005	Khao
0+600	0+800	None	Open all year	1	25/11/2005	Khao
0+800	1+000	None	Open all year	1	25/11/2005	Khao
1+000	1+200	None	Open all year	1	25/11/2005	Khao
1+200	1+400	None	Open all year	1	25/11/2005	Khao
1+400	1+600	None	Open all year	1	25/11/2005	Khao
1+600	1+800	None	Open all year	1	25/11/2005	Khao
1+800	2+000	None	Open all year	1	25/11/2005	Khao
2+000	2+200	None	Open all year	1	25/11/2005	Khao

## Road Condition Attributes

### (Section 2 Road Condition from Vientiane capital to Sikodthabong District)

#### General Road Information

SEGMENTS	ROAD ID	LINK ID	SEGMENT ID	STAT1	STAT2	LRP1	LRP2
Segment:1	13N	DA	0	6+000	6+200	14	15
Segment:2	13N	DA	0	6+200	6+400	14	15
Segment:3	13N	DA	0	6+400	6+600	14	15
Segment:4	13N	DA	0	6+600	6+800	14	15
Segment:5	13N	DA	0	6+800	7+000	14	15
Segment:6	13N	DA	0	7+000	7+200	14	15
Segment:7	13N	DA	0	7+200	7+400	14	15
Segment:8	13N	DA	0	7+400	7+600	14	15
Segment:9	13N	DA	0	7+600	7+800	14	15
Segment:10	13N	DA	0	7+800	8+000	14	15
Segment:11	13N	DA	0	8+000	8+200	14	15
Segment:12	13N	DA	0	8+200	8+400	14	15
Segment:13	13N	DA	0	8+400	8+600	14	15
Segment:14	13N	DA	0	8+600	8+800	14	15
Segment:15	13N	DA	0	8+800	9+000	14	15
Segment:16	13N	DA	0	9+000	9+200	14	15
Segment:17	13N	DA	0	9+200	9+400	14	15
Segment:18	13N	DA	0	9+400	9+600	14	15
Segment:19	13N	DA	0	9+600	9+800	14	15
Segment:20	13N	DA	0	9+800	10+000	14	15
Segment:21	13N	DA	0	10+000	10+200	14	15
Segment:22	13N	DA	0	10+200	10+400	14	15









## Shoulder Condition Defect

STAT1	STAT2	SHOULDER DEFECT LENGTH	SHOULD DEFECT WIDTH	SHOULD DEFECT W MAX	SHOULD DEFECT AREA	SHOULD DEFECT TOTAL	SHOULD CONDI TION
6+000	6+200	9.00	0.30	15.00	2.70	DR	2
6+200	6+400	15.00	0.30	20.00	4.50	DR	2
6+400	6+600	20.00	0.20	23.00	4.00	DR	2
6+600	6+800	20.00	0.30	25.00	6.00	DR	2
6+800	7+000	0.00	0.00	0.00	0.00	NO	0
7+000	7+200	25.00	0.30	30.00	7.50	DR	2
7+200	7+400	0.00	0.00	0.00	0.00	DR	2
7+400	7+600	25.00	0.30	30.00	7.50	DR	2
7+600	7+800	25.00	0.30	20.00	7.50	DR	3
7+800	8+000	15.00	0.30	15.00	4.50	DR	2
8+000	8+200	15.00	0.30	210.00	4.50	DR	3
8+200	8+400	20.00	0.35	10.00	7.00	DR	3
8+400	8+600	0.00	0.00	0.00	0.00	NO	0
8+600	8+800	0.00	0.00	0.00	0.00	NO	0
8+800	9+000	0.00	0.00	0.00	0.00	NO	0
9+000	9+200	0.00	0.00	0.00	0.00	NO	0
9+200	9+400	0.00	0.00	0.00	0.00	NO	0
9+400	9+600	0.00	0.00	0.00	0.00	NO	0
9+600	9+800	0.00	0.00	0.00	0.00	NO	0
9+800	10+000	0.00	0.00	0.00	0.00	NO	0
10+000	10+200	0.00	0.00	0.00	0.00	NO	0
10+200	10+400	0.00	0.00	0.00	0.00	NO	0

## Side Drain Condition Defect

STAT1	STAT2	SIDE DRAIN DEFECT LENGTH	SIDE DRAIN DEFECT WIDTH	SIDE DRAIN DEFECT DEEP	SIDE DRAIN DEFECT W MAX	SIDE DRAIN DEFECT AREA	SIDE DRAIN DEFECT TOTAL	SIDE DRAIN CONDITION
6+000	6+200	13.00	1.30	25.00	30.00	19.30	DR	0
6+200	6+400	9.00	1.20	25.00	30.00	10.80	DR	0
6+400	6+600	0.00	0.00	0.00	0.00	0.00	NO	3
6+600	6+800	15.00	0.50	0.50	0.80	2.50	ER	1
6+800	7+000	0.00	0.00	0.00	0.00	0.00	NO	0
7+000	7+200	15.00	0.90	50.00	60.00	14.05	DR	3
7+200	7+400	0.00	0.00	0.00	0.00	0.00	DR	3
7+400	7+600	200.00	0.90	0.40	0.60	180.00	DR	2
7+600	7+800	25.00	1.00	0.50	0.80	25.00	ER	1
7+800	8+000	45.00	1.00	0.50	0.80	45.00	ER	1
8+000	8+200	25.00	1.00	0.50	0.80	25.00	BL	1
8+200	8+400	0.00	0.00	0.00	0.00	0.00	NO	3
8+400	8+600	0.00	0.00	0.00	0.00	0.00	NO	0
8+600	8+800	0.00	0.00	0.00	0.00	0.00	NO	0
8+800	9+000	0.00	0.00	0.00	0.00	0.00	NO	0
9+000	9+200	0.00	0.00	0.00	0.00	0.00	NO	0
9+200	9+400	0.00	0.00	0.00	0.00	0.00	NO	0
9+400	9+600	0.00	0.00	0.00	0.00	0.00	NO	0
9+600	9+800	0.00	0.00	0.00	0.00	0.00	DR	3
9+800	10+000	0.00	0.00	0.00	0.00	0.00	DR	0
10+000	10+200	0.00	0.00	0.00	0.00	0.00	BL	2
10+200	10+400	0.00	0.00	0.00	0.00	0.00	NO	0

## Culvert Condition Defect

STAT1	STAT2	CULVERT DEFECT LENGTH	CULVERT DEFECT WIDTH	CULVERT DEFECT DEEP	CUVERT DEFECT W MAX	CULVERT DEFECT AREA	CULVERT DEFECT TOTAL
6+000	6+200	0.00	0.00	0.00	0.00	0.00	NO
6+200	6+400	0.00	0.00	0.00	0.00	0.00	NO
6+400	6+600	0.00	0.00	0.00	0.00	0.00	NO
6+600	6+800	0.00	0.00	0.00	0.00	0.00	NO
6+800	7+000	0.00	0.00	0.00	0.00	0.00	NO
7+000	7+200	0.00	0.00	0.00	0.00	0.00	NO
7+200	7+400	0.00	0.00	0.00	0.00	0.00	NO
7+400	7+600	0.00	0.00	0.00	0.00	0.00	NO
7+600	7+800	0.00	0.00	0.00	0.00	0.00	NO
7+800	8+000	0.00	0.00	0.00	0.00	0.00	NO
8+000	8+200	0.00	0.00	0.00	0.00	0.00	NO
8+200	8+400	0.00	0.00	0.00	0.00	0.00	NO
8+400	8+600	0.00	0.00	0.00	0.00	0.00	NO
8+600	8+800	0.00	0.00	0.00	0.00	0.00	NO
8+800	9+000	0.00	0.00	0.00	0.00	0.00	NO
9+000	9+200	0.00	0.00	0.00	0.00	0.00	NO
9+200	9+400	0.00	0.00	0.00	0.00	0.00	NO
9+400	9+600	0.00	0.00	0.00	0.00	0.00	NO
9+600	9+800	0.00	0.00	0.00	0.00	0.00	NO
9+800	10+000	0.00	0.00	0.00	0.00	0.00	NO
10+000	10+200	0.00	0.00	0.00	0.00	0.00	NO
10+200	10+400	0.00	0.00	0.00	0.00	0.00	NO



## Road Furniture Defect

STAT1	STAT2	ROAD FURNITURE DEFECT LENGTH	ROAD FURNITURE DEFECT WIDTH	ROAD FURNITURE DEFECT NO	ROAD FURNITURE DEFECT TOTAL	ROAD FURNITURE CONDITION
6+000	6+200	0.00	0.00	0		0
6+200	6+400	0.00	0.00	0	NO	0
6+400	6+600	0.00	0.00	0	NO	0
6+600	6+800	0.00	0.00	0	MA	1
6+800	7+000	0.00	0.00	0	NO	0
7+000	7+200	0.00	0.00	0	NO	0
7+200	7+400	0.00	0.00	0	NO	0
7+400	7+600	0.00	0.00	0	NO	0
7+600	7+800	0.00	0.00	0	NO	0
7+800	8+000	0.00	0.00	0	NO	0
8+000	8+200	0.00	0.00	0	NO	0
8+200	8+400	0.00	0.00	0	NO	0
8+400	8+600	0.00	0.00	0	MA	0
8+600	8+800	0.00	0.00	0	NO	0
8+800	9+000	0.00	0.00	0	NO	0
9+000	9+200	0.00	0.00	0	NO	0
9+200	9+400	0.00	0.00	0	NO	0
9+400	9+600	0.00	0.00	0	MA	0
9+600	9+800	0.00	0.00	0	NO	0
9+800	10+000	0.00	0.00	0	MA	0
10+000	10+200	0.00	0.00	0	NO	0
10+200	10+400	0.00	0.00	0	MA	0



## Right of way Condition Defect

STAT1	STAT2	ROW DEFECT LENGTH	ROW DEFECT WIDTH	ROW DEFECT M_WIDTH	ROW DEFECT TOTAL LENGTH	ROW DEFECT TOTAL	ROW CONDITION
6+000	6+200	0.00	0.00	0.00	0.00	NO	0
6+200	6+400	0.00	0.00	0.00	0.00	NO	0
6+400	6+600	0.00	0.00	0.00	0.00	NO	0
6+600	6+800	0.00	0.00	0.00	0.00	NO	0
6+800	7+000	0.00	0.00	0.00	0.00	NO	0
7+000	7+200	0.00	0.00	0.00	0.00	NO	0
7+200	7+400	0.00	0.00	0.00	0.00	NO	0
7+400	7+600	0.00	0.00	0.00	0.00	NO	0
7+600	7+800	0.00	0.00	0.00	0.00	NO	0
7+800	8+000	0.00	0.00	0.00	0.00	NO	0
8+000	8+200	0.00	0.00	0.00	0.00	NO	0
8+200	8+400	0.00	0.00	0.00	0.00	NO	0
8+400	8+600	0.00	0.00	0.00	0.00	NO	0
8+600	8+800	0.00	0.00	0.00	0.00	NO	0
8+800	9+000	0.00	0.00	0.00	0.00	NO	0
9+000	9+200	0.00	0.00	0.00	0.00	NO	0
9+200	9+400	0.00	0.00	0.00	0.00	NO	0
9+400	9+600	0.00	0.00	0.00	0.00	NO	0
9+600	9+800	0.00	0.00	0.00	0.00	NO	0
9+800	10+000	0.00	0.00	0.00	0.00	NO	0
10+000	10+200	0.00	0.00	0.00	0.00	NO	0
10+200	10+400	0.00	0.00	0.00	0.00	NO	0

## Road Element Rating

STAT1	STAT2	PAVE MENT	SHOUL DER	SIDE DRAIN	CUL VERT	SLOPE	ROAD FERNITURE	R.O.W
6+000	6+200	1	1	1	1	1	1	1
6+200	6+400	1	1	1	1	1	1	1
6+400	6+600	1	1	1	1	1	1	1
6+600	6+800	1	1	1	1	1	1	1
6+800	7+000	1	1	1	1	1	1	1
7+000	7+200	1	1	1	1	1	1	1
7+200	7+400	1	1	1	1	1	1	1
7+400	7+600	1	1	1	1	1	1	1
7+600	7+800	1	1	1	1	1	1	1
7+800	8+000	1	1	1	1	1	1	1
8+000	8+200	1	1	1	1	1	1	1
8+200	8+400	1	1	1	1	1	1	1
8+400	8+600	1	1	1	1	1	1	1
8+600	8+800	1	1	1	1	1	1	1
8+800	9+000	1	1	1	1	1	1	1
9+000	9+200	1	1	1	1	1	1	1
9+200	9+400	1	1	1	1	1	1	1
9+400	9+600	1	1	1	1	1	1	1
9+600	9+800	1	1	1	1	1	1	1
9+800	10+000	1	1	1	1	1	1	1
10+000	10+200	1	1	1	1	1	1	1
10+200	10+400	1	1	1	1	1	1	1

## Evaluate of road condition

STAT1	STAT2	ACCESS CONS TRAIINT	ACCESS LEVEL	ROAD CONDITION SURVEY ID	INSPEC DATE	INSPECTOR
6+000	6+200	None	Open all year	1	25/11/2005	Khao
6+200	6+400	None	Open all year	1	25/11/2005	Khao
6+400	6+600	None	Open all year	1	25/11/2005	Khao
6+600	6+800	None	Open all year	1	25/11/2005	Khao
6+800	7+000	None	Open all year	1	25/11/2005	Khao
7+000	7+200	None	Open all year	1	25/11/2005	Khao
7+200	7+400	None	Open all year	1	25/11/2005	Khao
7+400	7+600	None	Open all year	1	25/11/2005	Khao
7+600	7+800	None	Open all year	1	25/11/2005	Khao
7+800	8+000	None	Open all year	1	25/11/2005	Khao
8+000	8+200	None	Open all year	1	25/11/2005	Khao
8+200	8+400	None	Open all year	1	25/11/2005	Khao
8+400	8+600	None	Open all year	1	25/11/2005	Khao
8+600	8+800	None	Open all year	1	25/11/2005	Khao
8+800	9+000	None	Open all year	1	25/11/2005	Khao
9+000	9+200	None	Open all year	1	25/11/2005	Khao
9+200	9+400	None	Open all year	1	25/11/2005	Khao
9+400	9+600	None	Open all year	1	25/11/2005	Khao
9+600	9+800	None	Open all year	1	25/11/2005	Khao
9+800	10+000	None	Open all year	1	25/11/2005	Khao
10+000	10+200	None	Open all year	1	25/11/2005	Khao
10+200	10+400	None	Open all year	1	25/11/2005	Khao

## Road Condition Attributes

### (Section 3 Road Condition from Vangvieng to Laungprabang)

#### General Road Information

SEGMENTS	ROAD ID	LINK ID	SEGMENT ID	STAT1	STAT2	LRP1	LRP2
Segment:1	13N	B	0	15+000	15+200	17	18
Segment:2	13N	B	0	15+200	15+400	17	18
Segment:3	13N	B	0	15+400	15+600	17	18
Segment:4	13N	B	0	15+600	15+800	17	18
Segment:5	13N	B	0	15+800	15+000	17	18
Segment:6	13N	B	0	16+000	16+200	17	18
Segment:7	13N	B	0	16+200	16+400	17	18
Segment:8	13N	B	0	16+400	16+600	17	18
Segment:9	13N	B	0	16+600	16+800	17	18
Segment:10	13N	B	0	16+800	17+000	17	18
Segment:11	13N	B	0	17+000	17+200	17	18
Segment:12	13N	B	0	17+200	17+400	17	18
Segment:13	13N	B	0	17+400	17+600	17	18
Segment:14	13N	B	0	17+600	17+800	17	18
Segment:15	13N	B	0	18+800	18+000	17	18
Segment:16	13N	B	0	18+000	18+200	17	18
Segment:17	13N	B	0	18+200	18+400	17	18
Segment:18	13N	B	0	18+400	18+600	17	18
Segment:19	13N	B	0	18+600	18+800	17	18
Segment:20	13N	B	0	18+800	19+000	17	18
Segment:21	13N	B	0	19+000	19+200	17	18
Segment:22	13N	B	0	19+200	19+400	17	18
Segment:23	13N	B	0	19+400	19+600	17	18
Segment:24	13N	B	0	19+600	19+800	17	18
Segment:25	13N	B	0	19+800	20+000	17	18
Segment:26	13N	B	0	20+000	20+200	17	18

## Pavement Condition Defect

STAT1	STAT2	BLEED LENGTH	BLEED DEPTH	BLEED WIDTH	BLEED AREA	PATCH LENGTH	PATCH WIEGTH	PATCH AREA
15+000	15+200	2837.00	3.00	1938.00	5.50	6678.00	3746.00	25.92
15+200	15+400	2737.00	3.00	1837.00	5.03	5388.00	2737.00	15.28
15+400	15+600	2647.00	3.00	1733.00	4.59	4756.00	2836.00	13.64
15+600	15+800	2567.00	3.00	1736.00	4.46	5373.00	2635.00	14.76
15+800	15+000	2626.00	3.00	1736.00	4.56	5796.00	2551.00	15.39
16+000	16+200	2783.00	3.00	1737.00	4.83	5767.00	2576.00	15.49
16+200	16+400	3845.00	3.00	2547.00	9.79	5968.00	3846.00	23.60
16+400	16+600	3736.00	3.00	2264.00	8.46	5637.00	3746.00	21.21
16+600	16+800	3987.00	2.50	2837.00	11.31	6366.00	2688.00	17.60
16+800	17+000	2674.00	2.50	1717.00	4.59	6832.00	2643.00	19.07
17+000	17+200	2837.00	3.00	1783.00	5.06	5837.00	3476.00	20.76
17+200	17+400	3746.00	3.00	1748.00	6.55	5373.00	2736.00	15.24
17+400	17+600	2736.00	3.00	1726.00	4.72	5836.00	2712.00	16.53
17+600	17+800	2456.00	3.00	1949.00	4.79	5736.00	3746.00	22.16
18+800	18+000	2736.00	3.00	1937.00	5.30	4665.00	2434.00	11.41
18+000	18+200	3846.00	3.00	2947.00	11.33	5964.00	3134.00	19.48
18+200	18+400	2134.00	3.00	1513.00	3.23	4735.00	2632.00	12.57
18+400	18+600	2477.00	3.00	1653.00	4.09	4754.00	2532.00	12.71
18+600	18+800	2645.00	3.00	1734.00	4.59	5745.00	3125.00	18.82
18+800	19+000	2746.00	3.00	1937.00	5.32	4744.00	2534.00	12.68
19+000	19+200	2010.00	3.00	1515.00	3.05	5743.00	2532.00	15.15
19+200	19+400	2634.00	3.00	1736.00	4.57	4532.00	2125.00	10.35
19+400	19+600	2745.00	3.00	1365.00	3.75	5301.00	2532.00	13.84
19+600	19+800	2834.00	3.00	1612.00	4.57	5322.00	3510.00	18.85
19+800	20+000	2635.00	3.00	1648.00	4.34	4893.00	3743.00	18.41
20+000	20+200	2635.00	3.00	1823.00	4.80	4856.00	2376.00	11.98

## Pavement Condition Defect (Cond't)

STAT1	STAT2	REVELL LENGTH	REVELL WIDTH	REVELL AREA	CRACK LENGTH	CRACK WIDTH	CRACK AREA
15+000	15+200	3784.00	1873.00	7.18	2637.00	3.00	4.58
15+200	15+400	2635.00	748.00	2.04	2836.00	3.00	4.89
15+400	15+600	2445.00	1334.00	3.56	2455.00	3.00	3.52
15+600	15+800	2435.00	1256.00	3.30	2637.00	3.00	4.29
15+800	15+000	2458.00	1455.00	3.85	2446.00	3.00	3.62
16+000	16+200	2567.00	1578.00	4.25	2454.00	3.00	3.06
16+200	16+400	2435.00	1526.00	4.08	2436.00	3.00	3.30
16+400	16+600	3746.00	2384.00	9.50	2848.00	3.00	4.63
16+600	16+800	3556.00	2563.00	9.59	2546.00	2.00	3.96
16+800	17+000	2748.00	1336.00	4.32	2736.00	3.00	4.74
17+000	17+200	2765.00	1653.00	3.74	2836.00	3.00	3.71
17+200	17+400	3556.00	2533.00	9.05	2735.00	3.00	4.72
17+400	17+600	3746.00	1625.00	6.51	2546.00	3.00	4.42
17+600	17+800	2765.00	1276.00	3.82	2566.00	3.00	4.02
18+800	18+000	2542.00	1558.00	4.51	2543.00	3.00	3.70
18+000	18+200	3544.00	2421.00	9.37	2532.00	3.00	3.62
18+200	18+400	3742.00	2435.00	10.16	2337.00	3.00	3.72
18+400	18+600	3532.00	2533.00	9.34	2453.00	3.00	3.81
18+600	18+800	3164.00	1457.00	4.78	2532.00	3.00	4.16
18+800	19+000	3532.00	2421.00	8.94	2533.00	3.00	4.52
19+000	19+200	3211.00	2743.00	8.70	2532.00	3.00	4.13
19+200	19+400	3643.00	2532.00	0.00	2531.00	3.00	3.60
19+400	19+600	3045.00	1507.00	4.90	2431.00	3.00	3.72
19+600	19+800	3846.00	2635.00	10.49	2532.00	3.00	3.92
19+800	20+000	4632.00	2431.00	12.24	2532.00	3.00	3.40
20+000	20+200	3524.00	2008.00	7.66	2532.00	3.00	4.24

## Pavement Condition Defect (Cond't)

STAT1	STAT2	POTHOL LENGTH	POTHOL WIDTH	POTHOL MAX	POTHOL AREA	DIST LENG	DIST WIDTH	DIST AREA
15+000	15+200	4983.00	2237.00	2387.00	11.89	0.00	0.00	0.00
15+200	15+400	5637.00	2743.00	2837.00	15.99	0.00	0.00	0.00
15+400	15+600	4676.00	2254.00	2354.00	11.01	0.00	0.00	0.00
15+600	15+800	5876.00	2346.00	2566.00	15.08	0.00	0.00	0.00
15+800	15+000	5467.00	2557.00	2678.00	14.64	0.00	0.00	0.00
16+000	16+200	4653.00	2256.00	2676.00	12.45	0.00	0.00	0.00
16+200	16+400	5765.00	3559.00	3796.00	21.88	0.00	0.00	0.00
16+400	16+600	5847.00	3648.00	3846.00	22.49	0.00	0.00	0.00
16+600	16+800	4857.00	2633.00	2746.00	13.34	0.00	0.00	0.00
16+800	17+000	4725.00	2635.00	2773.00	13.10	0.00	0.00	0.00
17+000	17+200	5775.00	3465.00	3567.00	20.60	0.00	0.00	0.00
17+200	17+400	5124.00	3567.00	3686.00	18.89	0.00	0.00	0.00
17+400	17+600	5768.00	2763.00	2793.00	16.11	0.00	0.00	0.00
17+600	17+800	5788.00	3677.00	3754.00	21.72	0.00	0.00	0.00
18+800	18+000	5877.00	3812.00	3861.00	22.69	0.00	0.00	0.00
18+000	18+200	6785.00	3643.00	3854.00	26.15	0.00	0.00	0.00
18+200	18+400	4573.00	3466.00	4547.00	16.22	0.00	0.00	0.00
18+400	18+600	5754.00	3642.00	3669.00	21.11	0.00	0.00	0.00
18+600	18+800	5843.00	3621.00	3732.00	21.81	0.00	0.00	0.00
18+800	19+000	5743.00	3422.00	3543.00	20.34	0.00	0.00	0.00
19+000	19+200	5743.00	2532.00	2654.00	15.24	0.00	0.00	0.00
19+200	19+400	5545.00	3121.00	3289.00	18.24	0.00	0.00	0.00
19+400	19+600	5565.00	3167.00	3249.00	18.08	0.00	0.00	0.00
19+600	19+800	5836.00	3744.00	3790.00	22.12	0.00	0.00	0.00
19+800	20+000	5774.00	3453.00	3557.00	20.53	0.00	0.00	0.00
20+000	20+200	5785.00	3532.00	3679.00	21.28	0.00	0.00	0.00

## Pavement Condition Defect (Cond't)

STAT1	STAT2	TOTAL AREA	MINOR AREA	MAJOR AREA	PAVE MENT MINOR AREA	PAVE MENT MAJOR AREA	MINOR CONDI TION	MAJOR CONDI TION
15+000	15+200	0.00	36.01	19.07	0.00	0.00	4	2
15+200	15+400	0.00	25.20	18.03	0.00	0.00	2	2
15+400	15+600	0.00	21.75	14.56	0.00	0.00	2	1
15+600	15+800	0.00	23.51	18.38	0.00	0.00	2	2
15+800	15+000	0.00	23.57	18.49	0.00	0.00	2	2
16+000	16+200	0.00	16.70	19.76	0.00	0.00	2	2
16+200	16+400	0.00	36.96	25.96	0.00	0.00	2	2
16+400	16+600	0.00	34.31	31.99	0.00	0.00	2	2
16+600	16+800	0.00	32.87	12.93	0.00	0.00	2	2
16+800	17+000	0.00	28.30	17.42	0.00	0.00	2	2
17+000	17+200	0.00	29.52	24.34	0.00	0.00	2	2
17+200	17+400	0.00	15.24	27.95	0.00	0.00	2	2
17+400	17+600	0.00	25.67	22.61	0.00	0.00	2	2
17+600	17+800	0.00	30.97	25.54	0.00	0.00	2	2
18+800	18+000	0.00	20.41	27.20	0.00	0.00	2	2
18+000	18+200	0.00	34.43	35.52	0.00	0.00	2	2
18+200	18+400	0.00	12.57	30.10	0.00	0.00	2	2
18+400	18+600	0.00	20.61	30.45	0.00	0.00	2	2
18+600	18+800	0.00	27.57	26.59	0.00	0.00	2	2
18+800	19+000	0.00	22.52	29.28	0.00	0.00	2	2
19+000	19+200	0.00	22.33	23.94	0.00	0.00	2	2
19+200	19+400	0.00	18.52	28.72	0.00	0.00	2	2
19+400	19+600	0.00	21.31	22.18	0.00	0.00	2	2
19+600	19+800	0.00	27.34	28.76	0.00	0.00	2	2
19+800	20+000	0.00	26.15	32.77	0.00	0.00	2	2
20+000	20+200	0.00	20.02	28.94	0.00	0.00	2	2



## Shoulder Condition Defect

STAT1	STAT2	SHOULDER DEFECT LENGTH	SHOULD DEFECT WIDTH	SHOULD DEFECT W.MAX	SHOULD DEFECT AREA	SHOULD DEFECT TOTAL	SHOULD CONDI TION
15+000	15+200	25.00	0.30	15.00	7.50	DR	2
15+200	15+400	25.00	0.30	10.00	7.50	DR	2
15+400	15+600	15.00	0.30	20.00	4.50	DR	2
15+600	15+800	15.00	0.30	15.00	4.50	DR	2
15+800	15+000	25.00	0.30	15.00	7.50	DR	2
16+000	16+200	20.00	0.30	10.00	6.00	DR	2
16+200	16+400	50.00	0.30	15.00	15.00	DR	2
16+400	16+600	35.00	1.00	10.00	35.00	DR	2
16+600	16+800	35.00	0.30	15.00	10.50	DR	2
16+800	17+000	15.00	0.30	10.00	4.50	DR	2
17+000	17+200	25.00	0.30	10.00	7.50	DR	2
17+200	17+400	0.00	0.00	0.00	0.00	NO	0
17+400	17+600	25.00	0.30	10.00	7.50	DR	3
17+600	17+800	25.00	0.30	10.00	7.50	DR	2
18+800	18+000	25.00	0.30	10.00	7.50	DR	2
18+000	18+200	15.00	0.30	10.00	4.50	DR	2
18+200	18+400	15.00	0.30	10.00	4.50	DR	2
18+400	18+600	30.00	0.30	10.00	9.00	CR	1
18+600	18+800	35.00	1.00	0.00	35.00	VG	1
18+800	19+000	45.00	1.00	0.00	45.00	CR	1
19+000	19+200	45.00	1.00	0.00	45.00	VG	1
19+200	19+400	25.00	1.00	0.00	25.00	CR	1
19+400	19+600	20.00	1.00	0.00	20.00	VG	0
19+600	19+800	15.00	1.00	0.30	15.00	CR	1
19+800	20+000	20.00	1.00	0.00	20.00	VG	1
20+000	20+200	15.00	1.00	0.00	15.00	VG	1

## Side Drain Condition Defect

STAT1	STAT2	SIDE DRAIN DEFECT LENGTH	SIDE DRAIN DEFECT WIDTH	SIDE DRAIN DEFECT DEEP	SIDE DRAIN DEFECT W MAX	SIDE DRAIN DEFECT AREA	SIDE DRAIN DEFECT TOTAL	SIDE DRAIN CONDITION
15+000	15+200	45.00	1.00	0.50	0.80	45.00	DR	3
15+200	15+400	35.00	1.00	0.50	0.80	35.00	DR	3
15+400	15+600	25.00	1.00	0.50	0.80	25.00	DR	3
15+600	15+800	25.00	1.00	0.50	0.80	25.00	DR	0
15+800	15+000	25.00	1.00	0.50	0.80	25.00	DR	3
16+000	16+200	25.00	1.00	0.50	0.80	25.00	BL	1
16+200	16+400	0.00	0.00	0.00	0.00	0.00	NO	0
16+400	16+600	25.00	1.00	0.50	0.80	25.00	DR	3
16+600	16+800	25.00	1.00	0.50	0.80	25.00	DR	1
16+800	17+000	25.00	1.00	0.50	0.80	25.00	DR	1
17+000	17+200	35.00	1.00	0.50	0.80	35.00	DR	3
17+200	17+400	0.00	0.00	0.00	0.00	0.00	NO	0
17+400	17+600	0.00	0.00	0.00	0.00	0.00	NO	0
17+600	17+800	25.00	1.00	0.50	0.80	25.00	DR	3
18+800	18+000	30.00	1.00	0.50	0.80	30.00	DR	3
18+000	18+200	0.00	0.00	0.00	0.00	0.00	NO	0
18+200	18+400	25.00	1.00	0.50	0.80	25.00	BL	1
18+400	18+600	15.00	1.00	0.50	0.80	15.00	ER	1
18+600	18+800	10.00	1.00	0.50	0.80	10.00	BL	0
18+800	19+000	30.00	1.00	0.50	0.80	30.00	BL	1
19+000	19+200	25.00	1.00	0.50	0.80	25.00	ER	1
19+200	19+400	20.00	1.00	0.50	0.80	20.00	BL	1
19+400	19+600	15.00	1.00	0.50	0.80	15.00	ER	1
19+600	19+800	15.00	1.00	0.50	0.80	15.00	ER	1
19+800	20+000	25.00	1.00	0.50	0.80	25.00	BL	1
20+000	20+200	15.00	1.00	0.50	0.80	15.00	ER	1



## Slope Condition Defect

STAT1	STAT2	SLOPE DEFECT LENGTH	SLOPE DEFECT WIDTH	SLOPE DEFECT DEEP	SLOPE DEFECT W MAX	SLOPE DEFECT AREA	SLOPE DEFECT TOTAL	SLOPE CONDI TION
15+000	15+200	0.00	0.00	0.00	0.00	0.00	NO	0
15+200	15+400	0.00	0.00	0.00	0.00	0.00	NO	0
15+400	15+600	0.00	0.00	0.00	0.00	0.00	NO	0
15+600	15+800	0.00	0.00	0.00	0.00	0.00	NO	0
15+800	15+000	0.00	0.00	0.00	0.00	0.00	NO	0
16+000	16+200	2500.00	200.00	200.00	220.00	50.00	UP	1
16+200	16+400	0.00	0.00	0.00	0.00	0.00	NO	0
16+400	16+600	4736.00	250.00	220.00	230.00	11.84	UP	2
16+600	16+800	0.00	0.00	0.00	0.00	0.00	NO	0
16+800	17+000	0.00	0.00	0.00	0.00	0.00	NO	0
17+000	17+200	0.00	0.00	0.00	0.00	0.00	NO	0
17+200	17+400	0.00	0.00	0.00	0.00	0.00	NO	0
17+400	17+600	0.00	0.00	0.00	0.00	0.00	NO	0
17+600	17+800	4000.00	200.00	200.00	220.00	80.00	UP	2
18+800	18+000	2300.00	180.00	120.00	140.00	41.40	DN	2
18+000	18+200	1500.00	120.00	80.00	90.00	18.00	UP	1
18+200	18+400	1500.00	150.00	120.00	150.00	22.50	DN	0
18+400	18+600	2500.00	130.00	100.00	120.00	32.50	UP	0
18+600	18+800	0.00	0.00	0.00	0.00	0.00	NO	0
18+800	19+000	0.00	0.00	0.00	0.00	0.00	NO	0
19+000	19+200	1500.00	120.00	80.00	100.00	18.00	UP	1
19+200	19+400	15.00	1.00	0.50	0.80	15.00	ER	1
19+400	19+600	1500.00	100.00	100.00	120.00	15.00	UP	1
19+600	19+800	2000.00	100.00	120.00	130.00	20.00	ER	0
19+800	20+000	0.00	0.00	0.00	0.00	0.00	NO	0
20+000	20+200	1500.00	100.00	80.00	100.00	15.00	ER	1

## Road Furniture Defect

STAT1	STAT2	ROAD FURNITURE DEFECT LENGTH	ROAD FURNITURE DEFECT WIDTH	ROAD FURNITURE DEFECT NO	ROAD FURNITURE DEFECT TOTAL	ROAD FURNITURE CONDITION
15+000	15+200	0.00	0.00	0	NO	0
15+200	15+400	0.00	0.00	0	NO	0
15+400	15+600	0.00	0.00	0	NO	0
15+600	15+800	0.00	0.00	0	NO	0
15+800	15+000	0.00	0.00	0	MA	0
16+000	16+200	0.00	0.00	0	MA	0
16+200	16+400	0.00	0.00	0	NO	0
16+400	16+600	0.00	0.00	0	MA	0
16+600	16+800	0.00	0.00	0	MA	0
16+800	17+000	0.00	0.00	0	MA	0
17+000	17+200	0.00	0.00	0	NO	0
17+200	17+400	0.00	0.00	0	NO	0
17+400	17+600	0.00	0.00	0	NO	0
17+600	17+800	150.00	50.00	1	SI	2
18+800	18+000	0.00	0.00	0	NO	0
18+000	18+200	0.00	0.00	0	NO	0
18+200	18+400	0.00	0.00	0	NO	0
18+400	18+600	0.00	0.00	0	NO	0
18+600	18+800	0.00	0.00	0	NO	0
18+800	19+000	0.00	0.00	0	NO	0
19+000	19+200	0.00	0.00	0	NO	0
19+200	19+400	0.00	0.00	0	NO	0
19+400	19+600	0.00	0.00	0	NO	0
19+600	19+800	0.00	0.00	0	NO	0
19+800	20+000	0.00	0.00	0	NO	0
20+000	20+200	0.00	0.00	0	NO	0

## Right of way Condition Defect

STAT1	STAT2	ROW DEFECT LENGTH	ROW DEFECT WIDTH	ROW DEFECT M_WIDTH	ROW DEFECT TOTAL LENGTH	ROW DEFECT TOTAL	ROW CONDITION
15+000	15+200	750.00	250.00	300.00	225.00	SG	1
15+200	15+400	0.00	0.00	0.00	20.00	NO	0
15+400	15+600	0.00	0.00	0.00	0.00	NO	0
15+600	15+800	0.00	0.00	0.00	0.00	NO	0
15+800	15+000	0.00	0.00	0.00	0.00	NO	0
16+000	16+200	0.00	0.00	0.00	0.00	NO	0
16+200	16+400	0.00	0.00	0.00	0.00	NO	0
16+400	16+600	3850.00	200.00	220.00	4000.00	SG	1
16+600	16+800	0.00	0.00	0.00	0.00	NO	0
16+800	17+000	0.00	0.00	0.00	0.00	NO	0
17+000	17+200	0.00	0.00	0.00	0.00	NO	0
17+200	17+400	0.00	0.00	0.00	0.00	NO	0
17+400	17+600	0.00	0.00	0.00	0.00	NO	0
17+600	17+800	4000.00	200.00	220.00	4500.00	LG	1
18+800	18+000	3500.00	230.00	250.00	4000.00	BU	1
18+000	18+200	0.00	0.00	0.00	0.00	NO	0
18+200	18+400	0.00	0.00	0.00	0.00	NO	0
18+400	18+600	4000.00	180.00	200.00	4500.00	LG	1
18+600	18+800	2500.00	150.00	180.00	3000.00	BU	1
18+800	19+000	0.00	0.00	0.00	0.00	NO	0
19+000	19+200	4500.00	120.00	150.00	5000.00	NO	1
19+200	19+400	2500.00	120.00	150.00	33000.00	LG	1
19+400	19+600	4000.00	120.00	150.00	4500.00	LG	1
19+600	19+800	2500.00	100.00	120.00	3000.00	BU	1
19+800	20+000	2500.00	100.00	120.00	3000.00	SG	1
20+000	20+200	4500.00	120.00	150.00	5000.00	SG	1

## Road Element Rating

STAT1	STAT2	PAVE MENT	SHOUL DER	SIDED RAIN	CUL VERT	SLOPE	ROAD FERNITURE	R.O.W
15+000	15+200	1	1	1	1	1	1	1
15+200	15+400	1	1	1	1	1	1	1
15+400	15+600	1	1	1	1	1	1	1
15+600	15+800	1	1	1	1	1	1	1
15+800	15+000	1	1	1	1	1	1	1
16+000	16+200	1	1	1	1	1	1	1
16+200	16+400	1	1	1	1	1	1	1
16+400	16+600	1	1	1	1	1	1	1
16+600	16+800	1	1	1	1	1	1	1
16+800	17+000	1	1	1	1	1	1	1
17+000	17+200	1	1	1	1	1	1	1
17+200	17+400	1	1	1	1	1	1	1
17+400	17+600	1	1	1	1	1	1	1
17+600	17+800	1	1	1	1	1	1	1
18+800	18+000	1	1	1	1	1	1	1
18+000	18+200	1	1	1	1	1	1	1
18+200	18+400	1	1	1	1	1	1	1
18+400	18+600	1	1	1	1	1	1	1
18+600	18+800	1	1	1	1	1	1	1
18+800	19+000	1	1	1	1	1	1	1
19+000	19+200	1	1	1	1	1	1	1
19+200	19+400	1	1	1	1	1	1	1
19+400	19+600	1	1	1	1	1	1	1
19+600	19+800	1	1	1	1	1	1	1
19+800	20+000	1	1	1	1	1	1	1
20+000	20+200	1	1	1	1	1	1	1

## Evaluate of road condition

STAT1	STAT2	ACCESS CONS TRAIINT	ACCESS LEVEL	ROAD CONDITION SURVEY ID	INSPEC DATE	INSPECTOR
15+000	15+200	None	Open all year	1	24/11/2005	Khao
15+200	15+400	None	Open all year	1	24/11/1905	Khao
15+400	15+600	None	Open all year	1	24/11/2005	Khao
15+600	15+800	None	Open all year	1	24/11/2005	Khao
15+800	15+000	None	Open all year	1	24/11/2005	Khao
16+000	16+200	None	Open all year	1	24/11/2005	Khao
16+200	16+400	None	Open all year	1	24/11/2005	Khao
16+400	16+600	None	Open all year	1	24/11/2005	Khao
16+600	16+800	None	Open all year	1	24/11/2005	Khao
16+800	17+000	None	Open all year	1	24/11/2005	Khao
17+000	17+200	None	Open all year	1	24/11/2005	Khao
17+200	17+400	None	Open all year	1	24/11/2005	Khao
17+400	17+600	None	Open all year	1	24/11/2005	Khao
17+600	17+800	None	Open all year	1	24/11/2005	Khao
18+800	18+000	None	Open all year	1	24/11/2005	Khao
18+000	18+200	None	Open all year	1	24/11/2005	Khao
18+200	18+400	None	Open all year	1	24/11/2005	Khao
18+400	18+600	None	Open all year	1	24/11/2005	Khao
18+600	18+800	None	Open all year	1	24/11/2005	Khao
18+800	19+000	None	Open all year	1	24/11/2005	Khao
19+000	19+200	None	Open all year	1	24/11/2005	Khao
19+200	19+400	None	Open all year	1	24/11/2005	Khao
19+400	19+600	None	Open all year	1	24/11/2005	Khao
19+600	19+800	None	Open all year	1	24/11/2005	Khao
19+800	20+000	None	Open all year	1	24/11/2005	Khao
20+000	20+200	None	Open all year	1	24/11/2005	Khao



## Appendix C

### Bridge.vbs

```

Option Explicit

Dim ObjectForm
Dim intPlotID
Dim intElementID
Dim blnEditCondition
Dim blnEditElement2Load
Dim blnEditPhotos2Load
Dim blnEditPhotos3Load
Dim intPhotosID
Dim blnEditElementPhotos

Dim strDataPath

    strDataPath=Application.Properties("Datapath")

Sub BridgeOnLoad

    Set ObjectForm = ThisEvent.Object

    Dim ctls1
    Set ctls1 = ObjectForm.Pages("pgBI1").Controls

    Dim ctls2
    Set ctls2 = ObjectForm.Pages("pgBI2").Controls

        ctls1("txtID").Enabled = False
        ctls1("txtBridgeID").Enabled = False

    If ObjectForm.Mode=3 Then
    Dim rsBridgeSurvey

        Set rsBridgeSurvey= Layer.Records

        ctls1("txtBridgeID").Value = NextObjectID(rsBridgeSurvey,
"BridgeID")
        ctls1("txtID").Value = ctls1("txtBridgeID").Value

    End If

    intPlotID = ctls1("txtID").Value
    ctls2("cboBailey").Enabled = False

    Set ctls1= Nothing
    Set ctls2= Nothing

End Sub

Sub CboBaileySelect

    Dim ctls

    Set ctls = Layer.Forms("EditForm").Pages("pgBI2").Controls

    If (ctls("cboBridgeType").ListIndex = 5) Then

```

```

        ctls("cboBailey").Enabled =True
    Else
        ctls("cboBailey").ListIndex =-1
        ctls("cboBailey").Enabled =False
    End If

    Set ctls = Nothing

End Sub

Sub pgBridgeConditionOnActive

Dim ctls1
    Set ctls1 = ObjectForm.Pages("pgBI1").Controls

    Dim ctls
    Set ctls = ObjectForm.Pages("pgBridgeCondition").Controls

    ctls("lblRoadID").Value = ctls1("txtRoadID").Value
    ctls("lblLinkID").Value = ctls1("txtLinkID").Value
    ctls("lblBridgeID").Value = ctls1("txtBridgeID").Value
    ctls("lblStat1").Value = ctls1("txtStat1").Value

    Set ctls1 = Nothing
    Set ctls = Nothing

End Sub

*****BridgeCondition*****

Sub OnElementConditionActive

Dim ctlsElement

    Set ctlsElement =

Layer.Forms("EditForm").Pages("pgElementCondition").Controls

    ctlsElement("lstElement").Clear

If Not FileExists ("tabBridgeCondition.dbf") Then

Exit Sub

End If

    Dim strElement
        strElement = strDataPath +
"\ExternalTables\tabBridgeCondition.dbf"
    Dim rsElement
        Set rsElement = Application.CreateAppObject("Recordset")
        rsElement.open strElement, 1

    Dim strSearch
    strSearch = "[PlotID] = " + Cstr(intPlotID)

    ctlsElement("lstElement").AddItemsFromTable strElement,
"ElementID", "Name", strSearch
    ctlsElement("lstElement").Enabled =True

```

```

rsElement.Close
Set ctlElement = Nothing

Set rsElement = Nothing

End Sub

Sub AddElement

    blnEditCondition = False
    intElementID = NextID("tabBridgeCondition.dbf", "ElementID")

Dim ElementForm

    Set ElementForm = Layer.Forms("frmEditCondition")
    ElementForm.Show

End Sub

Sub DeleteElement

Dim ctlElement
    Set ctlElement =
Layer.Forms("EditForm").Pages("pgElementCondition").Controls("lstElement")

    If (ctlElement.ListIndex <> -1) Then

        If Not FileExists ("tabBridgeCondition.dbf") Then
            Exit Sub
        End If

        Dim strElement
            strElement = strDataPath +
"\ExternalTables\tabBridgeCondition.dbf"
        Dim rsElement
            Set rsElement = Application.CreateAppObject("Recordset")
            rsElement.Open strElement, 2

        Dim strSearch
            strSearch = "[ElementID] = " + cstr(ctlElement.Value)

        If (rsElement.Find(strSearch) <> 0) Then

            rsElement.Delete
            rsElement.Update
            rsElement.Pack

        End If

        rsElement.Close

        Set rsElement = Nothing

        Layer.Forms("EditForm").Pages("pgElementCondition").Activate

    Else

        MsgBox "Please select element to delete !" , , "Delete bridge
element"

```

```

    End If

    Set ctlsElement = Nothing

End Sub

Sub AddElementActive

    If Not FileExists ("tblBridgeElement.dbf") Then
Exit Sub
    End If

    If Not FileExists ("tblElementCR.dbf") Then
Exit Sub
    End If

If blnEditElement2Load Then
    blnEditElement2Load = False

Dim ctls

    Set ctls =
Layer.Forms("frmEditCondition").Pages("pgEditCondition").Controls

ctls("lblRoadID").Value =
Layer.Forms("EditForm").Pages("pgBridgeCondition").Controls("lblRoadI
D").Value
ctls("lblLinkID").Value =
Layer.Forms("EditForm").Pages("pgBridgeCondition").Controls("lblLinkI
D").Value
ctls("lblBridgeID").Value =
Layer.Forms("EditForm").Pages("pgBridgeCondition").Controls("lblBridg
eID").Value
ctls("lblBCSurveyID").Value =
Layer.Forms("EditForm").Pages("pgBridgeCondition").Controls("cboBCSur
veyID").Value

ctls("cboElement").AddItemsFromTable strDataPath +
"\ExternalTables\tblBridgeElement.dbf", "BELEMENT", "NAME"
ctls("cboElementCR").AddItemsFromTable strDataPath +
"\ExternalTables\tblElementCR.dbf", "CODE", "DESCRIPT"

ctls("txtQuantity").Value = ""
ctls("txtDescr").Value = ""

If blnEditCondition Then

    Dim strSearch
    strSearch = "[ElementID]=" + intElementID

    If Not FileExists ("tabBridgeCondition.dbf") Then
Exit Sub
    End If

    Dim strElement
    strElement = strDataPath +
"\ExternalTables\tabBridgeCondition.dbf"

    Dim rsElement

```

```

Set rsElement = Application.CreateAppObject("Recordset")
rsElement.open strElement, 2

    If (rsElement.Find(strSearch)<>0) Then

        ctls("cboElement").Listindex = CboIndex(ctls("cboElement"),
rsElement.Fields("BElement").Value)
        ctls("cboElementCR").Listindex =
CboIndex(ctls("cboElementCR"), rsElement.Fields("CR").Value)
        ctls("txtDescr").Value = rsElement.Fields("Descr").Value
        ctls("txtQuantity").Value =
rsElement.Fields("Quantity").Value

            If rsElement.Fields("SI").Value = 1 Then
                ctls("ChkSI").Value = True
            Else
                ctls("ChkSI").Value = False
            End If

            If rsElement.Fields("Repl").Value = 1 Then
                ctls("ChkRepl").Value = True
                ctls("txtQuantity").Enabled = True
            Else
                ctls("ChkRepl").Value = False
                ctls("txtQuantity").Enabled = False
            End If

            End If

            rsElement.Close
            Set rsElement = Nothing

Else

    ctls("cboElement").Listindex = -1
    ctls("cboElementCR").Listindex = -1
    ctls("txtDescr").Value = ""
    ctls("txtQuantity").Value = ""
    ctls("ChkSI").Value = False
    ctls("ChkRepl").Value = False
    ctls("txtQuantity").Enabled = False

End If

Set ctls = Nothing

End If

End Sub

Sub chkReplClick

Dim ctls

    Set ctls =
Layer.Forms("frmEditCondition").Pages("pgEditCondition").Controls

    If ctls("chkRepl").Value = True Then
        ctls("txtQuantity").Enabled = True

    Else

```

```

        ctls("txtQuantity").Enabled = False
        ctls("txtQuantity").Value = ""

End If

Set ctls = Nothing

End Sub

Sub AddElementOnOK

If Not FileExists ("tabBridgeCondition.dbf") Then
    Exit Sub
End If

Dim strElement
    strElement = strDataPath +
"\ExternalTables\tabBridgeCondition.dbf"

Dim rsElement
    Set rsElement = Application.CreateAppObject("Recordset")
    rsElement.open strElement, 2

Dim ctls
    Set ctls =
Layer.Forms("frmEditCondition").Pages("pgEditCondition").Controls

If Not blnEditCondition Then

    rsElement.AddNew
    rsElement.Fields("BCDate").Value = Now()
    rsElement.Fields("Name").Value = "...Bridge element not choose
..."
Else

    Dim strSearch
    strSearch = "[ElementID] = " + cstr(intElementID)

    If (rsElement.Find(strSearch)=0) Then
        MsgBox "Can not find to edit..", , "Edit bridge
element.."
        Exit Sub
    End If
End If

rsElement.Fields("PlotID").Value = cint(intPlotID)
rsElement.Fields("RoadID").Value = ctls("lblRoadID").Value
rsElement.Fields("LinkID").Value = ctls("lblLinkID").Value
rsElement.Fields("BCSurveyID").Value = ctls("lblBCSurveyID").Value
rsElement.Fields("BridgeID").Value = ctls("lblBridgeID").Value

If (ctls("cboElement").ListIndex<>-1) Then
rsElement.Fields("BElement").Value =ctls("cboElement").Value
rsElement.Fields("Name").Value = ctls("cboElement").Value + " " +
ctls("cboElement").Text
End If

rsElement.Fields("CR").Value =ctls("cboElementCR").Value

If ctls("chkSI").Value = True Then
    rsElement.Fields("SI").Value = 1

```

```

Else
    rsElement.Fields("SI").Value = 0
End If

If ctls("chkRepl").Value = True Then
    rsElement.Fields("Repl").Value = 1
Else
    rsElement.Fields("Repl").Value = 0
End If

rsElement.Fields("ElementID").Value = cint(intElementID)
rsElement.Fields("Descr").Value = ctls("txtDescr").Value
rsElement.Fields("Quantity").Value = ctls("txtQuantity").Value

rsElement.Update
rsElement.Close

Set rsElement = Nothing

Set ctls = Nothing

blnEditCondition = False

Layer.Forms("EditForm").Pages("pgElementCondition").Activate

End Sub

Sub EditElement

Dim ctlsElement
    Set ctlsElement =
Layer.Forms("EditForm").Pages("pgElementCondition").Controls("lstElement")

If (ctlsElement.ListIndex <> -1) Then
    blnEditCondition = True

    intElementID = ctlsElement.Value

    Dim ElementForm
    Set ElementForm = Layer.Forms("frmEditCondition")
    ElementForm.Show

Else

    MsgBox "Please select bridge element to edit..", , "Edit bridge element condition"

End If

Layer.Forms("EditForm").Pages("pgElementCondition").Activate

End Sub

'*****AddElementPhotos*****

Sub AddElement2OnLoad
    blnEditElement2Load = True
End Sub

```

```

Sub OnElementPhotosActive

Dim ctlsPhotos

    Set ctlsPhotos =

Layer.Forms("frmEditCondition").Pages("pgEditPhotos").Controls

    ctlsPhotos("lstElementPhotos").Clear

If Not FileExists("tabBridgePhotos.dbf") Then

    Exit Sub

End If

    Dim strPhotos

        strPhotos = strDataPath +
"\ExternalTables\tabBridgePhotos.dbf"

    Dim rsPhotos

        Set rsPhotos = Application.CreateAppObject("Recordset")
        rsPhotos.Open strPhotos, 1

    Dim strSearch
    strSearch = "[ElementID] = " + Cstr(intElementID)

    ctlsPhotos("lstElementPhotos").AddItemsFromTable strPhotos,
"PhotosID", "Name", strSearch

    ctlsPhotos("lstElementPhotos").Enabled = True
    rsPhotos.Close

    Set ctlsPhotos = Nothing

    Set rsPhotos = Nothing

End Sub

Sub AddPhotos

    blnEditElementPhotos = False
    intPhotosID = NextID("tabBridgePhotos.dbf", "PhotosID")

Dim PhotosForm

    Set PhotosForm = Layer.Forms("frmAddElementPhotos")
    PhotosForm.Show

End Sub

Sub AddPhotos2OnLoad
    blnEditPhotos2Load = True
End Sub

Sub AddPhotos3OnLoad
    blnEditPhotos3Load = True
End Sub

```



```

Sub DeletePhotos

Dim ctlsPhotos

    Set ctlsPhotos =

Layer.Forms("frmEditCondition").Pages("pgEditPhotos").Controls("lstElementPhotos")

    If (ctlsPhotos.ListIndex<>-1) Then

        If Not FileExists ("tabBridgePhotos.dbf") Then

            Exit Sub

        End If

        Dim strPhotos
            strPhotos = strDataPath +
"\ExternalTables\tabBridgePhotos.dbf"

        Dim rsPhotos

            Set rsPhotos = Application.CreateAppObject("Recordset")
            rsPhotos.Open strPhotos, 2

        Dim strSearch
            strSearch = "[PhotosID] = " + cstr(ctlsPhotos.Value)

        If (rsPhotos.Find(strSearch)<>0) Then

            rsPhotos.Delete
            rsPhotos.Update
            rsPhotos.Pack

        End If

        rsPhotos.Close

        Set rsPhotos = Nothing

        Layer.Forms("frmEditCondition").Pages("pgEditPhotos").Activate

        Else

            MsgBox "Please select photos to delete !" , , "Delete Photos"

            End If

            Set ctlsPhotos = Nothing

End Sub

Sub AddPhotosActive

If blnEditPhotos2Load Then
    blnEditPhotos2Load = False

Dim ctls

    Set ctls =

```

```

Layer.Forms("frmAddElementPhotos").Pages("pgAddElementPhotos").Controls
ls

ctls("lblRoadID").Value =
Layer.Forms("frmEditCondition").Pages("pgEditCondition").Controls("lbl
RoadID").Value
ctls("lblLinkID").Value =
Layer.Forms("frmEditCondition").Pages("pgEditCondition").Controls("lb
lLinkID").Value
ctls("lblBridgeID").Value =
Layer.Forms("frmEditCondition").Pages("pgEditCondition").Controls("lb
lBridgeID").Value
ctls("lblBCSurveyID").Value =
Layer.Forms("frmEditCondition").Pages("pgEditCondition").Controls("lb
lBCSurveyID").Value

ctls("txtPhotosID").Value = intPhotosID
ctls("txtPhotosID").Enabled = False

If blnEditElementPhotos Then

    Dim strSearch
    strSearch = "[PhotosID]=" + intPhotosID

    If Not FileExists("tabBridgePhotos.dbf") Then
Exit Sub
    End If

    Dim strPhotos

    strPhotos = strDataPath +
"\ExternalTables\tabBridgePhotos.dbf"

    Dim rsPhotos

    Set rsPhotos = Application.CreateAppObject("Recordset")
rsPhotos.open strPhotos, 2

    If (rsPhotos.Find(strSearch) <> 0) Then

        ctls("cboDirection").Listindex =
CboIndex(ctls("cboDirection"), rsPhotos.Fields("Direction").Value)
        ctls("txtTopic").Value = rsPhotos.Fields("Topic").Value
        ctls("txtPhotos").Value = rsPhotos.Fields("Photos").Value

    End If

    rsPhotos.Close
    Set rsPhotos = Nothing

Else

    ctls("cboDirection").Listindex = -1
    ctls("txtTopic").Value = ""
    ctls("txtPhotos").Value = ""

End If

Set ctls = Nothing
End If

```

```

End Sub

Sub AddPhotosOnOK

If Not FileExists ("tabBridgePhotos.dbf") Then
    Exit Sub
End If

Dim strPhotos
    strPhotos = strDataPath + "\ExternalTables\tabBridgePhotos.dbf"
Dim rsPhotos
    Set rsPhotos = Application.CreateAppObject("Recordset")
    rsPhotos.open strPhotos, 2

Dim ctls
    Set ctls =
Layer.Forms("frmAddElementPhotos").Pages("pgAddElementPhotos").Controls

If Not blnEditElementPhotos Then

    rsPhotos.AddNew
    rsPhotos.Fields("BCDate").Value = Now()
    rsPhotos.Fields("Name").Value = "...Photos direction not select
    ..."
Else

    Dim strSearch
    strSearch = "[PhotosID] = " + cstr(intPhotosID)

    If (rsPhotos.Find(strSearch)=0) Then
        msgbox "Can not find to edit..", , "Edit bridge
element photos.."
        Exit Sub
    End If
End If

rsPhotos.Fields("ElementID").Value = cint(intElementID)
rsPhotos.Fields("RoadID").Value = ctls("lblRoadID").Value
rsPhotos.Fields("LinkID").Value = ctls("lblLinkID").Value
rsPhotos.Fields("BCSurveyID").Value = ctls("lblBCSurveyID").Value
rsPhotos.Fields("BridgeID").Value = ctls("lblBridgeID").Value

If (ctls("cboDirection").ListIndex<>-1) Then
rsPhotos.Fields("Direction").Value =ctls("cboDirection").Value
rsPhotos.Fields("Name").Value = cstr(intPhotosID) + " " +
ctls("txtTopic").Value + " " + ctls("cboDirection").Text
End If

rsPhotos.Fields("PhotosID").Value =cint(intPhotosID)
rsPhotos.Fields("Topic").Value =ctls("txtTopic").Value
rsPhotos.Fields("Photos").Value =ctls("txtPhotos").Value

rsPhotos.Update
rsPhotos.Close

Set rsPhotos = Nothing
Set ctls = Nothing

blnEditElementPhotos = False

```

```

Layer.Forms("frmEditCondition").Pages("pgEditPhotos").Activate

End Sub

Sub EditPhotos

Dim ctlsPhotos
    Set ctlsPhotos =
Layer.Forms("frmEditCondition").Pages("pgEditPhotos").Controls("lstEl
ementPhotos")

If (ctlsPhotos.ListIndex<>-1) Then
    blnEditElementPhotos = True

    intPhotosID = ctlsPhotos.Value

    Dim PhotosForm
    Set PhotosForm = Layer.Forms("frmAddElementPhotos")
    PhotosForm.Show

Else

    MsgBox "Please select photos to edit.." , , "Edit bridge photos"

End If

Layer.Forms("frmEditCondition").Pages("pgEditPhotos").Activate

End Sub

Sub AddPhotosPage2Active

If blnEditPhotos3Load Then
    blnEditPhotos3Load = False
    If blnEditElementPhotos Then
        Dim ctlsPhotos
        Set ctlsPhotos =
Layer.Forms("frmAddElementPhotos").Pages("pgAddElementPhotos").Contro
ls
        Dim ctlsPhotos2
        Set ctlsPhotos2 =
Layer.Forms("frmAddElementPhotos").Pages("pgElementImage").Controls
        ctlsPhotos2("Image").Value =
ctlsPhotos("txtPhotos").Value
    End If
    Set ctlsPhotos =Nothing
    Set ctlsPhotos2 =Nothing

End If

End Sub

Sub SelectElementPhotos

Dim strFilter
Dim strTitle
Dim lngFlags
Dim strResult

strFilter = "jpg Files|*.jpg|bmps Files|*.bmp"

```

```

strTitle = "Select Admin photo files"
lngFlags = &H1000
strResult = CommonDialog.ShowOpen(,strFilter,strTitle,lngFlags)

Dim ctlstxt
    Set ctlstxt =
Layer.Forms("frmAddElementPhotos").Pages("pgAddElementPhotos").Controls
Dim ctlsphotos
    Set ctlsphotos =
Layer.Forms("frmAddElementPhotos").Pages("pgElementImage").Controls

If Not IsEmpty(strResult) Then
    ctlstxt("txtPhotos").Value = strResult
    ctlsphotos("Image").Value = strResult
Else
    Exit Sub
End If

Set ctlsphotos= Nothing
Set ctlstxt = Nothing

End Sub

Sub SelectBridgePhotos

Dim strFilter
Dim strTitle
Dim lngFlags
Dim strResult

strFilter = "bmps Files|*.bmp|jpg Files|*.jpg"
strTitle = "Select Admin photo files"
lngFlags = &H1000
strResult = CommonDialog.ShowOpen(,strFilter,strTitle,lngFlags)

Dim ctlstxt

    Set ctlstxt = Layer.Forms("EditForm").Pages("pgBI5").Controls

Dim ctlsphotos

    Set ctlsphotos =

Layer.Forms("EditForm").Pages("pgBI6").Controls

If Not IsEmpty(strResult) Then

    ctlstxt("txtPhotos").Value = strResult
    ctlsphotos("Image").Value = strResult

Else

    ctlstxt("txtPhotos").Value = ""
    ctlsphotos("Image").Value= Nothing

    Exit Sub

End If

Set ctlsphotos= Nothing

```

```

Set ctlstxt = Nothing

End Sub

'*****Function*****
Public Function FileExists(strFileName)
Dim blnExists
blnExists = True

Dim strFile
Set strFile = Application.CreateAppObject("File")
blnExists = strFile.Exists(strDataPath + "\ExternalTables\" +
strFileName)
If Not blnExists Then
    Dim strMsg
    strMsg = " Could not find: " + strFileName + vbCrLf
    strMsg = strMsg + "Please insert this file in the ExternalTables
folder."
    msgbox strMsg, , "Error finding file"
End If
FileExists = blnExists

End Function

Public Function NextID(strTable, strField)
Dim CurrRecord

If Not FileExists(strTable) Then
Exit Function
End If

Dim rs

Set rs= Application.CreateAppObject("Recordset")
rs.Open strDataPath + "\ExternalTables\"+ strTable, 1

If rs.RecordCount=0 Then

    NextID = 1
    Exit Function
End If

If rs.RecordCount>0 Then

    rs.MoveFirst
    On Error Resume Next

    While Not rs.EOF
        If Cint(CurrRecord)< Cint(rs.Fields(strField).Value) Then
            CurrRecord=rs.Fields(strField).Value
        End If
        rs.MoveNext
    Wend
End If

Set rs = Nothing
CurrRecord = Cint(CurrRecord) + 1
NextID = CurrRecord

```

```
End Function
```

```
Public Function NextObjectID(objRS, strField)  
Dim CurrRecord
```

```
If objRS.RecordCount=0 Then
```

```
    NextObjectID=1
```

```
    Exit Function
```

```
End If
```

```
CurrRecord = 0
```

```
If objRS.RecordCount>0 Then
```

```
    objRS.MoveFirst
```

```
    On Error Resume Next
```

```
    While Not objRS.EOF
```

```
        If Cint(CurrRecord) < Cint(objRS.Fields(strField).Value) Then
```

```
            CurrRecord=objRS.Fields(strField).Value
```

```
        End If
```

```
        objRS.MoveNext
```

```
    Wend
```

```
End If
```

```
Set objRS = Nothing
```

```
CurrRecord = Cint(CurrRecord) + 1
```

```
NextObjectID = CurrRecord
```

```
End Function
```

```
Public Function CboIndex(CboBox, Value)
```

```
Dim index
```

```
index = -1
```

```
Dim i
```

```
For i=0 To CboBox.ListCount-1
```

```
    CboBox.ListIndex = i
```

```
    If cstr(CboBox.Value)=cstr(Value) Then
```

```
        index=CboBox.ListIndex
```

```
    End If
```

```
Next
```

```
CboIndex = index
```

```
End Function
```

## Road Inventory.vbs

```

Option Explicit

Dim ObjectForm

Dim strDataPath
  strDataPath=Application.Properties("Datapath")

Sub RoadInventoryOnLoad

  Set ObjectForm = ThisEvent.Object

  Dim ctls
  Set ctls = ObjectForm.Pages("pgRoadInventory").Controls

  ctls("txtID").Enabled = False
  ctls("txtSegmentID").Enabled = False

  If ObjectForm.Mode=3 Then
  Dim rsRoadCondition
  Set rsRoadCondition = Layer.Records
  ctls("txtSegmentID").Value = NextObjectID(rsRoadCondition,
"SegmentID")
  ctls("txtID").Value = ctls("txtSegmentID").Value

  End If

  Dim ctls1
  Set ctls1 = Layer.Forms("EditForm").Pages("pgLRP").Controls

  ctls1("cboLRP1").AddItemsFromTable strDataPath +
"\pointfeature.dbf", "PFID", "PFID"
  ctls1("cboLRP2").AddItemsFromTable strDataPath +
"\pointfeature.dbf", "PFID", "PFID"

  Set ctls1 = Nothing
  Set ctls = Nothing

End Sub

'*****Function*****
Public Function FileExists(strFileName)
Dim blnExists
blnExists = True

Dim strFile
Set strFile = Application.CreateAppObject("File")
blnExists = strFile.Exists(strDataPath + "\ExternalTables\" +
strFileName)
If Not blnExists Then
  Dim strMsg
  strMsg = " Could not find: " + strFileName + vbCrLf
  strMsg = strMsg + "Please insert this file in the ExternalTables
folder."
  msgbox strMsg, , "Error finding file"
End If
FileExists = blnExists

End Function

```



```

Public Function NextID(strTable, strField)
Dim CurrRecord

If Not FileExists(strTable) Then
Exit Function
End If

Dim rs

Set rs= Application.CreateAppObject("Recordset")
rs.Open strDataPath + "\ExternalTables\"+ strTable, 1

If rs.RecordCount=0 Then

    NextID = 1
    Exit Function
End If

If rs.RecordCount>0 Then

    rs.MoveFirst
    On Error Resume Next

    While Not rs.EOF
        If Cint(CurrRecord)< Cint(rs.Fields(strField).Value) Then
            CurrRecord=rs.Fields(strField).Value
        End If
        rs.MoveNext
    Wend
End If

Set rs = Nothing
CurrRecord = Cint(CurrRecord) + 1
NextID = CurrRecord

End Function

Public Function NextObjectID(objRS, strField)
Dim CurrRecord

If objRS.RecordCount=0 Then

    NextObjectID=1
    Exit Function
End If

CurrRecord = 0

If objRS.RecordCount>0 Then

    objRS.MoveFirst
    On Error Resume Next

    While Not objRS.EOF
        If Cint(CurrRecord)< Cint(objRS.Fields(strField).Value) Then
            CurrRecord=objRS.Fields(strField).Value
        End If
        objRS.MoveNext
    
```

```
Wend
End If

Set objRS = Nothing
CurrRecord = Cint(CurrRecord) + 1
NextObjectID = CurrRecord

End Function

Public Function CboIndex(CboBox, Value)
Dim index
index = -1

Dim i
For i=0 To CboBox.ListCount-1
    CboBox.ListIndex = i
    If cstr(CboBox.Value)=cstr(Value) Then
        index=CboBox.ListIndex
    End If
Next
CboIndex = index

End Function
```

## Road Condition.vbs

```

Option Explicit

Dim ObjectForm
Dim intPhotosID
Dim intSegmentID
Dim blnEditRElementPhotos
Dim blnRC2Load
Dim blnRC3Load
Dim strDataPath
    strDataPath=Application.Properties("Datapath")

Sub RoadConditionOnLoad

    Set ObjectForm = ThisEvent.Object

    Dim ctls
    Set ctls = ObjectForm.Pages("pgRoadCondition").Controls

        ctls("txtID").Enabled = False
        ctls("txtSegmentID").Enabled = False

    If ObjectForm.Mode=3 Then
    Dim rsRoadCondition
        Set rsRoadCondition = Layer.Records
        ctls("txtSegmentID").Value = NextObjectID(rsRoadCondition,
"SegmentID")
        ctls("txtID").Value = ctls("txtSegmentID").Value

    End If

    intSegmentID = ctls("txtSegmentID").Value

    Set ctls = Nothing

End Sub

Sub CalDefectArea
Dim A1,A2,A3,A4,A5,A6
Dim D1,D3,D4,D5

Dim ctls1
    Set ctls1 = Layer.Forms("EditForm").Pages("pgBleeding").Controls
Dim ctls2
    Set ctls2 = Layer.Forms("EditForm").Pages("pgPatching").Controls
Dim ctls3
    Set ctls3 =
Layer.Forms("EditForm").Pages("pgRevelling").Controls
Dim ctls4
    Set ctls4 = Layer.Forms("EditForm").Pages("pgCracking").Controls
Dim ctls5
    Set ctls5 =
Layer.Forms("EditForm").Pages("pgPotholing").Controls
Dim ctls6
    Set ctls6 =
Layer.Forms("EditForm").Pages("pgDisintegration").Controls

A1 = ctls1("txtBleedArea").Value
A2 = ctls2("txtPatchArea").Value

```

```

A3 = ctls3("txtRevellingArea").Value
A4 = ctls4("txtCrackArea").Value
A5 = ctls5("txtPothArea").Value
A6 = ctls6("txtDisArea").Value

D1 = ctls1("txtBLEED_D").Value
D3 = ctls3("txtRevWidth").Value
D4 = ctls4("txtCrackWidth").Value
D5 = ctls5("txtPothWidth").Value

Dim MNArea
Dim MJArea
MNArea = 0
MJArea = 0

If (IsNumeric(D1)) Then
    If D1 < 1 Then
        MNArea = MNArea + A1
    Else
        MNArea = MNArea
    End If
Else
    MsgBox "Insert numeric data",, "Error data input"
    Exit Sub
End If

If (IsNumeric(A2)) Then
    MNArea = MNArea + A2
Else
    MsgBox "Insert numeric data",, "Error data input"
    Exit Sub
End If

If (IsNumeric(D3)) Then
    If D3 < 2 Then
        MNArea = MNArea + A3
    Else
        MNArea = MNArea
        MJArea = MJArea + A3
    End If
Else
    MsgBox "Insert numeric data",, "Error data input"
    Exit Sub
End If

If (IsNumeric(D4)) Then
    If D4 < 3 Then
        MNArea = MNArea + A4
    Else
        MNArea = MNArea
        MJArea = MJArea + A4
    End If
Else
    MsgBox "Insert numeric data",, "Error data input"
    Exit Sub
End If

If (IsNumeric(D5)) Then
    If D5 >= 75 Then
        MJArea = MJArea + A5
    Else

```

```

        MJArea = MJArea
    End If
Else
    msgbox "Insert numeric data",,"Error data input"
    Exit Sub
End If

If (IsNumeric(A6)) Then
    MJArea = MJArea + A6
Else
    msgbox "Insert numeric data",,"Error data input"
    Exit Sub
End If

Dim ctls
    Set ctls =
Layer.Forms("EditForm").Pages("pgPavementCondition").Controls

ctls("txtMNArea").Value = Cstr(MNArea)
ctls("txtMJArea").Value = Cstr(MJArea)

Set ctls = Nothing
Set ctls1 = Nothing
Set ctls2 = Nothing
Set ctls3 = Nothing
Set ctls4 = Nothing
Set ctls5 = Nothing
Set ctls6 = Nothing

End Sub

Sub CalArea
Dim ctls
    Set ctls =
Layer.Forms("EditForm").Pages("pgPavementCondition").Controls
Dim MNArea
    MNArea = Cdbl(ctls("txtMNArea").Value)
Dim MJArea
    MJArea = Cdbl(ctls("txtMJArea").Value)

Dim TotalArea
    If (ctls("txtTotalArea").Value = "") Then
        Exit Sub
    End If
    If (ctls("txtTotalArea").Value = 0) Then
        Exit Sub
    Else
        TotalArea = Cdbl(ctls("txtTotalArea").Value)
ctls("lblMNArea").Value = Cstr(Round((MNArea/TotalArea)*100,0))
ctls("lblMJArea").Value = Cstr(Round((MJArea/TotalArea)*100,0))
    End If

Set ctls = Nothing

End Sub

'*****AddRElementPhotos*****

Sub RoadPhotosActive

Dim ctlsPhotos

```

```

    Set ctlsPhotos =
Layer.Forms("EditForm").Pages("pgRoadPhotos").Controls

    ctlsPhotos("lstRElementPhotos").Clear

If Not FileExists ("tabRoadPhotos.dbf") Then
    Exit Sub
End If

Dim strPhotos
    strPhotos = strDataPath + "\ExternalTables\tabRoadPhotos.dbf"
Dim rsPhotos
    Set rsPhotos = Application.CreateAppObject("Recordset")
    rsPhotos.Open strPhotos, 1

Dim strSearch
strSearch = "[SegmentID] = " + Cstr(intSegmentID)

    ctlsPhotos("lstRElementPhotos").AddItemsFromTable strPhotos,
"PhotosID", "Name", strSearch

    ctlsPhotos("lstRElementPhotos").Enabled =True
    rsPhotos.Close
    Set ctlsPhotos = Nothing
    Set rsPhotos = Nothing
End Sub

Sub AddPhotos

    blnEditRElementPhotos = False
    intPhotosID = NextID("tabRoadPhotos.dbf", "PhotosID")

Dim PhotosForm
    Set PhotosForm = Layer.Forms("frmAddRElementPhotos")
    PhotosForm.Show

End Sub

Sub RC2Load
    blnRC2Load = True
End Sub

Sub RC3Load
    blnRC3Load = True
End Sub

Sub DeletePhotos

Dim ctlsPhotos
    Set ctlsPhotos =
Layer.Forms("EditForm").Pages("pgRoadPhotos").Controls("lstRElement Ph
otos")

    If (ctlsPhotos.ListIndex<>-1) Then

        If Not FileExists ("tabRoadPhotos.dbf") Then
            Exit Sub
        End If

        Dim strPhotos
            strPhotos = strDataPath + "\ExternalTables\tabRoadPhotos.dbf"

```

```

Dim rsPhotos
    Set rsPhotos = Application.CreateAppObject("Recordset")
    rsPhotos.Open strPhotos, 2

Dim strSearch
    strSearch = "[PhotosID] = " + cstr(ctlsPhotos.Value)

If (rsPhotos.Find(strSearch)<>0) Then

    rsPhotos.Delete
    rsPhotos.Update
    rsPhotos.Pack

End If

rsPhotos.Close
Set rsPhotos = Nothing

Layer.Forms("EditForm").Pages("pgRoadPhotos").Activate

Else

    MsgBox "Please select photos to delete !" , , "Delete Photos"

    End If

    Set ctlsPhotos = Nothing

End Sub

Sub AddPhotosActive

If blnRC2Load Then
    blnRC2Load = False

Dim ctls
    Set ctls =
Layer.Forms("frmAddRElementPhotos").Pages("pgAddRElementPhotos").Cont
rols

ctls("lblRoadID").Value =
Layer.Forms("EditForm").Pages("pgRoadCondition").Controls("txtRoadID"
).Value
ctls("lblLinkID").Value =
Layer.Forms("EditForm").Pages("pgRoadCondition").Controls("txtLinkID"
).Value
ctls("lblSegmentID").Value =
Layer.Forms("EditForm").Pages("pgRoadCondition").Controls("txtSegment
ID").Value
ctls("lblRCSurveyID").Value =
Layer.Forms("EditForm").Pages("pgRoadCondition").Controls("cboRCSurve
yID").Value

ctls("txtPhotosID").Value = intPhotosID
ctls("txtPhotosID").Enabled = False

If blnEditRElementPhotos Then

    Dim strSearch
    strSearch = "[PhotosID]=" + intPhotosID

```

```

        If Not FileExists ("tabRoadPhotos.dbf") Then
Exit Sub
        End If

        Dim strPhotos
strPhotos = strDataPath + "\ExternalTables\tabRoadPhotos.dbf"
        Dim rsPhotos
Set rsPhotos = Application.CreateAppObject("Recordset")
rsPhotos.open strPhotos, 2
        If (rsPhotos.Find(strSearch)<>0) Then

            ctls("cboDirection").Listindex =
CboIndex(ctls("cboDirection"), rsPhotos.Fields("Direction").Value)
            ctls("txtTopic").Value = rsPhotos.Fields("Topic").Value
            ctls("txtPhotos").Value = rsPhotos.Fields("Photos").Value

        End If

        rsPhotos.Close
        Set rsPhotos = Nothing

Else

        ctls("cboRElement").Listindex = -1
        ctls("cboDirection").Listindex = -1
        ctls("txtTopic").Value = ""
        ctls("txtPhotos").Value = ""

End If

Set ctls = Nothing

End If

End Sub

Sub AddPhotos2Active

If blnRC3Load Then
    blnRC3Load = False
    If blnEditRElementPhotos Then

        Dim ctlstxt
            Set ctlstxt =
Layer.Forms("frmAddRElementPhotos").Pages("pgAddRElementphotos").Cont
rols
        Dim ctlsImage
            Set ctlsImage =
Layer.Forms("frmAddRElementPhotos").Pages("pgImage").Controls
            ctlsImage("Image").Value = ctlstxt("txtPhotos").Value
        End If

Set ctlsImage = Nothing
Set ctlstxt = Nothing

End If

End Sub

Sub AddPhotosOnOK

```



```

If Not FileExists ("tabRoadPhotos.dbf") Then
    Exit Sub
End If

Dim strPhotos
    strPhotos = strDataPath + "\ExternalTables\tabRoadPhotos.dbf"
Dim rsPhotos
    Set rsPhotos = Application.CreateAppObject("Recordset")
    rsPhotos.open strPhotos, 2

Dim ctls
    Set ctls =
Layer.Forms("frmAddRElementPhotos").Pages("pgAddRElementPhotos").Cont
rols

If Not blnEditRElementPhotos Then

    rsPhotos.AddNew
    rsPhotos.Fields("RCDate").Value = Now()
    rsPhotos.Fields("Name").Value = "...Road element not select ..."
Else

    Dim strSearch
    strSearch = "[PhotosID] = " + cstr(intPhotosID)

    If (rsPhotos.Find(strSearch)=0) Then
        msgbox "Can not find to edit..", , "Edit road
element photos.."
        Exit Sub
    End If
End If

rsPhotos.Fields("RoadID").Value = ctls("lblRoadID").Value
rsPhotos.Fields("LinkID").Value = ctls("lblLinkID").Value
rsPhotos.Fields("RCSurveyID").Value = (ctls("lblRCSurveyID").Value)
rsPhotos.Fields("SegmentID").Value = ctls("lblSegmentID").Value

If (ctls("cboRElement").ListIndex<>-1) Then
rsPhotos.Fields("RElement").Value =ctls("cboRElement").Value
rsPhotos.Fields("Name").Value = cstr(intPhotosID) + " " +
ctls("txtTopic").Value + " " + ctls("cboDirection").Text
End If

rsPhotos.Fields("Direction").Value = ctls("cboDirection").Value
rsPhotos.Fields("PhotosID").Value =cint(intPhotosID)
rsPhotos.Fields("Topic").Value =ctls("txtTopic").Value
rsPhotos.Fields("Photos").Value =ctls("txtPhotos").Value

rsPhotos.Update
rsPhotos.Close

Set rsPhotos = Nothing
Set ctls = Nothing

blnEditRElementPhotos = False

Layer.Forms("EditForm").Pages("pgRoadPhotos").Activate

End Sub

```

## VITAE

Anousone Outhailatsady was born in Laungprbang province, Lao P.D.R., in 1979. He receives the B.S. Eng. Degree in communication engineering from department of communication, National University of Laos, Lao P.D.R., in 2001. He is now working toward the M.S. Eng. Degree in transportation engineering from department of Civil Engineering, Chulalongkorn University, Thailand. His research areas are application of information technology to build road inventory in Lao PDR.

