

Quadrant: N
Section: 9
Sublot: Surface

Laboratory Diary

General Description of Mix and Materials

Design Method: SMA
 Compactive Effort: 75 gyrations
 Binder Performance Grade: 70-22
 Modifier Type: SBS
 Aggregate Type: Limestone
 Gradation Type: SMA

Avg. Lab Properties of Plant Produced Mix

<u>Sieve Size:</u>	<u>Design</u>	<u>QC:</u>
1":	100	100
3/4":	100	100
1/2":	96	97
3/8"	80	83
No. 4	30	37
No. 8	16	17
No. 16	13	13
No. 30	12	12
No. 50	12	11
No. 100	11	10
No. 200	9.0	8.6
Asphalt Content	6.5	6.6
Pill Bulk Gravity:		2.317
TMD (Rice):		2.439
Avg Air Voids		5.0
Avg VMA:		17

Construction Diary

Relevant Conditions for Construction

Completion Date: Friday, August 22, 2003
 24 Hour High Temperature (F): 88
 24 Hour Low Temperature (F): 67
 24 Hour Rainfall (in): 0
 Lift type: Surface
 Planned Mill / Lift Thickness (in): 2.0

Plant Configuration and Placement Details

<u>Component:</u>	<u>% Setting:</u>
Asphalt Content (Plant Setting)	6.5
1/2 D3 Reed Springs Limestone	65.3
Missouri Manufactured Sand	30.7
Genevieve Mineral Filler	4.0
Approximate Length (ft):	160
Survey Mill / Lift Thickness (in):	1.8
Type of Tack Coat Utilized:	PG67-22
Target Tack Application Rate (gal/sy):	0.03
Avg Temperature In Truck (F):	325
Avg Section Compaction:	95.1

General Notes:

- 1) Mixes are referenced by quadrant (E=East, N=North, W=West, and S=South), section number (sequential) and sublot;
- 2) Sections are listed in the order they appear on the Track beginning with E2 and continuing counterclockwise to E1;
- 3) The total research thickness of all rutting study sections ranges from 3/4 to 4 inches by design;
- 4) The total HMA thickness of all structural study sections (N1 through N8) ranges from 5 to 9 inches by design;
- 5) ARZ, TRZ, and BRZ refer to gradations intended to pass above, through and below the restricted zone, respectively;
- 6) SMA and OGFC refer to stone matrix asphalt and open-graded friction course, respectively.

Quadrant: N
Section: 9
Sublot: Binder

Laboratory Diary

General Description of Mix and Materials

Design Method: SMA
 Compactive Effort: 75 gyrations
 Binder Performance Grade: 70-22
 Modifier Type: SBS
 Aggregate Type: Limestone
 Gradation Type: SMA

Avg. Lab Properties of Plant Produced Mix

<u>Sieve Size:</u>	<u>Design</u>	<u>QC:</u>
1":	100	100
3/4":	100	100
1/2":	96	96
3/8"	80	85
No. 4	30	32
No. 8	16	15
No. 16	13	11
No. 30	12	10
No. 50	12	10
No. 100	11	9
No. 200	9.0	8.2
Asphalt Content	6.5	6.2
Pill Bulk Gravity:		2.303
TMD (Rice):		2.446
Avg Air Voids		5.8
Avg VMA:		18

Construction Diary

Relevant Conditions for Construction

Completion Date: Thursday, July 31, 2003
 24 Hour High Temperature (F): 88
 24 Hour Low Temperature (F): 69
 24 Hour Rainfall (in): 0.04
 Lift type: Binder
 Planned Mill / Lift Thickness (in): 2.0

Plant Configuration and Placement Details

<u>Component:</u>	<u>% Setting:</u>
Asphalt Content (Plant Setting)	6.4
1/2 D3 Reed Springs Limestone	63.0
Missouri Manufactured Sand	25.0
3/4 D1 Reed Springs Limestone	8.5
Genevieve Mineral Filler	3.5
Approximate Length (ft):	197
Survey Mill / Lift Thickness (in):	1.8
Type of Tack Coat Utilized:	PG67-22
Target Tack Application Rate (gal/sy):	0.03
Avg Temperature In Truck (F):	326
Avg Section Compaction:	95.2

General Notes:

- 1) Mixes are referenced by quadrant (E=East, N=North, W=West, and S=South), section number (sequential) and sublot;
- 2) Sections are listed in the order they appear on the Track beginning with E2 and continuing counterclockwise to E1;
- 3) The total research thickness of all rutting study sections ranges from 3/4 to 4 inches by design;
- 4) The total HMA thickness of all structural study sections (N1 through N8) ranges from 5 to 9 inches by design;
- 5) ARZ, TRZ, and BRZ refer to gradations intended to pass above, through and below the restricted zone, respectively;
- 6) SMA and OGFC refer to stone matrix asphalt and open-graded friction course, respectively.