

I-395 Route 9 Transportation Study

Capacity Analysis

PAC Meeting – Dec. 19, 2001

Discussion

1. Residual volumes from +/- diversion analysis.
2. Major Origin / Destination Pairs – Travel Distance & Time
3. Updated VMT and VHT.
4. Roadway sections – Design Hour Volumes
5. Intersection Level of Service.

Rte. 9

Rte. 9

Location 6

6440 (8730)
No Build, Upgrade

5355 (7645)
2B, 3AI,
3EI, 3E2C, 3AIK, 3EIK,
3E2C2E, 4B, 1-4B

Location 3

18140 (33070)
No Build, Upgrade, 1-4B

17040 (26410)
2B, 3AI,
3EI, 3E2C, 3AIK, 3EIK,
3E2C2E

13955 (23705) 4B

Rte. 1A

Location 2

2270 (8570)
No Build, Upgrade

1170 (1910)
2B, 3AI, 3EI, 3E2C,
3AIK, 3EIK, 3E2C2E,
4B, 1-4B

Location 7

4780 (5410)
No Build, Upgrade

5880 (12070)
2B, 3AI, 3EI,
3E2C,

3695 (4325)
3AIK, 3EIK,
3E2C2E, 4B, 1-4B

Location 8

16550 (30600)
No Build, Upgrade

15450 (23940)
2B, 3AI, 3EI, 3E2C, 3AIK,
3EIK, 3E2C2E, 4B, 1-4B

Location 1

5100 (10940)
No Build, Upgrade, 2B, 3AI,
3EI, 3E2C

2915 (3195)
3AIK, 3EIK, 3E2C2E, 4B, 1-4B

Location 4

11220 (18870)
No Build, Upgrade,
2B, 3AI, 3EI, 3E2C, 3AIK,
3EIK, 3E2C2E, 4B, 1-4B

Location 5

1920 (3130)
No Build, Upgrade,
2B, 3AI, 3EI, 3E2C,
3AIK, 3EIK, 3E2C2E,
4B, 1-4B

Rte 46

000 – 1998 Annual Average Daily Traffic
(000) – 2030 Annual average Daily Traffic

1. Travel Time & Distances Between Rte 9 E & I-395 via Rte 46

		Rank		Rank
	Distance	Shortest	Time	Shortest
Alternative	Miles	Distance	Minutes	Time
3 AIK	9.41	2	10.26	1
3 AI	9.29	1	10.75	2
3EIK	10.03	4	10.94	3
3 EI	9.91	3	11.43	4
3E 2C 2E	10.63	5	11.60	5
4B	10.85	8	11.86	6
2E 2C	10.71	6	12.61	7
2 B	10.71	6	12.84	8
1-4B	11.02	9	12.84	9
Upgrade	11.80	10	15.99	10
Existing	11.80	11	17.89	11

2. Travel Time & Distances Between Rte 9 E & Rte 1A W via Rte 46

		Rank		Rank
	Distance	Shortest	Time	Shortest
Alternative	Miles	Distance	Minutes	Time
3 AIK	8.61	2	9.39	1
3 AI	8.49	1	9.88	2
3 EIK	10.83	7	11.81	3
1-4B	10.22	4	11.97	4
2B	9.91	3	11.97	5
3 EI	10.71	6	12.30	6
3E 2C 2E	11.43	10	12.47	7
4B	10.22	4	12.62	8
3E 2C	11.51	11	13.48	9
Upgrade	11.00	8	15.12	10
Existing	11.00	9	17.02	11

Comparison 2030 Vehicle Miles Traveled & Vehicles Hours Traveled

		2030 Annual Vehicle Miles Traveled			2030 Annual Vehicle Hours Traveled
Rank	Alt.		Rank	Alt.	
2	3 AIK	-6,118,751	1	3 AIK	-352,098
1	3AI	-6,457,982	2	3AI	-329,012
6	4B	-2,215,824	3	4B	-303,536
4	3 EIK	-2,844,737	4	3 EIK	-292,486
3	3 EI	-3,183,968	5	3 EI	-269,399
8	3E 2C 2E	-1,148,582	6	3E 2C 2E	-261,390
10	Upgrade	0	7	Upgrade	-253,386
5	2B	-2,443,748	8	2B	-230,540
7	1-4B	-1,567,401	9	1-4B	-226,250
9	3E 2C	-922,428	10	3E 2C	-213,803
11	Existing	0	11	Existing	0

Rte. 9

Rte. 9

Location 6

641 (873)
No Build, Upgrade

(764)
2B, 3AI,
3EI, 3E2C, 3AIK, 3EIK,
3E2C2E, 4B, 1-4B

Location 3

1840 (3269)
No Build, Upgrade, 1-4B

(2612)
2B, 3AI,
3EI, 3E2C, 3AIK, 3EIK,
3E2C2E

(2344) 4B

Rte. 1A

Location 2

244(1006)
No Build, Upgrade

(346)
2B, 3AI, 3EI, 3E2C,
3AIK, 3EIK, 3E2C2E,
4B, 1-4B

Location 7

473 (591)
No Build, Upgrade

(1251)
2B, 3AI, 3EI,
3E2C,
(591)
3AIK, 3EIK,
3E2C2E, 4B, 1-4B

Location 8

1417 (2964)
No Build, Upgrade

(2304)
2B, 3AI, 3EI, 3E2C, 3AIK,
3EIK, 3E2C2E, 4B, 1-4B

Location 1

505 (1267)
No Build, Upgrade, 2B, 3AI,
3EI, 3E2C

(607)
3AIK, 3EIK, 3E2C2E, 4B, 1-4B

Location 4

1282 (2123)
No Build, Upgrade,
2B, 3AI, 3EI, 3E2C, 3AIK,
3EIK, 3E2C2E, 4B, 1-4B

Location 5

207 (339)
No Build, Upgrade,
2B, 3AI, 3EI, 3E2C,
3AIK, 3EIK, 3E2C2E,
4B, 1-4B

Rte 46

000 – 1998 Design Hour Volume
(000) – 2030 Design Hour Volume