

Appendix F
Automobile Travel Time and Speed Delay Analyses:
Selected Origins & Destinations

Travel Time Analysis

Travel time analysis provides useful information about changes in the time required to get between key locations. The quality of travel is often associated with speed or travel time. Speed or travel time is also an important consideration in highway transportation because the rate of vehicle movement has significant economic, safety, time, and service (comfort and convenience) meaning to both the motorist and the general public.

The 2003 Plan included a travel time analysis with destinations selected to be geographically representative of the evening commute from work to home for the region's residents. (This analysis was not repeated for the 2006 Plan.) Monument Square and the Maine Mall were selected as the trip origins for comparison purposes because of their importance as economic and employment centers. Destinations were selected to be geographically representative of the evening commute from work to home for the region's residents. Destinations included:

- Route 1 in Scarborough at Dunstan Corner.
- Route 22 in South Gorham west of the Route 22/114 overlap.
- Route 25 in Gorham west of the Village and west of the probable location of the Gorham Bypass connections.
- Route 77 in the town center of Cape Elizabeth.
- Yarmouth, east of I-95.
- West Cumberland, near the Maine Turnpike and Route 26/100.
- Route 302 in Windham, south of Fosters Corner near Highland Lake.

Results of the origin-destination travel time analysis are shown in Table F-1

Speed - Delay Analysis: Major Corridors

The 2003 Plan also included a speed-delay analysis. Wilbur Smith Associates (WSA) conducted speed surveys, using a floating car method, on most of the key travel routes in the then PACTS region. The surveys were conducted in the peak travel direction during the AM peak period (entering Portland) and during the PM peak period (leaving Portland). A summary of the results by corridor is presented below. This analysis was done only for the 2003 Plan.

Route 1

Bucknam Road (Falmouth) to I-295

During the morning commute time the total travel time was 5 minutes and 14 seconds, while during the evening the travel time was slightly greater or 5 minutes and 29 seconds. No major delays were recorded although some delay was encountered at the Depot Street and Clearwater Drive traffic signals.

Saco Town Line to Cash Corner

The total travel time was 15 minutes and 29 seconds during the morning and 15 minutes and 21 seconds during the evening. No major delays were encountered during both time periods, but some delays occurred at most signalized intersections.

Route 100/26

MTA Exit 10 to Veranda Street

During the morning commuter period the travel time was 14 minutes and 34 seconds with major delays north of Canco Road (48 seconds) and south of Canco Road (3 minutes). The total travel time during the evening was 9 minutes and 46 seconds and some minor delays at Ocean Avenue (40 seconds), Canco Road (42 seconds), and Allen's Avenue (30 seconds)

Route 302

Windham Town Line to Park Avenue

The total travel time during the morning time period was recorded to be 18 minutes and 55 seconds with major delays at the School Zone south of Riverside Street (48 seconds) and at Morrill's Corner (1 minute and 39 seconds). During the evening time period the total travel time was 22 minutes and 40 seconds with major delays at Woodford's Corner (Over 2 minutes), and at Morrill's Corner (2 minutes).

Route 22

Route 202/4 to St. John Street

The total travel time for this route was 23 minutes and 23 seconds during the morning and 26 minutes and 47 seconds during the evening period. During the morning, excessive delays were not recorded although many intersections experienced delays in excess of 25 seconds. During the evening significant delays were noted at Jetport Drive (47 seconds), Spring Street (53 seconds), and at Route 114 (over 2 minutes).

Route 25

Park Avenue to Route 35

During the morning period the total travel was 39 minutes and 57 seconds with major delays at Route 202/4 (1 minute and 53 seconds), Route 114 (1 minute and 43 seconds), New Gorham Road (1 minute and 30 seconds), Spring Street (over 3 minutes), and at Stevens Avenue (56 seconds). During the evening period the total travel time was 42 minutes and 49 seconds with major delays at Stevens (1 minute and 11 seconds), Woodford Street (1 minute and 3 seconds), New Gorham Road (1 minute and 47 seconds), Route 202/4 (just over 3 minutes), and at Route 114 (1 minute and 36 seconds). The table from Appendix F on page D-14 shows the results of the travel time analysis.

**Table F-1
Automobile Travel Time Analysis: Selected Origins & Destinations**

									Response						Response
			2000 Base	2025 Base	Arterial 1	Arterial 2	Arterial 3	Arterial 3	Interstate 1	Interstate 2	Interstate 3	Interstate 4	Interstate 5	Interstate 4	
	Origin	Destination	Minutes	Minutes	Minutes	Minutes	Minutes	Minutes	Minutes	Minutes	Minutes	Minutes	Minutes	Minutes	Minutes
19	Monument Square Vicinity	164 Scarborough	19	19	18	18	18	18	18	18	18	17	17	17	17
19	Monument Square Vicinity	185 Gorham, w/o Overlap	26	29	27	25	25	24	29	29	24	21	29	21	21
19	Monument Square Vicinity	205 Gorham w/o Bypass	36	46	45	41	40	40	46	46	35	32	45	32	32
19	Monument Square Vicinity	209 Cape Elizabeth	14	16	16	16	16	15	16	16	16	16	16	15	15
19	Monument Square Vicinity	214 Yarmouth	15	18	18	18	18	18	17	17	17	18	15	17	17
19	Monument Square Vicinity	218 Cumberland	21	24	24	24	24	24	23	22	22	23	22	22	22
19	Monument Square Vicinity	224 Windham	25	32	31	31	28	28	32	32	30	24	31	23	23
123	Maine Mall	164 Scarborough	12	15	14	14	14	14	16	16	14	15	16	15	15
123	Maine Mall	185 Gorham, w/o Overlap	18	21	19	17	16	16	21	20	15	13	21	13	13
123	Maine Mall	205 Gorham w/o Bypass	31	39	37	32	32	32	38	37	27	24	38	24	24
123	Maine Mall	209 Cape Elizabeth	16	17	17	17	17	17	17	17	17	17	17	17	17
123	Maine Mall	214 Yarmouth	22	26	25	25	25	25	24	22	22	23	22	22	22
123	Maine Mall	218 Cumberland	22	24	24	23	20	20	26	24	24	24	26	23	23
123	Maine Mall	224 Windham	22	28	28	28	21	21	28	28	26	21	28	20	20

						Response	Response
			Transit 1	Transit 2	T3A-BRT	T3A-BRT	T3B-Rail
	Origin	Destination	Minutes	Minutes	Minutes	Minutes	Minutes
19	Monument Square Vicinity	164 Scarborough	19	19	18	18	18
19	Monument Square Vicinity	185 Gorham, w/o Overlap	30	29	29	28	29
19	Monument Square Vicinity	205 Gorham w/o Bypass	46	46	44	43	44
19	Monument Square Vicinity	209 Cape Elizabeth	16	15	15	16	16
19	Monument Square Vicinity	214 Yarmouth	18	18	18	18	17
19	Monument Square Vicinity	218 Cumberland	24	24	24	23	23
19	Monument Square Vicinity	224 Windham	32	32	31	31	32
123	Maine Mall	164 Scarborough	15	15	14	14	15
123	Maine Mall	185 Gorham, w/o Overlap	21	21	20	20	21
123	Maine Mall	205 Gorham w/o Bypass	38	38	38	36	38
123	Maine Mall	209 Cape Elizabeth	17	17	17	17	17
123	Maine Mall	214 Yarmouth	26	25	25	25	24
123	Maine Mall	218 Cumberland	24	24	24	24	24
123	Maine Mall	224 Windham	28	28	27	27	28