

to account for travel during highly congested travel conditions. The report noted that drivers' value of time increases by a factor of 2.5 during periods of highly congested travel conditions. The AASHTO User Benefit Analysis for Highways recommended applying a 2.0 factor during highly congested periods. Using the results from the C-470 User Survey and a \$6 per hour value of time, the C-470 corridor's user value of time during highly congested periods would increase to between \$12 to \$15 per hour. All values are in 2004 dollars.

The sensitivity analysis also looked at researching other methods that past studies have used to calculate drivers' value of time during congested conditions. Five sources had computed drivers' value of time based on various input values that could be applied as nationwide averages. The studies used in the analysis, and their respective values of time, are shown in the Table 5.1. The value of times were adjusted to reflect the current dollar value based on the Consumer Price Index (CPI) for the year the study was completed.

**Table 5.1**  
**Value of Time Summary Table**

Study	Based on Data from Year	Value of Time Rates (\$/hr)	CPI (Study Year)	CPI (2004)	2004 Value of Time Rates (\$/hr)
AASHTO User Benefit Analysis for Highways	2000	10.96	174.0	189.4	11.93
NCHRP Report 431, Valuation of Travel Time Savings and Predictability in Congested Conditions for Highway User-Cost Estimation	1999	13.25	168.3	189.4	14.91
Measure the Economic Costs of Urban Traffic Congestions	2002	14.30	180.9	189.4	14.97
Uncovering the Distribution of Motorist Preferences for Travel Time and Reliability: Implications for Road Pricing	2002	14.83	180.9	189.4	15.53
Value of Time Savings	1999	11.38	168.3	189.4	12.81
				<b>Average</b>	<b>14.03</b>

The AASHTO User Benefit Analysis for Highways noted that a rough calculation typically used to derive a driver's value of time is to take 50 percent of their hourly income level. To derive this value, 2000 U.S. census data for the block groups surrounding the corridor were compiled to determine the average household income