
**US 202 TRAFFIC ANALYSIS
SECTION 700
PA 309 TO DOYLESTOWN BYPASS**

SUPPLEMENT NO. 4



SECTION 700

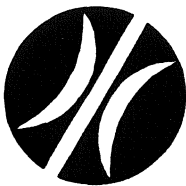
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Created in 1965, the Delaware Valley Regional Planning Commission (DVRPC) is an interstate, intercounty and intercity agency which provides continuing, comprehensive and coordinated planning for the orderly growth and development of the Delaware Valley region. The region includes Bucks, Chester, Delaware, and Montgomery counties as well as the City of Philadelphia in Pennsylvania and Burlington, Camden, Gloucester, and Mercer counties in New Jersey. The Commission is an advisory agency which divides its planning and service functions between the Office of the Executive Director, the Office of Public Affairs, and three line Divisions: Transportation Planning, Regional Planning, and Administration. DVRPC's mission for the 1990s is to emphasize technical assistance and services and to conduct high priority studies for member state and local governments, while determining and meeting the needs of the private sector.



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DELAWARE VALLEY REGIONAL PLANNING COMMISSION

Publication Abstract

TITLE US 202 TRAFFIC ANALYSIS SECTION 700 PA 309 TO DOYLESTOWN BYPASS Supplement No.4	Date Published: September 1997 Publication No. 97003
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Geographic Area Covered:

US 202 Section 700 Northern Terminus encompasses portions of Doylestown Borough and Buckingham, Doylestown, Plumstead, and Solebury Townships.

Key Words:

US 202, existing traffic volumes, future traffic volumes, selected link analysis, DEIS

ABSTRACT

This report contains current and Year 2018 traffic forecasts for the Northern Terminus of US 202 Section 700. It supplements a DVRPC report entitled "US 202 Traffic Analysis Section 700 - PA 309 to Doylestown Bypass," dated March 1992. Two alternatives are studied, a No-Build Alternative and an Bypass Alternative (the construction of a full expressway between PA 309 and the Doylestown Bypass). Traffic forecasts are presented for the Doylestown Bypass, US 202, PA 611, PA 313, PA 413, and secondary roads in the area. A selected link analysis describing through trips on US 202 and a response to issues raised by Buckingham Township's DEIS comments are also included.

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I. INTRODUCTION

As part of the US 202 traffic study, the Pennsylvania Department of Transportation (PennDOT) requested the Delaware Valley Regional Planning Commission (DVRPC) to undertake a traffic forecast study of a nine-mile portion of US 202 stretching from PA 309 to the Doylestown Bypass. PennDOT is examining a number of improvement alternatives in this segment known as Section 700. As part of the Environmental Impact Study, PennDOT made presentations to local officials and held a public meeting on the Draft Environmental Impact Statement (DEIS). At these meetings Buckingham and Plumstead Townships in Bucks County, located just outside the Section 700 corridor, expressed concerns about the impacts a new expressway may have on their townships. These forecasts will assist PennDOT's consultants in evaluating the traffic impacts on these townships.

This supplement contains current traffic counts and Year 2018 No-Build and Bypass Alternative traffic forecasts for the Northern Terminus of Section 700, a study area that encompasses Buckingham, Plumstead, and Solebury Townships and adjoining areas of Doylestown. Traffic forecasts are presented for the Doylestown Bypass, US 202, PA 611, PA 313 and other secondary roads that parallel or intersect with these highways. The bypass forecast reflects the effect of the construction of a full expressway on a new alignment between PA 63 and the Doylestown Bypass. Through trips on US 202 were examined, by means of a selected link analysis, at several locations in the Northern Terminus area. Information on trip origins for US 202 traffic are also presented in this report. The original US 202 Section 700 report, dated March 1992, should be consulted for a description of the methods and assumptions used to prepare these detailed estimates.

Buckingham Township submitted formal comments to the DEIS public hearing docket in a document titled "A Response To The Draft Environmental Impact Statement And Related Documents Concerning The Route 202, Section 700 Proposals." Many of these comments pertain to the traffic projections and their underlying assumptions. This report will address the pertinent comments and concerns raised in Buckingham's submittal.

II. Study Area Characteristics

In this section a description of the roadways and demographics for the Section 700 Northern Terminus will be presented.

1. Existing Highway Facilities

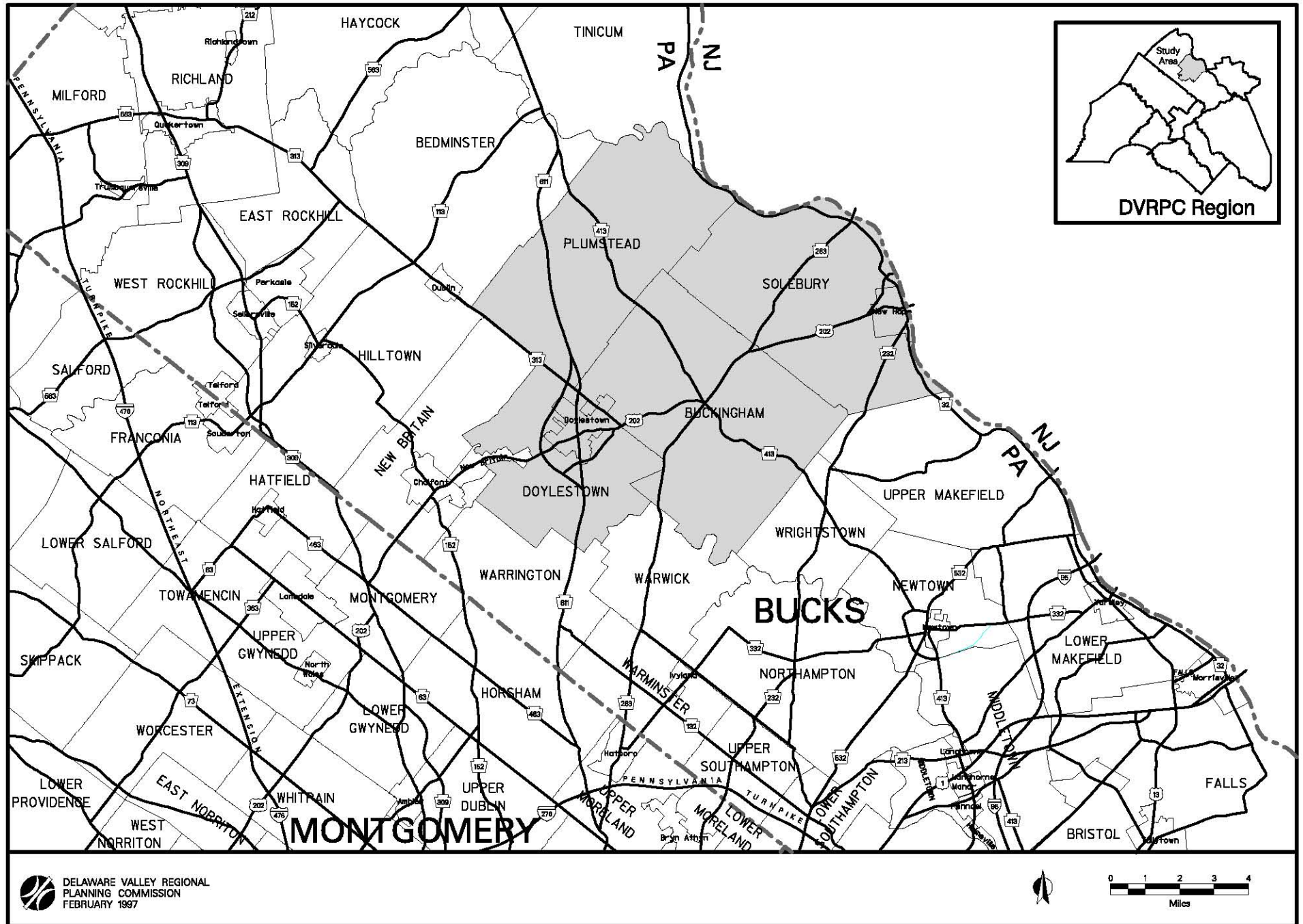
The Section 700 Northern Terminus encompasses portions of Doylestown Borough and Buckingham, Doylestown, and Plumstead Townships, see Figure 1. Doylestown Borough, the county seat, is a highly developed community with stores and businesses located in the business district and along Main and State Streets. Doylestown Township, which surrounds the borough, is a mix of residential development and undeveloped land. In contrast, Buckingham, Plumstead, and Solebury Townships are largely rural areas in the early stages of development. Peddlers Village and adjacent businesses, in Lahaska, are a major tourist attraction. Regionally, shopping is concentrated at the intersection of PA 611 and PA 313 (known as Cross Keys).

The major roads in the study area are US 202, PA 611, the Doylestown Bypass, and PA 313 which are described briefly in the following paragraphs.

US 202 is a principal arterial linking Doylestown to Montgomeryville and King of Prussia, to the south and New Hope and New Jersey, to the north. Within the study area US 202 is a two-lane highway with the speed limit varying from 35 mph to 50 mph. Lining the roadway is a mix of retail stores and undeveloped properties. Within Doylestown Borough, US 202 (State Street) becomes a one-way pair with parking permitted on both sides of the street.

PA 611 (Easton Road) is a four-lane divided highway south of Doylestown. Its speed limit is 45 mph and all major intersections are signalized with left turn lanes. Adjoining land use consists of scattered stores and retail development. Within Doylestown Borough, PA 611 becomes a two-lane street, renamed Main Street, with a 25 mph posted speed limit and parking permitted only on one side. As Main Street approaches PA 313 it widens to four-lanes with a 35 mph speed limit. The segment by Cross Keys is characterized by dense retail development and numerous auto dealerships. Cross Keys Plaza and Mercer Square are Doylestown's two major shopping

Figure 1: TRAFFIC STUDY AREA FOR NORTHERN TERMINUS



centers located on PA 611. North of the PA 611 Bypass, PA 611 becomes a four-lane highway.

Doylestown has two bypasses, US 202 Bypass and PA 611 Bypass. US 202 Bypass originates at PA 313, extends around the eastern and southern boundary of Doylestown Borough where it terminates at US 202. It has interchanges with PA 611 and the PA 611 Bypass/proposed US 202 Bypass interchange. The segment between the proposed US 202 Bypass and existing US 202 is co-designated US 202 Bypass/PA 611 Bypass. PA 611 Bypass departs from PA 611 between the US 202 Bypass and Edison Furlong Road and extends around the southern edge of Doylestown Borough before it rejoins PA 611 by Ferry Road. There are grade separated interchanges with US 202 Bypass, US 202, Broad Street (a partial interchange), and PA 313 (a partial interchange). Both bypasses are four-lane facilities with a posted 55 mph speed limit.

Finally, PA 313 (Swamp Road) is a two-lane roadway that extends along northern boundary of Doylestown Borough connecting Doylestown to Quakertown. East of Pools Corner (the intersection of US 202 and PA 313) PA 313 is a two-lane roadway with a 45 mph speed limit. It passes through a largely undeveloped area. Between Pools Corner and Cross Keys it remains a two-lane street with several signalized intersections. The predominate land use in this section is Font Hill County Park and recently constructed subdivisions just inside Buckingham Township. At Cross Keys, PA 313 widens to serve adjacent retail development, auto dealerships, and the PA 611 Bypass. West of the Bypass PA 313 becomes a rural two-lane highway.

Several secondary roads paralleling either US 202 or PA 611 were also examined. Except for PA 263, these roads are generally narrow two-lane roadways located in rural to emerging suburban areas. They include PA 413 (Durham Road), Mechanicsville Road, Cold Spring Creamery Road, and Ferry Road/Danboro Point Pleasant Pike.

2. Population and Employment Forecasts

Travel forecasting models require that estimates of demographic and employment data be made for each traffic zone in the region. This requirement derives from the need to assign trip making from residential and business areas to the highway facilities or streets serving them. DVRPC staff has prepared Year 2018 zonal forecasts of the socio-economic inputs to the travel simulation process.

Table 1 presents population forecasts for the municipalities in the Bucks County portion of the Section 700 corridor. Buckingham, Plumstead, and Solebury Townships have been added to reflect the Northern Terminus area. Table 2 displays the corresponding municipal employment forecasts.

The Bucks County portion of Section 700 is expected to experience a 63.3 percent population increase between 1990 and Year 2018. Doylestown Township is expected to have the biggest increase (101.1%) followed by Buckingham Township (84.0%), and Warrington Township (83.4%). Within the Northern Terminus, the population of Doylestown Borough will increase 16.8 percent, Plumstead Township by 15.1 percent, and Solebury 57.9 percent.

Employment in the Bucks County portion of Section 700 will increase by 42.4 percent between 1990 and Year 2018. Buckingham, New Britain and Solebury Townships are expected to double their employment. Within the Northern Terminus employment in Doylestown Township is expected to increase 80.6 percent and in Plumstead by 40.6 percent. Doylestown Borough is expected to have a minor decrease (4.9%) in employment.

Table 1: CURRENT AND FUTURE POPULATION FORECASTS

<u>Municipality</u>	<u>1990 Population</u>	<u>1995 Population</u>	<u>2018 Population</u>	<u>Absolute Difference (1990-2018)</u>	<u>Percent Difference (1990-2018)</u>
Chalfont Borough	3,069	3,224	3,867	798	26.0
Doylestown Borough	8,575	8,648	10,013	1,438	16.8
Doylestown Township	14,510	14,844	29,174	14,664	101.1
New Britain Borough	2,174	2,422	3,767	1,593	73.3
New Britain Township	9,099	9,764	13,235	4,136	45.5
Warrington Township	<u>12,169</u>	<u>15,515</u>	<u>22,321</u>	<u>10,152</u>	<u>83.4</u>
Total for Section 700	49,596	54,417	82,377	32,781	66.1
Buckingham Township	9,364	10,032	17,227	7,863	84.0
Plumstead Township	6,289	6,881	7,240	951	15.1
Solebury Township	<u>5,998</u>	<u>7,247</u>	<u>9,469</u>	<u>3,471</u>	<u>57.9</u>
Total for Section 800	21,651	24,160	33,936	12,285	56.7
Totals for Study Area	71,247	78,577	116,313	45,066	63.3
Total for Bucks County	541,174	572,107	674,975	133,801	24.7

Table 2: CURRENT AND FUTURE EMPLOYMENT FORECASTS

<u>Municipality</u>	<u>1990 Employment</u>	<u>1995 Employment</u>	<u>2018 Employment</u>	<u>Absolute Difference (1990-2018)</u>	<u>Percent Difference (1990-2018)</u>
Chalfont Borough	1,924	1,889	2,969	1,045	54.3
Doylestown Borough	11,224	10,947	10,671	-553	-4.9
Doylestown Township	5,723	6,273	10,336	4,613	80.6
New Britain Borough	1,007	1,034	1,063	56	5.6
New Britain Township	2,580	2,796	5,867	3,287	127.4
Warrington Township	<u>6,097</u>	<u>6,140</u>	<u>7,207</u>	<u>1,110</u>	<u>18.2</u>
Total for Section 700	28,555	29,079	38,113	9,558	33.5
Buckingham Township	2,978	3,047	6,228	3,250	109.1
Plumstead Township	3,079	3,367	4,328	1,249	40.6
Solebury Township	<u>785</u>	<u>867</u>	<u>1,729</u>	<u>944</u>	<u>120.3</u>
Total for Section 800	6,842	7,281	12,285	5,443	79.6
Totals for Study Area	35,397	36,360	50,398	15,001	42.4
Total for Bucks County	245,345	249,270	300,513	55,168	22.5

III. POPULATION FORECAST ISSUES RAISED BY BUCKINGHAM TOWNSHIP

In response to the US 202 Section 700 DEIS Public Hearing held on September 12, 1996, PennDOT received over 700 public comments. DVRPC was specifically asked to review the formal response by the Buckingham Township Supervisors presented in a document titled "A Response to the Draft Environmental Impact Statement and Related Documents Concerning the US 202, Section 700 Proposals" dated October 11, 1996.

The document presented a number of general concerns that fall in three general categories: 1) How accurate are DVRPC's population forecasts, 2) How does the traffic simulation model operate and how does the proposed Bypass impact the township, and 3) Who benefits from the proposed Bypass. These issues will be addressed in the following chapters.

In its DEIS submittal, Buckingham Township rejected DVRPC's 2018 population forecast and questioned the traffic simulation model's sensitivity to a change in the population forecast. This chapter will present the issues raised by Buckingham, review its assumptions and analysis, present population estimates prepared by the U.S. Census Bureau, and analyze dwelling unit statistics obtained from the Bucks County Assessor's office.

1. Comparison of DVRPC Population Forecast to U.S. Census Bureau Statistics and Bucks County Planning Commission Forecasts

According to the Buckingham Township submittal, DVRPC's population forecast of 17,227 will be achieved in the Year 2000 instead of 2018, and by 2018 the submittal projects a population that ranges between 23,805 to 41,795. This forecast is based upon full build-out of all approved plans and recent issuance of building permits. Table 3 shows Buckingham's Year 2000 population forecast. In the table, the percent growth is based upon building permit activity and population is based on approximately 2.9 people per dwelling unit. Between 2000 and 2018, three growth rate scenarios were employed (see Table 4 also copied from the DEIS submittal): 1) A 4.5 percent growth rate reflecting the average growth in building permits between 1990 and 2000 exclusive of the highest year, 2) A 3.2 percent growth rate based upon the lowest growth rate between 1990

Table 3: COMPARISON OF BUCKINGHAM TOWNSHIP POPULATION PROJECTION TO U.S. CENSUS ESTIMATES

Year	Buckingham Township Projections			U.S. Census	Diff. in Population
	Growth %	Dwelling Units	Population		
1989	---	3,553	10,304	-	-
1990	3.2	3,674	10,635	9,364	-1,271
1991	3.6	3,839	11,022	-	-
1992	4.7	4,051	11,536	9,411	-2,125
1993	5.7	4,315	12,192	-	-
1994	8.2	4,697	13,197	9,921	-3,276
1995	6.3	5,013	14,029	-	-
1996	4.7	5,264	14,691	-	-
1997	4.3	5,503	15,318	-	-
1998	3.7	5,724	15,893	-	-
1999	4.9	6,017	16,677	-	-
2000	3.9	6,143	17,330	-	-

Sources:

Buckingham Township:

Table 1, "A Response to the Draft Environmental Draft Impact Statement and Related Documents Concerning the Route 202, Section 700 Proposals"

U.S. Census:

1990 - Census counts

1992, 1994 - Census estimates

TABLE 4: BUCKINGHAM TOWNSHIP POPULATION GROWTH 2000-2018

<u>Year</u>	Population Growth Rate		
	<u>4.5%</u>	<u>3.2%</u>	<u>1.6%</u>
2000	17,330	17,330	17,330
2001	18,110	17,885	17,607
2002	18,925	18,457	17,889
2003	19,776	19,047	18,175
2004	20,666	19,657	18,466
2005	21,596	20,286	18,761
2006	22,568	20,935	19,062
2007	23,584	21,605	19,367
2008	24,645	22,296	19,677
2009	25,754	23,010	19,991
2010	26,913	23,746	20,311
2011	28,124	24,506	20,636
2012	29,390	25,290	20,966
2012	30,712	26,100	21,302
2013	32,094	26,935	21,643
2013	33,538	27,797	21,989
2014	35,048	28,686	22,341
2015	36,625	29,604	22,698
2016	38,273	30,552	23,061
2017	39,995	31,529	23,430
2018	41,795	32,538	23,805

Source:

Table 2, "A Response to the Draft Environmental Draft Impact Statement and Related Documents Concerning the Route 202, Section 700 Proposals"

and 2000, and 3) A growth rate of 1.6 percent based upon one-half of the rate assumed under scenario 2. In the table, 2012 and 2013 were double-counted replicating a mistake made in the table by Buckingham.

The Census Bureau's 1990 population of Buckingham Township based upon actual census counts is 9,364, 1,271 less than that estimated by the township (Table 3). A discrepancy in the number of households is primarily responsible for the difference in population.

Every two years the Census Bureau, in cooperation with each state, issues municipal population estimates based upon "Administrative Records." Administrative records are governmental statistics covering social security records, driver licenses, motor vehicle registrations, immigration records, building permits, and other similar basic demographic data.

For 1992, the Census Bureau estimated a population of 9,411, 2,125 fewer than Buckingham's estimate. In 1994 the difference grew to 3,276 with the Census Bureau's population estimate of 9,921.

Independent of DVRPC, the Bucks County Planning Commission projects population, employment and other trends for municipalities in their county. In an edition of the Bucks County Continuum covering the Central Bucks Region, dated January 1994, the county presents high, middle, and low population forecasts for municipalities in the Section 700 corridor. In 1990, the population of the corridor was 71,247 according to the US Census. As seen in Table 5, Bucks County's 2020 population projection ranges from a low of 112,100 to a high of 140,800 with a middle value of 124,100. While there is a fluctuation in population forecasts at the municipal level, the DVRPC 2018 projection of 116,313 nearly equals the County's middle projection.

With respect to Buckingham Township, the County's 2020 population projection ranges from a low of 14,880 to a high of 18,690 with a middle projection of 16,470. DVRPC's 2018 projection of 17,227 falls in the upper range of the county's forecast.

2. Review of Residential Dwelling Unit Activity in the Section 700 Corridor

As a secondary check of development activity in the corridor, DVRPC reviewed the number of residential dwelling units on record with the Bucks County Assessor. Since the Assessor is

**Table 5: COMPARISON OF DVRPC POPULATION FORECAST TO
BUCKS COUNTY PLANNING COMMISSION FORECAST**

Municipality	U.S. Census 1990 Count	DVRPC 2018 Population Forecast	Bucks County Planning Commission 2020 Population Forecast		
			Low	Middle	High
Buckingham Twp	9,364	17,227	14,880	16,470	18,690
Doylestown Boro	8,575	10,013	8,450	9,350	10,610
Doylestown Twp	14,510	29,174	22,620	25,040	28,420
Plumstead Twp	6,289	7,240	9,360	10,360	11,750
Solebury Twp	5,998	9,469	8,650	9,580	10,870
Chalfont Boro	3,069	3,867	3,520	3,900	4,420
New Britain Boro	2,174	3,767	2,770	3,070	3,480
New Britain Twp	9,099	13,235	19,690	21,800	24,730
Warrington Twp	12,169	22,321	22,160	24,530	27,830
Total	71,247	116,313	112,100	124,100	140,800

Source:

Bucks County Continuum, January 1994

responsible for billing property taxes, the Assessor's office has probably the most up-to-date information available.

Bucks County Assessor classifies each parcel in the county by land use type, and for residential properties by type of residence. The total number of residential properties listed by the Assessor for 1990, 1992, and 1995 are shown in Table 6. In the adjacent column for each year is the corresponding number of dwelling units used by DVRPC. DVRPC usually uses households to estimate municipal population. From a demographic view point the primary difference between dwelling units and households is the vacancy rate. Households represent occupied dwelling units (in 1990 the vacancy rate in the corridor varied between 4.0% and 8.0%) and are generally a better prognosticator of population. DVRPC dwelling units for 1990 are based on the 1990 U.S. Census households adjusted for dwelling units, 1992 and 1995 dwelling units are based on interim U.S. Census population estimates.

An examination of the annual corridor totals shows that in 1990 the number of dwelling units used by DVRPC to forecast future municipal population is larger than the number of dwelling units recorded by the Bucks County Assessor. In 1995, DVRPC still assumed a high level of dwelling units than the Assessor; however, because of slightly greater than anticipated development in some municipalities the difference had slightly narrowed.

Also included in the table is the comparable number of dwelling units estimated by Buckingham Township in their DEIS submittal. In all three years, Buckingham's housing estimate far exceeds DVRPC's estimate and the number of dwelling units recorded by the county.

This comparison indicates clearly that the DVRPC population estimates, and the traffic projections based on them are valid. While Buckingham growth rate may be slightly higher than the forecast, on a corridor basis, DVRPC's population estimate is accurate. This judgment is further substantiated by a sensitivity analysis discussed in Section VI in which DVRPC ran a second series of computer simulations with a higher population scenario in Buckingham, Plumstead, and Solebury Townships. In the sensitivity analysis an additional 12,000 person surcharge was assumed, representing an 80.0 percent increase over the corridor's 1990 population instead of the 63.3 percent increase previously assumed. Even with a higher population base, there are only minor differences, less than 8.6 percent, in traffic volumes on the major roads in the Northern Terminus area (US 202 and PA 611) when the two scenarios are examined. The differences rapidly diminish on roads further away from the affected townships. Impact of residential

Table 6: COMPARISON OF DWELLING UNITS FROM BUCKS COUNTY ASSESSOR AND DVRPC

Municipality	1990		1992		1995	
	Bucks Assessor	DVRPC	Bucks Assessor	DVRPC	Bucks Assessor	DVRPC
Buckingham Twp (Buckingham Sub.)	2,894 (3,674)	3,283	3,249 (4,051)	3,320	4,131 (5,013)	3,535
Doylestown Boro	2,378	4,100	2,389	3,602	2,411	4,168
Doylestown Twp	4,083	4,857	4,397	4,910	5,040	4,996
Plumstead Twp	1,779	2,295	2,083	2,373	3,012	2,563
Solebury Twp	2,041*	2,503	2,203	2,697	2,510	3,104
Chalfont Boro	1,004	1,144	1,110	1,180	1,306	1,234
New Britain Boro	809	828	914	878	925	882
New Britain Twp	2,969	3,284	3,234	3,394	3,558	3,554
Warrington Twp	3,372	4,458	3,805	5,005	4,255	5,972
Total	21,329	26,752	23,384	27,359	27,148	30,008

* Average of 1989 and 1991 total dwelling units

Source:

County:

Bucks County Assessor Office records

DVRPC:

1990 - U.S. Census data adjusted for dwelling units

1992, 1995 - Unpublished estimates based on census information

Buckingham Sub. - Table 1, "A Response to the Draft Environmental Draft Impact Statement and Related Documents Concerning the Route 202, Section 700 Proposals"

development is localized with the travel simulation model showing the greatest increases on the minor roads which basically perform local land use access

3. Analysis of Buckingham Township's Population Methodology

Buckingham Township's population forecasting procedure is inconsistent with planning and demographic professional practice. Between 2000 and 2018 the township used a constant growth rate analogous to compound interest rates used by banks. This simplistic approach does not account for environmental constraints (such as wetlands, flood plains or steep grades), the capacity of the local infrastructure to support development (87% of the residents lack public sewers), or possible down turns in the economy (historically there have been three recessions every twenty years). The growth rates used by Buckingham are based on record levels of development for the township that will not be sustained over time.

Buckingham's Year 2000 forecast is based solely upon building permit activity and full build-out of approved plans by the Year 2000. The Census Bureau, state governments and other demographers recognize the correlation between building permits and construction is somewhat tenuous. Construction activity lags behind building permits, developers consistently underestimate the build-out time frame, and many developers never fully build-out their development. The real estate market, job market, and economy determine which parts of the region grow, not approved building permits or a developer's good intentions.

IV. TRAVEL FORECASTING PROCEDURES

The travel simulation models at DVRPC follow the traditional steps of trip generation, trip distribution, modal split, and travel assignment as shown in Figure 2. They utilize computer programs included in the TRANPLAN simulation model system. Such a process has been used by all major urban areas in the country and approved by the U.S. Department of Transportation.

1. The Regional Travel Forecasting Model

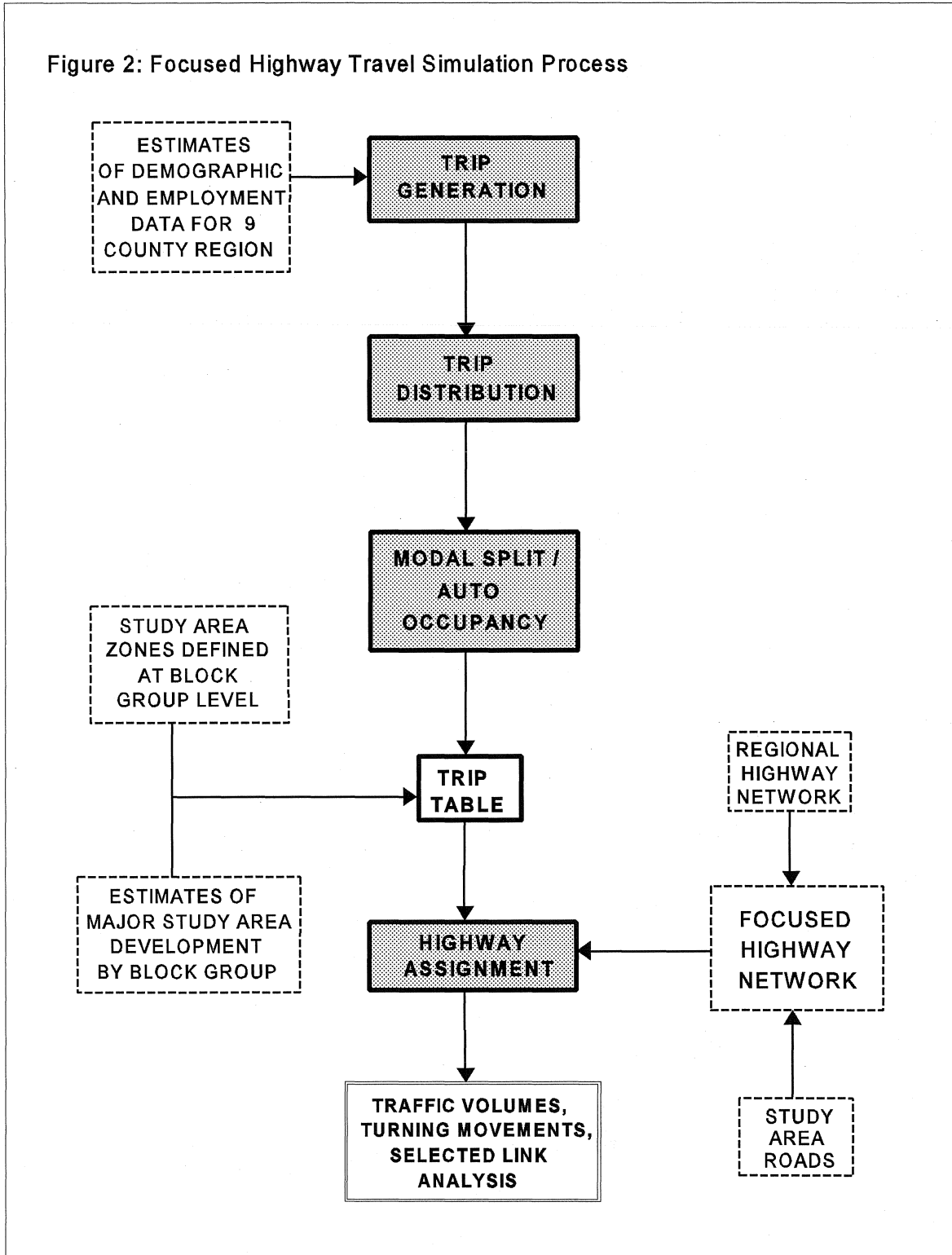
Trip generation is the first step in the modeling process. Year 2018 projections of person, truck, and taxi travel are generated from traffic zone-level (usually census tracts) forecasts of households, auto ownership, and employment through the use of trip rates. The travel from each census tracts within the region is then distributed to destinations based on the attractiveness of the destination (as measured by employment) and the difficulty of traveling between zones. This travel impedance is measured by travel time and cost for both the highway and transit modes.

The modal split model divides the travel between census tracts within the region into transit and highway components. Generally, the propensity to use public transit increases with the relative transit-to-highway service levels. The relative service levels are estimated through highway and transit out-of-vehicle time and in-vehicle time; highway operating costs and parking charges; and transit fares. In addition, auto ownership, transit submode, household income, and trip purpose further define the trip-maker's choice between highway and transit.

The final step in the simulation process is the assignment of estimated Year 2018 vehicle trips to the highway network representative of each of the alternatives. This assignment model produces the forecasted traffic volumes for individual highway links that are required for the evaluation of the alternatives. The regional nature of the highway network and trip table underlying the focused assignment process allow the diversion of travel into and through the detailed study area to various points of entry and exit in response to the improvements made within the US 202 Section 700 Corridor.

Highway trips are assigned to the network representative of a given alternative by determining the

Figure 2: Focused Highway Travel Simulation Process



best (minimum time) route through the highway network for each zonal interchange and then allocating the interzonal highway travel to the highway facilities along that route. This assignment model is capacity restrained in that congestion levels are considered when determining the best route. The equilibrium assignment method is used to implement the capacity constraint. When the assignment reaches equilibrium, no path faster than the one actually assigned can be found through the network, given the "capacity restrained" travel times on each link.

2. Focused Highway Assignment Model

Significant enhancements in model detail were made for the highway simulation model used in the study of US 202 Section 700. This network focusing process involves adding missing streets to the regional network representing the revised Year 2020 Plan for Highways. Also, simulation zones inside the study area were subdivided so that traffic from existing and proposed developments can be accurately loaded onto the network. This process resulted in a traffic assignment model capable of estimating accurate traffic volumes for most streets and intersections within the study area. This focused network explicitly includes the impact of all highway facilities outside of the detailed study area on the projected volumes. These facilities include the improvements in the Year 2020 Transportation Plan such as the construction of the I-95/Pennsylvania Turnpike Interchange and so forth; as well as all existing expressways, major arterials, and minor arterials within the region.

3. Supplemental Development Surcharge

DVRPC staff met with Bucks and Montgomery county and municipal officials to obtain information on proposed land use developments for each municipality within the study area. These developments were then assigned to a given municipality and summarized in terms of square footage and other parameters that affect trip generation.

These proposals do not represent final approved plans. Market conditions, zoning changes and redesign may have an effect on the ultimate type and magnitude of development; however this list represents a realistic picture of potential future development activity at this point in time. The list of proposed development for the study area can be found in the DVRPC report entitled, " US 202 Traffic Analysis, Section 700 - PA 309 to Doylestown Bypass."

The development proposals were converted to equivalent estimates of population and employment and added to the base estimates for the study area. The resulting totals were compared with the MCD level 2018 DVRPC forecasts. Proposed developments within the study area, judged not to be included in DVRPC's 2018 regional highway trip table, were used to generate a surcharge of future trips. When this surcharge is added to the base 2018 highway trip table, the resulting travel demands are assumed to be representative of Year 2018 travel. Trip generation estimates for each proposed project were developed based on the appropriate Institute of Traffic Engineers (ITE) trip generation rates.

4. Model Validation and Calibration

The commission has many years of experience with these models, which have produced accurate travel estimates and forecasts. We keep our models up to date by constantly validating parameters and outputs with current travel surveys, traffic and transit counts, and census data. In 1985 this forecasting process was subjected to extensive validation and recalibration, based on the data from the 1980 Census Urban Transportation Planning Package (UTPP). We have accomplished a similar validation with the 1990 data received from the Census in 1993. Our 1988 home-interview survey also provided data for the 1990 model validation effort especially for non-work travel which is not a part of the census data.

One test of this simulation model's validity is its ability to replicate counted highway link volumes. To date DVRPC's model, using appropriate census tract socio-economic and network inputs, has successfully replicated traffic counts taken in 1970, 1980, 1987, and 1990 with minimal modifications to the model.

V. PROJECTED TRAFFIC VOLUMES

In this section, a description of the two alternatives evaluated will be given followed by current and projected traffic volumes for the Northern Terminus.

1. Alternatives

In the traffic analysis, two alternatives consisting of a No-Build Alternative and an Bypass Alternative were evaluated. These alternatives focus on the highway improvements between Montgomeryville and Doylestown.

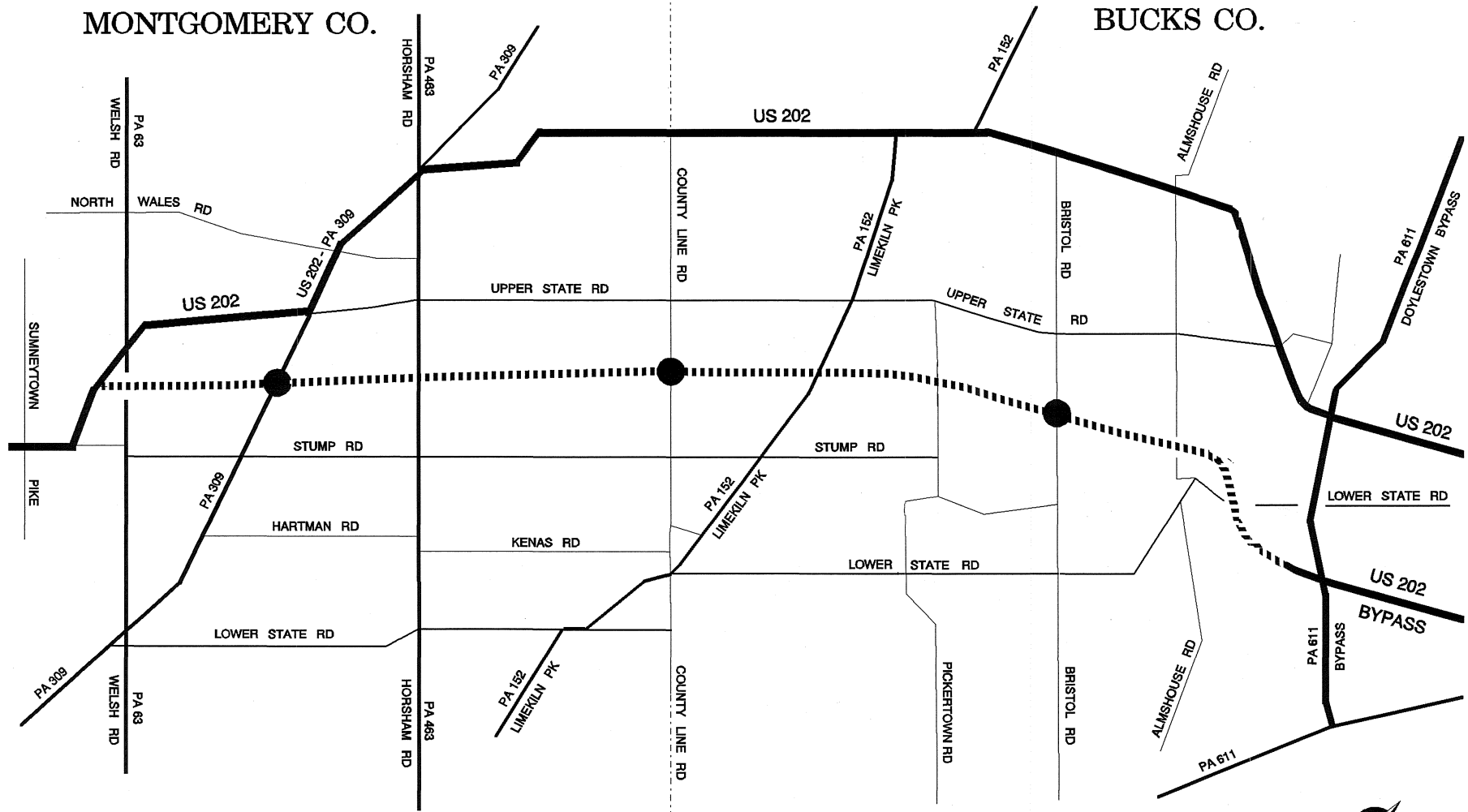
No-Build Alternative

In this alternative, no corridor-wide improvements are made to US 202. Selected improvements at isolated locations, projects that were programmed in the annual element of PennDOT's Twelve Year Program or were listed on DVRPC's 1992-1997 Transportation Improvement Program (TIP), were incorporated in this scenario. Outside of the corridor, the No-Build Alternative includes all highways that were currently opened to traffic or included in DVRPC's TIP. In prior US 202 Section 700 studies the PA 611/Broad Street interchange was modeled as a partial interchange. Subsequent to these studies, a project to construct a full interchange was placed on DVRPC's TIP, therefore in this study a full interchange was modeled. Construction of a left turn lane on US 202 at PA 263, which is programmed on DVRPC's TIP, was also included in the No-Build network.

Proposed US 202 Bypass Alternative

This alternative assumes the construction of a new four-lane expressway built on a new alignment between PA 63 and the Doylestown Bypass (See Figure 3). The new alignment would be located between Stump Road and Upper State Road from just west of PA 63 to Bristol Road. From there, it would angle to the south over Almshouse, Lower State, Wells, and New Britain Roads before intersecting with the Doylestown Bypass at the existing cloverleaf interchange with the Doylestown Bypass. Interchanges will be located at PA 309, County Line Road, and Bristol Road.

Figure 3 : US 202 BYPASS ALTERNATIVE



DELAWARE VALLEY REGIONAL PLANNING COMMISSION
February 1997

	PROPOSED EXPRESSWAY
●	INTERCHANGES



SCHEMATIC NOT TO SCALE

2. Current and Year 2018 Daily Traffic Volumes

Current daily traffic volumes and Year 2018 daily volumes for the No-Build and Bypass Alternatives are presented and analyzed in this part of the supplement. A comparison of current and Year 2018 traffic volumes are presented in Table 7. In the table the first two columns specify the roadway segment and current AADT. The next three columns contain 2018 No-Build AADT and the absolute difference and percent difference between 2018 No-Build and current traffic volumes. In a similar fashion, the last three columns present 2018 Build AADT and the absolute difference and percent difference between the No-Build and Bypass traffic volumes.

In Figure 4, which displays the traffic volumes for roadway segments in the US 202 Corridor, the numbers above the line represent Year 2018 traffic volumes; the number on top represents the volume of the Bypass Alternative, while the number immediately below it represents the volume of the No-Build Alternative. The number below the line is the corresponding current traffic count. In a similar fashion, Figure 5 provides more detailed traffic volumes for the PA 611 Bypass and its interchanges with Broad Street, PA 313 (Swamp Road), and PA 611 (Easton Road). Figure 6 focuses on the roads in the immediate Doylestown area.

Current traffic counts generally represent average daily traffic volumes (AADT) collected by DVRPC in November 1996. A comparison of the Year 2018 traffic volumes with projections published in previous Section 700 supplements would reveal minor differences, the variations are attributable to: 1) Addition of secondary and local roads to the highway network as part of the focused simulation process, 2) Assumption of a full interchange at Broad Street, 3) Additional traffic counts used to calibrate the highway network, and 4) Minor changes in computer methods. Traffic simulation models have a 5-15 percent accuracy depending upon highway type. The new focused simulation volumes fall well within this range when compared to the published volumes; an exception is PA 611 Bypass between State Street and Broad Street where the discrepancy is due to the assumption of a full interchange.

3. Daily Volumes for Additional Roadway Segments in the US 202 Corridor

As shown in Figure 4, US 202 Bypass currently carries between 9,500 to 11,400 vehicles per day. Just north of PA 313, where traffic from State Street and Swamp Road funnel into US 202, the current volume is 22,200 vehicles per day. Traveling further north on US 202, the magnitude of

Table 7: A COMPARISON OF CURRENT AND YEAR 2018 AVERAGE ANNUAL DAILY TRAFFIC VOLUMES (AADT) UNDER THE NO-BUILD AND BYPASS ALTERNATIVES

Roadway Segment	Current AADT	2018 No-Build	Absolute Difference	Percent Difference	2018 Build	Absolute Difference	Percent Difference
US 202 Bypass							
- PA 152 to PA 611 Bypass (proposed)	-	-	-	-	45.2	-	-
- PA 611 Bypass to Main Street	9.5	11.6	2.1	22.1	29.9	18.3	157.8
- Main Street to State Street	11.4	13.8	2.4	21.1	23.5	9.7	70.3
US 202							
- Upper State Rd. to PA 611 Bypass	21.2	27.7	6.5	30.7	16.0	-11.7	-42.2
- PA 611 Bypass to Main Street	15.6	17.2	1.6	10.3	14.9	-2.3	-13.4
- Main Street to Swamp Rd.	12.7	14.2	1.5	11.8	14.0	-0.2	-1.4
- Swamp Rd. to Mechanicsville Rd.	22.2	25.5	3.3	14.9	30.4	4.9	19.2
- Mechanicsville Rd. to PA 413	15.8	18.8	3.0	19.0	23.1	4.3	22.9
- South of PA 263	21.4	26.2	4.8	22.4	29.2	3.0	11.5
- PA 263 to Aquetong Rd.	15.1	19.1	4.0	26.5	19.8	0.7	3.7
PA 611 Bypass							
- Easton Rd. (PA 611) to US 202 Bypass	19.2	24.9	5.7	29.7	30.2	5.3	21.3
- US 202 Bypass to US 202	26.7	30.8	4.1	15.4	52.4	21.6	70.1
- US 202 to Broad Street	23.8	27.8	4.0	16.8	40.1	12.3	44.2
- Broad St. to Swamp Road (PA 313)	27.8	31.2	3.4	12.2	42.5	11.3	36.2
- Swamp Road (PA 313) to Easton Rd. (PA 611)	10.7	16.1	5.4	50.5	24.9	8.8	54.7

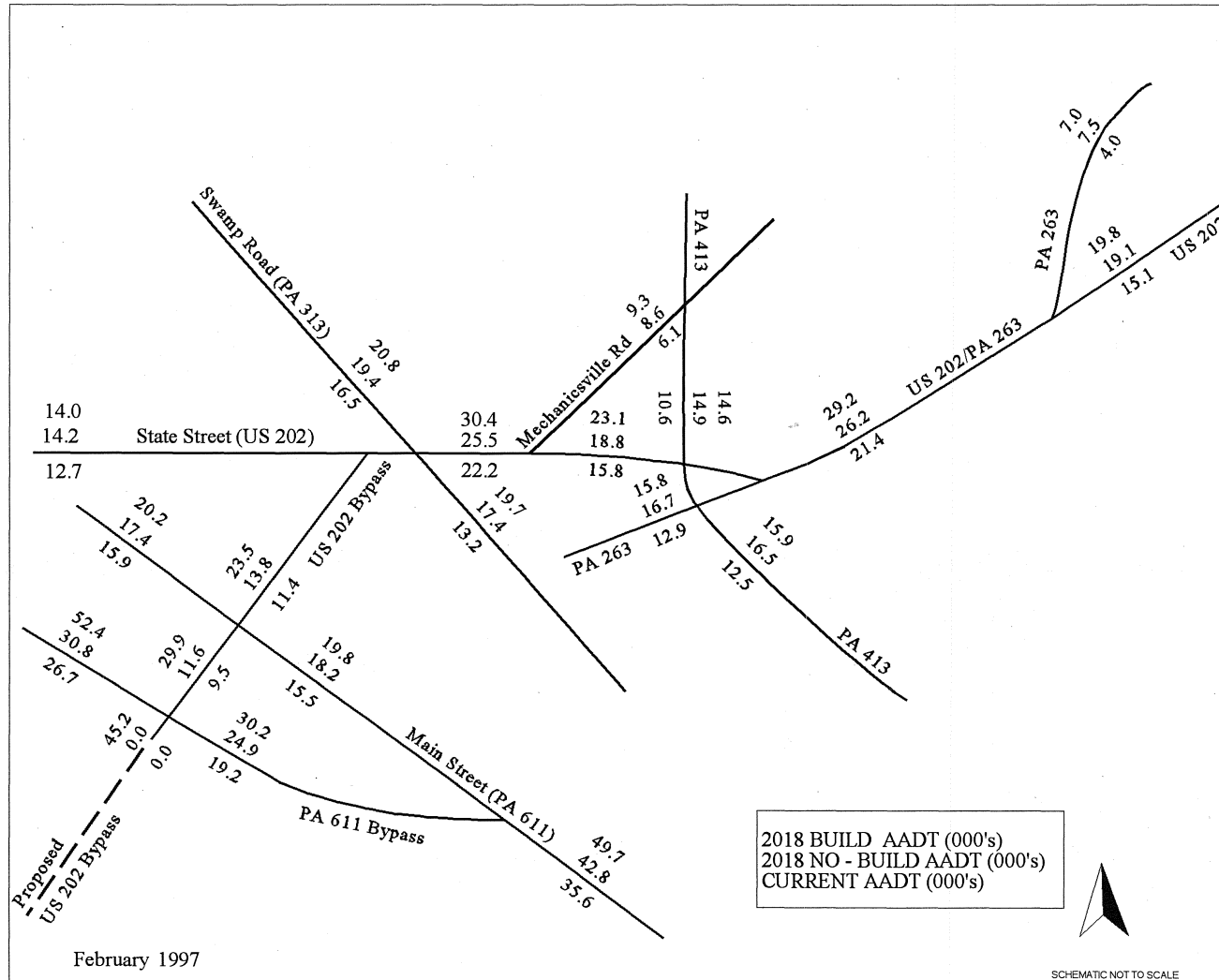
Table 7: A COMPARISON OF CURRENT AND YEAR 2018 AVERAGE ANNUAL DAILY TRAFFIC VOLUMES (AADT) UNDER THE NO-BUILD AND BYPASS ALTERNATIVES (Cont.)

Roadway Segment	Current AADT	2018 No-Build	Absolute Difference	Percent Difference	2018 Build	Absolute Difference	Percent Difference
PA 611 Business in Doylestown Borough							
- Furlong Rd. to PA 611 Bypass	35.6	42.8	7.2	20.2	49.7	6.9	16.1
- PA 611 Bypass to US 202 Bypass	15.5	18.2	2.7	17.4	19.8	1.6	8.8
- US 202 Bypass to State Street (US 202)	15.9	17.4	1.5	9.4	20.2	2.8	16.1
- State Street (US 202) to Swamp Road (PA 313)	15.3	17.5	2.2	14.4	17.8	0.3	1.7
- Swamp Road (PA 313) to PA 611 Bypass	12.9	15.4	2.5	19.4	15.1	-0.3	-1.9
- Ferry Rd. to Curley Hill Rd.	19.8	27.3	7.5	37.9	32.1	4.8	17.6
Swamp Road (PA 313)							
- Spring Valley Rd. to US 202	13.2	17.4	4.2	31.8	19.7	2.3	13.2
- US 202 to Cold Spring Creamery Road	16.5	19.4	2.9	17.6	20.8	1.4	7.2
- Cold Spring Creamery Road to Main St. (PA 611)	16.7	19.1	2.4	14.4	20.8	1.7	8.9
- Main St. (PA 611) to PA 611 Bypass	21.3	25.5	4.2	19.7	27.3	1.8	7.1
- PA 611 Bypass to Ferry Rd.	19.0	23.0	4.0	21.1	24.1	1.1	4.8
PA 263							
- South of PA 413	12.9	16.7	3.8	29.5	15.8	-0.9	-5.4
- US 202 to Aquetong Rd.	4.0	7.5	3.5	87.5	7.0	-0.5	-6.7
PA 413							
- Upper Mountain Rd. to US 202	12.5	16.5	4.0	32.0	15.9	-0.6	-3.6
- US 202 to Mechanicsville Rd.	10.6	14.9	4.3	40.6	14.6	-0.3	-2.0

Table 7: A COMPARISON OF CURRENT AND YEAR 2018 AVERAGE ANNUAL DAILY TRAFFIC VOLUMES (AADT) UNDER THE NO-BUILD AND BYPASS ALTERNATIVES (Cont.)

Roadway Segment	Current AADT	2018 No-Build	Absolute Difference	Percent Difference	2018 Build	Absolute Difference	Percent Difference
Broad Street							
- East of PA 611 Bypass	5.5	8.8	3.3	60.0	9.2	0.4	4.5
- West of PA 611 Bypass	3.0	7.7	4.7	156.7	8.8	1.1	14.3
Mechanicsville Road							
- US 202 to PA 413	6.1	8.6	2.5	41.0	9.3	0.7	8.1
- PA 413 to Street Road	6.2	9.1	2.9	46.8	9.9	0.8	8.8
Cold Spring Creamery Road							
- North of PA 313	8.4	11.8	3.4	40.5	11.8	0.0	0.0
- South of PA 413	4.7	8.1	3.4	72.3	8.4	0.3	3.7
Ferry/Point Pleasant Road							
- Swamp Pike (PA 313) to PA 611	3.6	7.8	4.2	116.7	7.6	-0.2	-2.6
- PA 611 to PA 413	3.8	8.4	4.6	121.1	8.7	0.3	3.6

Figure 4: Current and Year 2018 Average Annual Daily Traffic Volumes (AADT) - US 202 Corridor



traffic gradually lessens as vehicles turn off US 202 onto Mechanicsville Road, PA 263, other secondary roads, or driveways to reach their destination. Just north of PA 263 in Lahaska, US 202 carries 15,100 vehicles.

Under the No-Build Alternative traffic on the existing US 202 Bypass increases by about 2,000 vehicles and on US 202 above PA 313 by 3,000-4,800 vehicles per day. In general this corresponds to a 14.9-26.5 percent increase. The larger increase north of PA 313 is directly attributable to residential development occurring in this portion of the study area.

The Proposed Bypass is projected to carry 45,200 vehicles per day. Under the Bypass Alternative, traffic on existing US 202 Bypass is expected to increase between 9,700 to 18,300 vehicles per day over the No-Build Alternative.

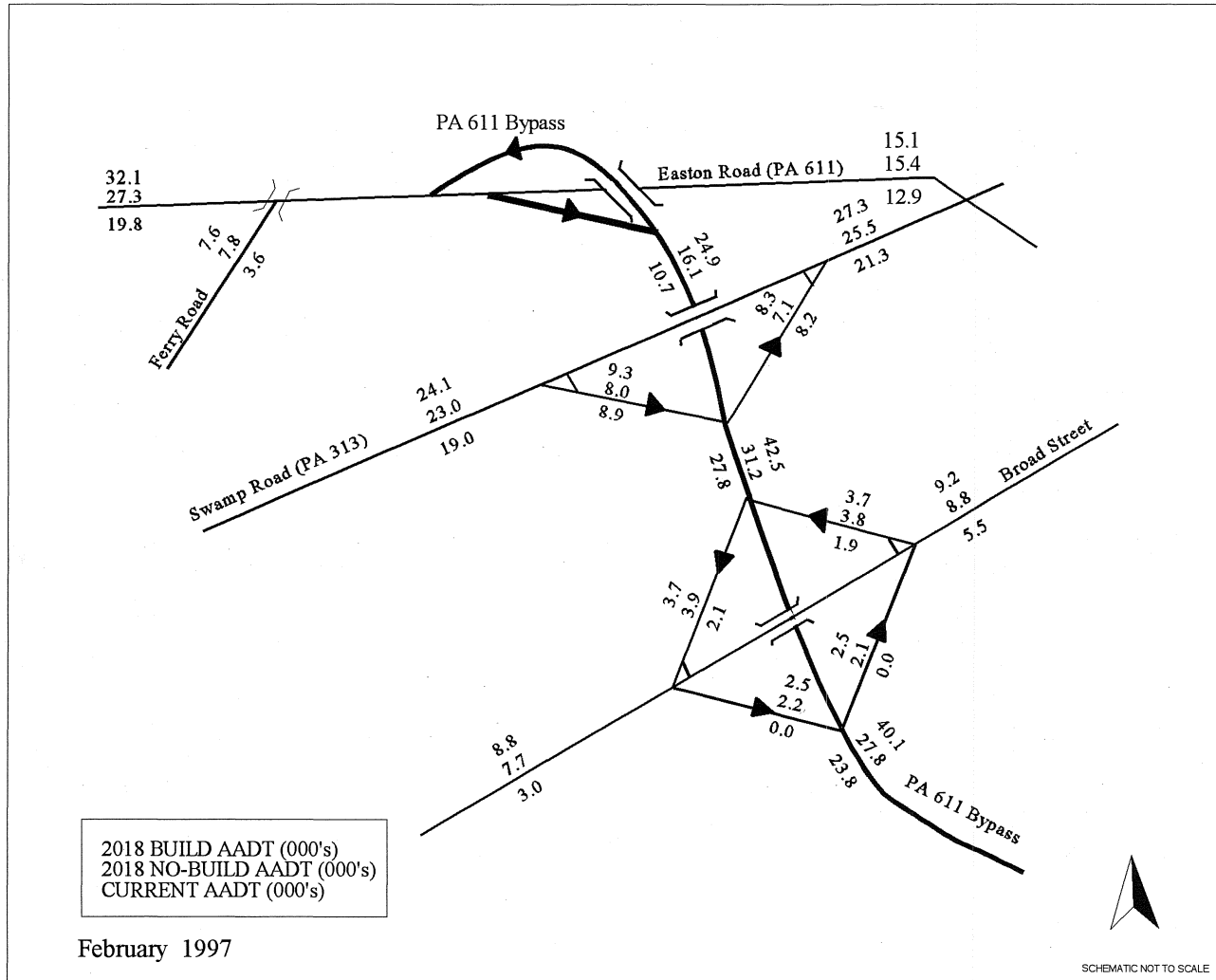
On US 202 just north of PA 313, the Bypass will increase traffic by 4,900 vehicles or 19.2 percent over No-Build conditions. The impact of the Proposed Bypass gradually diminishes further north on US 202 for similar reasons that existing traffic dwindles. Between PA 413 and Lahaska, there will be a 3,000 vehicle increase (11.5%) and north of PA 263 there will be only a 700 vehicle difference (3.7%).

Roads intersecting US 202 in Buckingham Township show a significant percent increase in traffic between now and Year 2018. Even though they will have only a modest increase in the magnitude of traffic, in the range of 2,500-4,500 vehicles per day, their current volumes are so low that the corresponding percent increase generally range between 30-45 percent. With the proposed Bypass, traffic on PA 313 (Swamp Road) east of US 202 will increase by 2,300 vehicles, west of US 202 by 1,400 vehicles; and on Mechanicsville Road by 700 vehicles. All three increases are smaller than their corresponding increases between current and No-Build conditions. Constructing the Bypass will provide some traffic relief to PA 263 south of PA 413 and to State Street (US 202) in Doylestown Borough.

4. Daily Volumes for Additional Roadway Segments in the PA 611 Bypass Corridor

Traffic volumes in the PA 611 Bypass corridor are presented in Figure 5. The Bypass currently carries 23,800 vehicles per day between US 202 (State Street) and Broad Street. North of Broad Street the traffic increases to 27,800 because of 4,000 vehicles entering or exiting at Broad Street.

Figure 5: Current and Year 2018 Average Annual Daily Traffic Volumes (AADT) - PA 611 Bypass Corridor



In a similar manner traffic drops to 10,700 vehicles per day north of PA 313 (Swamp Road) due to 17,100 vehicles entering or exiting at Swamp Road. After the merge with Easton Road, PA 611 carries a daily volume of 19,800 vehicles per day.

In the No-Build Alternative the new ramps at Broad Street are projected to carry 4,300 vehicles per day. Partially, as a result of the ramps, traffic on PA 611 Bypass between State Street (US 202) and Broad Street will increase by 4,000 vehicles. Another consequence of the new ramps is that traffic on the Swamp Road ramps will decrease by 2,000 vehicles per day due to diversion of traffic from Swamp Road to Broad Street. The benefits of the proposed ramps on Swamp Road are actually much greater than observed because traffic increases on Swamp Road somewhat offset the traffic reduction.

West of Ferry Road, traffic on PA 611 will increase by 7,500 vehicles under the Year 2018 No-Build. This increase is partially carried along PA 611 Bypass causing a 5,400 vehicle increase between PA 313 (Swamp Road) and Eastern Road.

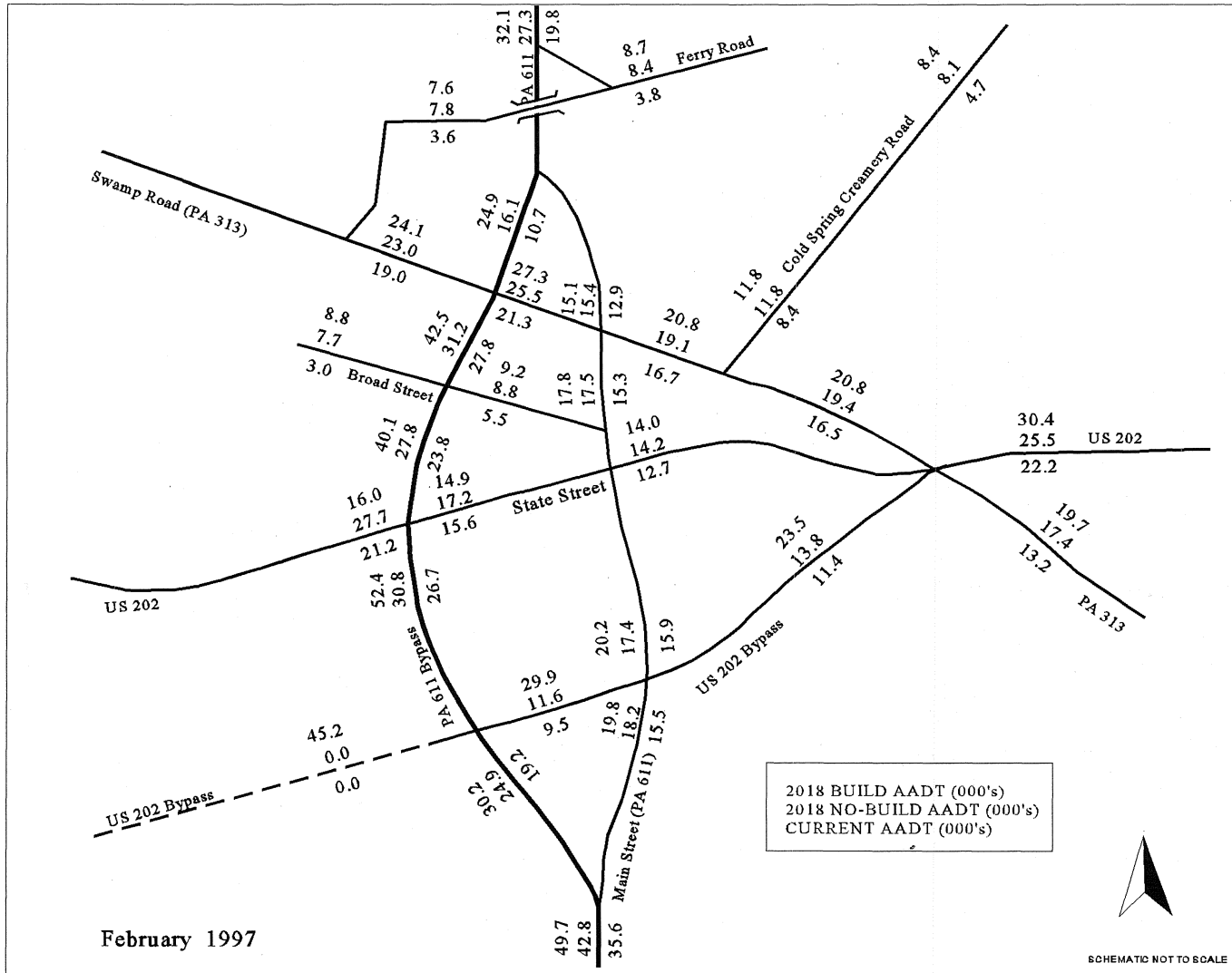
Under the Bypass Alternative traffic on this portion of the PA 611 Bypass increases in the range of 8,800-12,300 vehicles per day. Traffic volumes on the Broad Street and Swamp Road ramps increase by 700 and 2,500 respectively permitting local residents to take advantage of the proposed Bypass. PA 611 west of Ferry Road, will increase by 4,800 vehicles, a 17.6 percent increase, over No-Build conditions.

Swamp Road currently carries 19,000 vehicles west of PA 611 Bypass and 21,300 east of the Bypass. Under the No-Build Alternative both segments will experience an increase of about 4,000 vehicles resulting in 21.1 percent and 19.7 percent increase respectively. Again, these increases would be much greater if not for the diversion of traffic to the new Broad Street ramps. With the proposed Bypass, there will be a more modest increase of 1,100 and 1,800 vehicles respectively resulting in a volume of 24,100 west of the Bypass and 27,300 east of the Bypass.

5. Daily Volumes for Additional Roadway Segments in the Doylestown Area

Traffic impacts on the highway network in the immediate vicinity of Doylestown are presented in Figure 6. Traffic impacts on US 202 Bypass, PA 611 Bypass and PA 313 (Swamp Road) have been previously reviewed.

Figure 6: Current and Year 2018 Average Annual Daily Traffic Volumes (AADT) - Doylestown Area



Existing US 202 (State Street) currently carries 21,200 vehicles south of PA 611 Bypass and about 12,700-15,600 vehicles inside Doylestown Borough. By 2018, traffic on US 202 will increase by 6,500 vehicles (30.7%) south of PA 611 Bypass and about 1,500 vehicles (about 11%) in Doylestown Borough. Construction of the proposed Bypass will provide traffic relief to US 202 arterial. South of the PA 611 Bypass there will be a 11,700 vehicle decrease in traffic (42.2%), between the PA 611 Bypass and Main Street a 2,300 vehicle decrease (13.4%), and between Main Street and Swamp Road a 200 vehicle decrease (1.4%).

Constructing the Bypass will have a direct affect on lower PA 611 Bypass. Traffic on PA 611 Bypass between the proposed US 202 Bypass and State Street will increase by 21,600 vehicles due to changes in travel patterns as motorists who used existing US 202 will now use this portion of PA 611 Bypass to reach such locations as Cross Keys and Plumstead Township. Traffic volume on PA 611 Bypass between US 202 Bypass and Main Street will also increase under the Build Alternative as local residents use secondary roads (e.g. Edison Furlong Road, Almshouse Road, and Bristol Road) to reach PA 611 and backtrack to the Bypass. Due to the reorientation of traffic patterns, PA 611 south of PA 132 (Street Road) will experience a traffic reduction when compared to No-Build conditions.

Secondary roads in the area - Cold Spring Creamery Road and Ferry Road - all show traffic volume increases between now and Year 2018. Any additional increase associated with the proposed Bypass is minor.

6. Traffic Diversion

Construction of the Bypass will increase traffic on US 202 and other major access roads in the Northern Terminus. While a few roads will experience higher traffic volumes, many other roads will experience a reduction in traffic as motorists change travel patterns to benefit from the new roadway. As previously discussed, the largest traffic reduction will occur on existing US 202 south of PA 611 Bypass where 11,700 vehicles or 42.2 percent of the No-Build traffic diverts to the new bypass. On US 202 in Doylestown Borough the diversion is not as significant since through traffic largely uses the existing bypass to avoid the borough and only local residents will be impacted. Even with this limitation, there is still a 2,300 vehicle reduction (13.4%) on US 202 between PA 611 Bypass and Main Street.

To better understand the regional impact of the proposed Bypass, a screen line analysis was conducted along PA 413. In this analysis traffic on roads crossing PA 413 were examined to determine which roads will gain traffic because of the Bypass and which will experience volume reductions because of traffic diversions. Table 8 shows three roads will be adversely impacted by the Bypass - US 202, Mechanicsville Road, Cold Spring Creamery Road. However, the impacts on the latter two roads are minor, only in the range of 300-700 vehicles. Off-setting these increases are reductions to other roadways such as Stump Road, Danboro Point Pleasant Road, PA 263, and PA 232. Again, because of small volumes, less than 1,000 vehicles per day, the benefits are also not significant.

7. Truck Factor

Truck activity on US 202 is another concern expressed by the municipalities. The truck factor, known as "T" factor, is used to represent the amount of truck traffic on a highway. This factor is derived by dividing the number of trucks on the highway by the total vehicles counted, and is expressed as a percent. The definition of trucks excludes 2-axel light trucks and buses shorter than 11.5 ft.

For the proposed US 202 Bypass a daily truck factor of 9.0% was indicated in Supplement No. 3. This was based upon truck classification counts and a review of historical data from the last 30 years. For US 202 arterial in Buckingham and Solebury Townships, the daily truck factor is 8.0%.

Table 8: COMPARISON OF TRAFFIC VOLUMES UNDER THE NO-BUILD AND BYPASS ALTERNATIVES FOR A SCREENLINE SOUTH OF PA 413

Facility	Difference Between No-Build and Bypass	
	Decreases	Increases
PA 563	-400	-
PA 113	-500	-
Stump Road	-800	-
Danboro Point Pleasant Road	-200	-
Cold Spring Creamery Road	-	300
Mechanicsville Road	-	700
US 202	-	4300
PA 263	-900	-
PA 232	-200	-
PA 413	-800	-
I-95	-1100	-
Total	-4900	5300

VI. TRAFFIC SENSITIVITY ANALYSIS

One of the questions posed in the population discussion by Buckingham Township is how sensitive are the traffic forecasts to a relative change in the population estimate. This question is addressed in this chapter.

To examine the sensitivity of the traffic forecasts to changes in population, DVRPC assumed increases in the population of three municipalities in the Northern Terminus, revised the trip table based upon the new demographics, and reran the travel simulation model with the revised trip table. Table 9 shows 1990 and estimated Year 2018 population for Buckingham Township, Plumstead Township, and Solebury Township. In aggregate their 1990 population is 21,651, their estimated 2018 population is 33,936 representing a 56.7 percent increase. The Year 2018 population of the three municipalities was increased by 12,000 as follows: Buckingham Township by 5,000, Plumstead by 4,000, and Solebury by 3,000. As a result the revised aggregate population of 45,936 now represents a 112.2 percent increase over 1990 levels.

Changes to the volume forecasts are summarized in the lower half of Table 9. For the principal highways in the Northern Terminus, the table shows the range of current counts, the range of No-Build volumes previously reported, and the range of Build volumes previously reported. To the right of the No-Build and Bypass columns is the corresponding range of percent increase that DVRPC obtained from model runs with the revised demographics.

For the No-Build Alternative, the addition of 12,000 people to the base population will only increase the forecasted volumes by a maximum of 8.6 percent on the Doylestown Bypass, US 202 and PA 611. Detailed examination of link level data indicates those links furthest away from the three affected townships displayed the least change, while links in the affected municipalities show the greatest variance. The Bypass Alternative shows traits similar to the No-Build Alternative. When compared to the No-Build percent increases being forecast (typically in the range of 15-30%), the impact of a larger population base is generally small.

The model is much less sensitive to a change in population than would be expected for a number of reasons: 1) The population was only changed in three municipalities by 12,000 people, the underlying regional population of over five million people was essentially unaffected, 2)

Employment estimates were not changed thus keeping all employment based trip productions constant, and 3) US 202, PA 611, and the Doylestown Bypass are principal arterials that by definition carry a higher number of through trips and are more immune to localized population changes. As observed in Table 9, secondary roads and local roads, such as Cold Spring Creamery Road or Mechanicsville Road, which are more sensitive to local land use or population changes did show a greater variance than the major roads.

Table 9: SENSITIVITY OF TRAFFIC PROJECTIONS TO A CHANGE IN THE POPULATION FORECAST

CHANGE IN POPULATION GROWTH					
	1990	2018	% Increase To 1990	Assumed Population	% Increase To 1990
Buckingham Twp	9,364	17,227	84.0	22,227	137.4
Plumstead Twp	6,289	7,240	15.1	11,240	78.7
Solebury Twp	5,998	9,969	57.9	12,469	107.9
Total	21,651	33,936	56.7	45,936	112.2

SENSITIVITY OF TRAFFIC PROJECTIONS (AADT IN 000's)

<u>Facility</u>	<u>Range of Current Counts</u>	<u>Range of No-Build AADT's</u>	<u>Range of % Impact on Traffic</u>	<u>Range of Proposed Build AADT's</u>	<u>Range of % Impact on Traffic</u>
PA 611 Bypass -Main St. to Easton Rd.	10.7-27.8	16.1-31.2	0.2-4.0%	24.9-52.4	0.2-3.4%
PA 611 -Furlong Rd. -Curley Hill Rd	12.9-35.6	15.4-42.8	0.5-7.3%	15.1-49.7	0.7-7.3%
US 202 Bypass -PA 611 Byp to State St.	9.5-11.4	11.6-13.8	0.8-4.8%	23.5-29.9	2.1-5.1%
US 202 -Main St. -Aquetong Rd.	12.7-22.2	14.2-26.2	0.0-8.6%	14.0-30.4	0.0-5.0%
Mechanicsville Rd - US 202 to Street Road	6.1-6.2	8.6-9.1	2.9-20.0%	9.3-9.9	2.0-34.5%
Cold Spring Creamry Rd. - North of PA 313 to South of PA 413	4.7-8.4	8.1-11.8	0.0-10.9%	8.4-11.8	1.3-9.7%

VII. SELECTED LINK ANALYSIS

In order to determine the projected Year 2018 geographical distribution of the origins of motorists using US 202 in the Northern Terminus, a selected link analysis was performed for three links - the proposed US 202 Bypass between Bristol Road and PA 611 Bypass, US 202 between Swamp Road (PA 313) and Mechanicsville Road, and at the US 202 toll bridge across the Delaware River. This analytical technique identifies the origin of each trip assigned to the facility in question by DVRPC's travel simulation model.

The number of trip origins from an area using a given highway section indicates the usage of this facility by the residents and persons employed in this area. The origin total includes all types of travel to destinations both within and outside of the DVRPC region - persons traveling by auto to or from work, shopping, social recreation and other activities as well as any truck or taxi trips.

The results of the technique are summarized based on a series of geographic sections that consist of municipalities in the Northern Terminus area, other municipalities in the Bucks County portion of the Section 700 corridor, other municipalities in Bucks County, municipalities from the Montgomery County portion of Section 700, other Montgomery County municipalities, and other areas. Other areas not only include trips from other counties in the DVRPC region besides Bucks and Montgomery, but also from cordon stations located at DVRPC's regional boundary.

Tables 10 through 12 show the distribution of trip origins for each of the selected links as well as the difference between the No-Build and Bypass alternatives. For the proposed US 202 Bypass only the Build Alternative is presented.

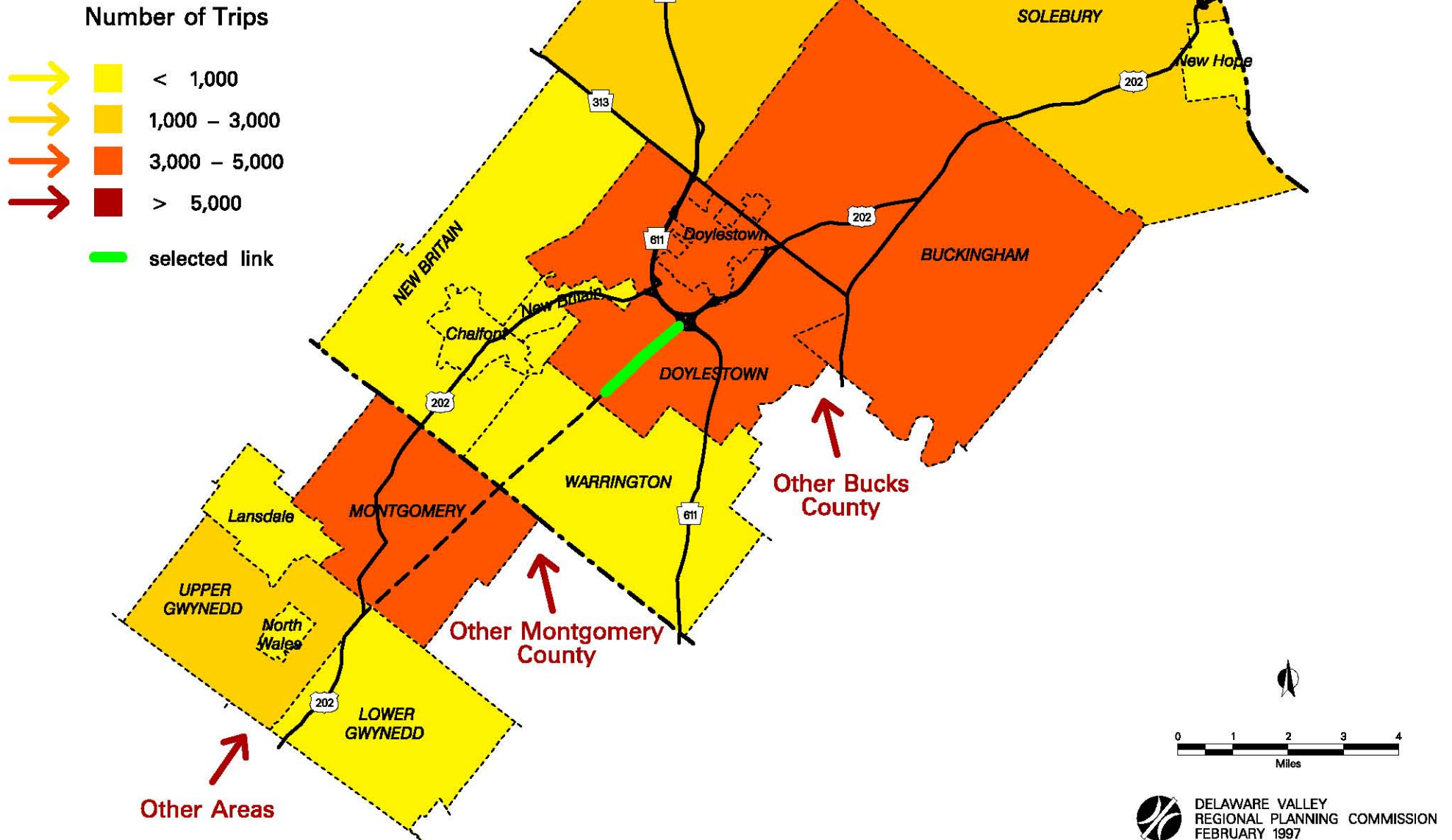
1. Proposed US 202 Bypass Between Bristol Road and PA 611 Bypass

Results of this analysis is presented in Table 10 and shown graphically in Figure 7. Municipalities in the Northern Terminus account for 31.2 percent of the traffic on the proposed Bypass or about 14,100 trips. Trips from the Montgomery County portion of Section 700, other Bucks County, other Montgomery County, and trips other areas each contribute between 14 to 19 percent of the traffic.

**Table 10: SELECTED LINK ANALYSIS FOR THE PROPOSED US 202 BYPASS
BETWEEN BRISTOL ROAD AND PA 611 BYPASS**

<u>Municipality</u>	<u>Trip Origins</u>	<u>% of Total</u>
Buckingham Twp	3127	6.9
Doylestown Boro	3367	7.5
Doylestown Twp	4846	10.7
New Hope Boro	316	0.7
Plumstead Twp	1401	3.1
Solebury Twp	<u>1040</u>	<u>2.3</u>
Subtotal	14097	31.2
Chalfont Boro	362	0.8
New Britain Boro	180	0.4
New Britain Twp	497	1.1
Warrington Twp	<u>723</u>	<u>1.6</u>
Subtotal	1762	3.9
Other Bucks Co.	7840	17.3
Lower Gwynedd Twp	542	1.2
Montgomery Twp	4883	10.8
Upper Gwynedd Twp	<u>1220</u>	<u>2.7</u>
Subtotal	6645	14.7
Other Montgomery Co.	8329	18.5
Other areas	<u>6527</u>	<u>14.4</u>
Total	45200	100.0

Figure 7
TRIP ORIGINS FOR THE PROPOSED
US 202 BYPASS BETWEEN
BRISTOL ROAD AND PA 611 BYPASS



Montgomery and Doylestown Townships, located at either terminus of the Bypass, each account for about 10.7 percent of the traffic or 4,900 trips. Doylestown Borough generates 7.5 percent of the origins (3,367 trips), Buckingham Township 6.9 percent (3,127 trips), Plumstead Township 3.1 percent (1,401 trips), and Solebury Township 2.3 percent (1,040) trips.

2. US 202 Between Swamp Road and Mechanicsville Road

Trip origins using US 202 between Swamp Road and Mechanicsville Road are presented in Table 11. Under the No-Build Alternative, 50.3 percent of the traffic on this link is attributable to municipalities in the Northern Terminus area. Other areas account for 11.7 percent of the trips, other parts of Bucks County 11.9 percent, other Montgomery County 10.6 percent, the Montgomery County portion of Section 700 8.8 percent, and the Buck County portion of Section 700 6.7 percent.

Among the municipalities, Buckingham Township will generate 25.8 percent of the traffic, other major generators include Doylestown Borough (9.9%), Solebury Township (6.7%), Doylestown Township (5.4%), and Montgomery Township (5.0%).

Under the proposed US 202 Bypass Alternative there will be a significant increase in trips from the Northern Terminus, close to 1,300 additional trip origins; however, the rate of growth from some other areas will be greater resulting in a lower proportion of trips from the Northern Terminus. Under the Bypass Alternative the Northern Terminus will generate 46.4 percent of the total trips on US 202. Total trips origins on this link under the Bypass Alternative are displayed in Figure 8, additional trip origins generated by the Proposed Bypass are shown in Figure 9.

Other areas and other Montgomery County are projected to have the largest increase in trip origins on US 202 due to the proposed Bypass, raising their respective percentages to 15.0 percent and 12.6 percent. The Montgomery County portion of Section 700 is expected to be a modest beneficiary of the proposed Bypass with 674 additional trip origins. Trip origins from the Bucks County portion of Section 700 corridor and from other Bucks County areas will experience minor increases under the Bypass Alternative due to the location of the proposed Bypass relative to these areas.

Buckingham Township, with 561 additional trips, still remains the largest generator of traffic on

**Table 11: SELECTED LINK ANALYSIS FOR US 202 BETWEEN
SWAMP ROAD AND MECHANICSVILLE ROAD**

<u>Trip Origin</u>	<u>2018 No-Build</u>		<u>Proposed US 202</u>		<u>Difference</u>	<u>Percent Difference</u>
	<u>Origins</u>	<u>% of Total</u>	<u>Origins</u>	<u>% of Total</u>		
Buckingham Twp	6,579	25.8	7,140	23.5	561	8.5
Doylestown Boro	2,525	9.9	2,554	8.4	29	1.1
Doylestown Twp	1,377	5.4	1,459	4.8	82	6.0
New Hope Boro	612	2.4	730	2.4	118	19.3
Plumstead Twp	26	0.1	32	0.1	6	23.1
Solebury Twp	<u>1,709</u>	<u>6.7</u>	<u>2,189</u>	<u>7.2</u>	<u>480</u>	<u>28.1</u>
Subtotal	12,828	50.3	14,104	46.4	1,276	9.9
Chalfont Boro	255	1.0	304	1.0	49	19.2
New Britain Boro	280	1.1	281	0.9	1	0.4
New Britain Twp	408	1.6	456	1.5	48	11.8
Warrington Twp	<u>765</u>	<u>3.0</u>	<u>821</u>	<u>2.7</u>	<u>56</u>	<u>7.3</u>
Subtotal	1,708	6.7	1,862	6.1	154	9.0
Other Bucks Co.	3,035	11.9	3,131	10.3	96	3.2
Lower Gwynedd Twp	204	0.8	303	1.0	99	48.5
Montgomery Twp	1,275	5.0	1,794	5.9	519	40.7
Upper Gwynedd Twp	<u>765</u>	<u>3.0</u>	<u>821</u>	<u>2.7</u>	<u>56</u>	<u>7.3</u>
Subtotal	2,244	8.8	2,918	9.6	674	30.0
Other Montgomery Co.	2,703	10.6	3,830	12.6	1,127	41.7
Other areas	<u>2,982</u>	<u>11.7</u>	<u>4,555</u>	<u>15.0</u>	<u>1,573</u>	<u>52.7</u>
Total:	25,500	100.0	30,400	100.0	4,900	19.2

Figure 8
TRIP ORIGINS ON US 202
BETWEEN PA 313 AND
MECHANICSVILLE ROAD
UNDER THE BYPASS ALTERNATIVE

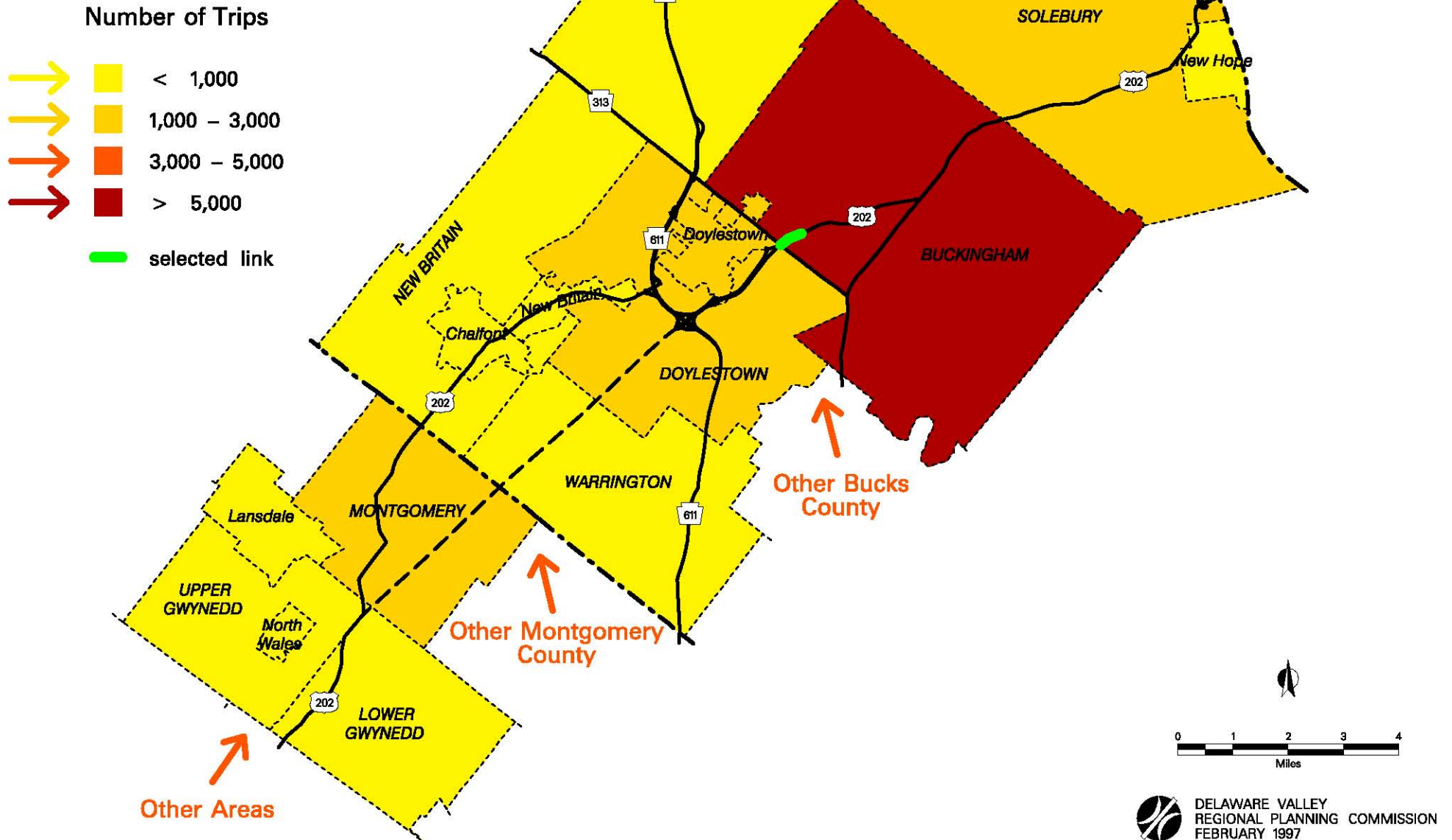
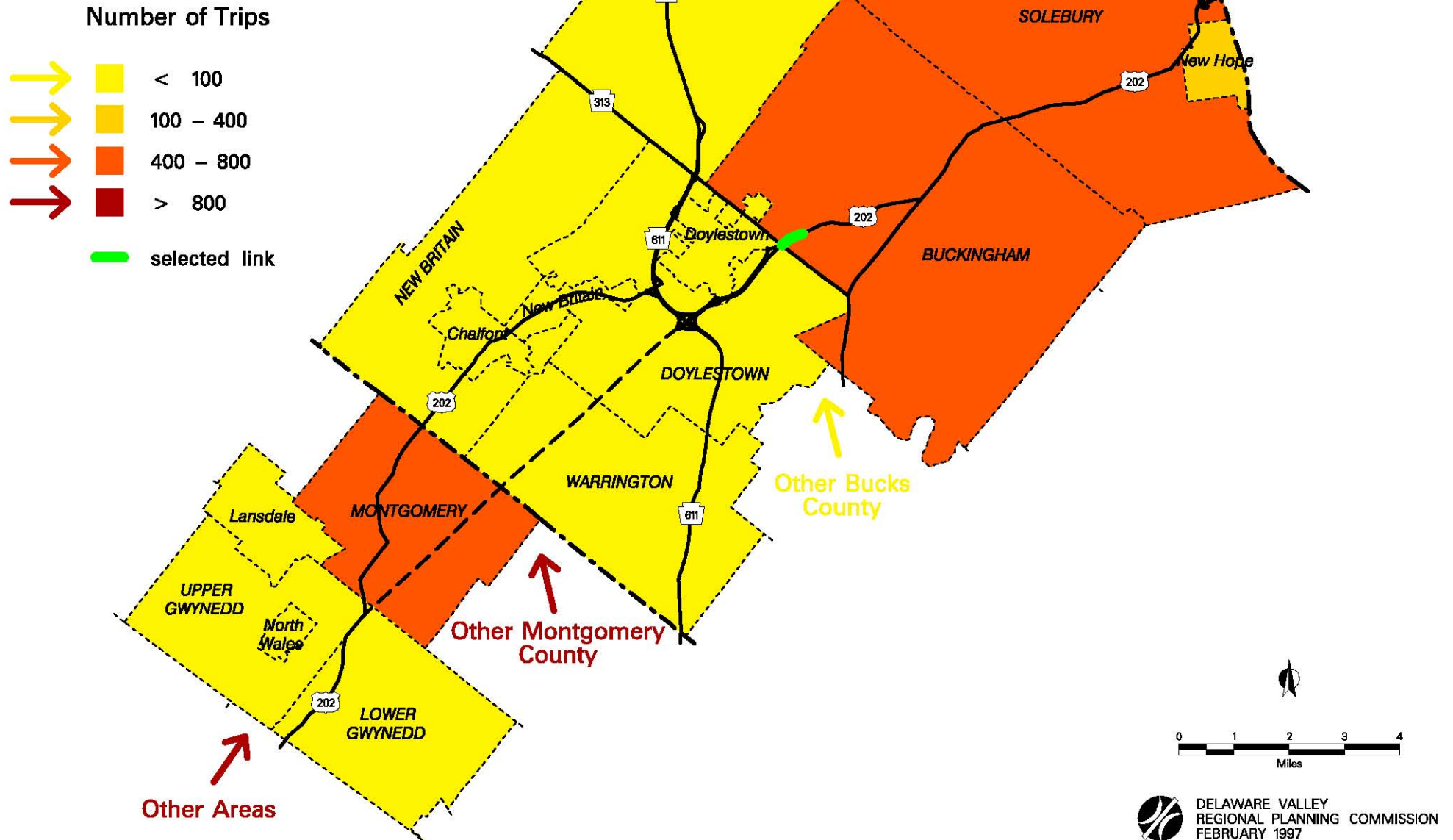


Figure 9
INCREASE IN TRIP ORIGINS DUE TO
PROPOSED US 202 BYPASS ON
US 202 BETWEEN PA 313 AND
MECHANICSVILLE ROAD



this link accounting for 23.5 percent of the total origins. Among other municipalities in the Northern Terminus, both New Hope Borough and Solebury Township show additional increases in trips origins, 118 and 480 trips respectively.

3. US 202 at the Delaware River Crossing

Trip origins for the US 202 toll bridge over the Delaware River are presented in Table 12. The bridge is projected to carry 14,046 vehicles per day under the No-Build Alternative and 14,171 vehicles per day under the Bypass Alternative, a 125 vehicle or 0.9 percent increase due to the proposed Bypass.

Under the No-Build Alternative 55.6 percent of the traffic on this link is from other areas. This category includes traffic from the US 202 cordon line (largely composed of trip origins from New Jersey and New York) and trips from the remainder of the region outside Bucks and Montgomery Counties. The Northern Terminus generates 23.7 percent of the traffic on the toll bridge and other Bucks County and other Montgomery County each generate about 9.5 percent of the trip origins. At the municipal level, New Hope Borough (9.8%), Buckingham Township (4.6%), Solebury Township (3.7%), and Doylestown Borough (3.1%) are the largest originators of trips.

Constructing the proposed US 202 Bypass will generate an additional 125 trips over the bridge, 99 of them (79.2%) will be generated by other areas and 18 (14.4%) by other Montgomery County. Because the proposed Bypass is situated at the southern boundary of the Northern Terminus area, its construction will not facilitate any additional traffic from the Northern Terminus to the bridge.

**Table 12: SELECTED LINK ANALYSIS FOR US 202
AT THE DELAWARE RIVER CROSSING**

<u>Trip Origin</u>	2018 No-Build		Proposed US 202		Difference	Percent Difference
	Origins	% of Total	Origins	% of Total		
Buckingham Twp	641	4.6	641	4.5	0	0.0
Doylestown Boro	433	3.1	433	3.1	0	0.0
Doylestown Twp	253	1.8	253	1.8	0	0.0
New Hope Boro	1378	9.8	1378	9.7	0	0.0
Plumstead Twp	103	0.7	103	0.7	0	0.0
Solebury Twp	<u>520</u>	<u>3.7</u>	<u>520</u>	<u>3.7</u>	<u>0</u>	<u>0.0</u>
Subtotal	3328	23.7	3328	23.5	0	0.0
Chalfont Boro	44	0.3	45	0.3	1	2.2
New Britain Boro	15	0.1	15	0.1	0	0.0
New Britain Twp	26	0.2	26	0.2	0	0.0
Warrington Twp	<u>92</u>	<u>0.7</u>	<u>94</u>	<u>0.7</u>	<u>2</u>	<u>1.1</u>
Subtotal	177	1.3	180	1.3	3	1.7
Other Bucks Co.	1308	9.3	1312	9.3	4	0.3
Lower Gwynedd Twp	13	0.1	13	0.1	0	0.0
Montgomery Twp	47	0.3	48	0.3	1	2.1
Upper Gwynedd Twp	<u>12</u>	<u>0.1</u>	<u>12</u>	<u>0.1</u>	<u>0</u>	<u>0.0</u>
Subtotal	72	0.5	73	0.5	1	1.4
Other Montgomery Co.	1348	9.6	1366	9.6	18	1.3
Other areas	<u>7813</u>	<u>55.6</u>	<u>7912</u>	<u>55.8</u>	<u>99</u>	<u>1.3</u>
Total:	14046	100.0%	14171	100.0%	125	0.9%

VIII. RESPONSE TO BUCKINGHAM TOWNSHIP'S OTHER DEIS COMMENTS

The preceding chapters answered the general questions posed by Buckingham Township. This chapter will respond to more discrete concerns expressed in their submittal.

1. Statistical Accuracy

In the section titled "Numerical Significance and Analysis," Buckingham Township stated that if traffic counts are taken over a two-day period and suffer some inaccuracy, how accurate is the model and its travel forecasts which builds upon the traffic counts.

DVRPC has been conducting traffic counts for over 30 years for the Pennsylvania Department of Transportation, the New Jersey Department of Transportation, and the nine counties that constitute the DVRPC region. Last year DVRPC collected more than 2,000 counts. The Federal Highway Administration (FHWA) has issued guidelines and procedures to which the states and DVRPC adhere to. These procedures include applying traffic count adjustment factors, developed by PennDOT, to rectify daily and seasonal variations in traffic volumes. DVRPC's traffic counting program is periodically reviewed by both DOTs and FHWA to insure quality control.

The DVRPC four-step transportation simulation model is a planning tool developed originally by US DOT and is used by transportation planning agencies to forecast volumes for highway and transit facilities. Model accuracy varies by highway type; for limited access highways, with high traffic volumes and few interchanges, the models are quite accurate. For local roads with low volumes and many driveway openings, the simulation error is generally larger. In general, model accuracy ranges from 5-15 percent depending on roadway type.

2. Pools Corner Traffic Projections

In 1994, a joint PennDOT/Bucks County Planning Commission task force studied the PA 313/PA 663 corridor. Using historic traffic growth rates contained in the task force's report titled

“Transportation Improvement Program - PA 313/PA 663 Corridor” Buckingham Township projected Year 2018 traffic volumes of 40,000 on PA 313 west of US 202 and 28,900 east of US 202. Buckingham then questioned why DVRPC’s No-Build volumes are considerably lower than their estimates.

A comparison of actual DVRPC traffic counts conducted in 1992 and 1996 shows a four year total 0.6 percent increase in traffic west of US 202 and a total 3.1 percent increase east of US 202. These increases are substantially lower than the 2.92 percent and 2.66 percent annual growth rates mentioned by Buckingham Township. In contrast, DVRPC’s 2018 No-Build projections yield a total 17.6 percent and 31.8 percent increase respectively, more in line with observed conditions and future growth in the corridor.

The straight line traffic growth method employed by Buckingham Township overestimates future volumes because it compounds the growth rate and does not account for capacity limitations. A volume of 40,000 vehicles per day, projected by the township, requires a four-lane divided high speed highway. Swamp Road does not have the physical attributes to carry traffic of this magnitude. With existing traffic volumes in the 16,000 range, Swamp Road already experiences considerable congestion. Figure 6 in Buckingham’s submittal shows there is currently a normal delay of 1800 ft. on Swamp Road east of Cross Keys, with a “maximum common” delay of 3600 ft.

DVRPC’s travel simulation model employs a capacity constraint which restricts the upper volume range of a link to reflect capacity limitations. The model also utilizes an equilibrium assignment algorithm which balances congestion levels on all highways, reflecting the motorists propensity to take less congested alternate routes to minimize their travel time.

3. Balanced Traffic Flows

Buckingham Township calculated the new trips generated by the proposed highway on US 202 Bypass between PA 611 Bypass and PA 611 (Main Street) and then examined all possible roads where traffic exits the Bypass. They were unable to account for all the additional vehicles and questioned why there is a discrepancy.

It is physically difficult to place traffic counters at the exact locations of all intersections and

interchanges, especially at US 202 Bypass/Main Street. This is because of driveways, lack of opportunities to secure the counters, and traffic interfering with the count tubes. Depending on field conditions, traffic counters are usually placed some distance back from intersections. Also, on any given roadway segment, traffic volume constantly varies due to intermediate intersections and driveways. Therefore, by necessity, the traffic counts and corresponding traffic projections presented in DVRPC reports only represent a typical traffic volume on a roadway link not necessarily a volume exactly adjacent to an intersection or interchange.

Constructing a new bypass changes travel patterns in the study area. For example, many residents of Doylestown have equal access to both State and Main streets by means of local roads. Under existing and No-Build conditions they may be more inclined to use US 202 via State Street while under the Bypass Alternative they will utilize US 202 Bypass via Main Street. This type of change in travel behavior impacts neighborhood roads; the surrounding arterials are largely affected only in the immediate vicinity of the interchanges. The DVRPC travel simulation model predicts changes in travel patterns of this nature which result from the proposed US 202 Bypass.

4. Perception of the Impact in Other Areas

Buckingham Township raised a question concerning the Bypass's ability to draw traffic from municipalities along the proposed highway thus implying the Bypass's traffic largely consists of through trips. A table examining the gain in traffic between No-Build and Build conditions on Bristol Road and County Line Road was used to demonstrate this point.

When a new expressway is constructed, traffic on the parallel roads in the corridor decreases significantly due to diversions to the faster route, while traffic on perpendicular roads increases as motorists use these roads to approach the highway interchanges. The Township was very selective in using volumes from road segments as far as possible from the proposed interchanges, where the Bypass's impact is minimal. If volumes adjacent to the interchanges are used (where the impact is maximum) traffic on Bristol Road would increase by 2,800 instead of the smaller 100-200 increase that Buckingham claims. Similarly, traffic on County Line Road would increase by 1,400-5,800 vehicles instead of the 900 vehicle loss claimed by Buckingham. Clearly, the proposed Bypass does attract trips from its abutting municipalities.

The second issue raised by Buckingham relates to an additional 700,000 square feet of commercial

space approved by Montgomery Township near the intersection of US 202/PA 309. According to Buckingham Township, a project of this magnitude will significantly effect DVRPC's travel forecast requiring an addendum to the DEIS.

As previously explained in Section IV, travel forecasting procedures, besides relying on our 2018 population and employment estimates, DVRPC contacted Bucks County, Montgomery County and municipal officials to ascertain proposed developments situated in the study area. Proposed developments judged not included in DVRPC's 2018 regional trip table were used to generate a surcharge of future trips which were added to the base 2018 highway trip table. Approximately 1,900,000 square feet of commercial development and 2,500 dwelling units of residential development were identified for Montgomery Township. While the magnitude of actual development may differ from that identified in 1992, the new 700,000 square foot shopping center is well within the total surcharge allowance for Montgomery Township.

5. Comments on North-South Traffic and East-West Traffic

In these two sections, Buckingham Township raised a number of erroneous questions, most of which are attributable to misinterpreting figures included in the DEIS.

Proposed US 202 Bypass will generate 49,000 additional trips over the No-Build Alternative - This claim is based upon DEIS Figure ES-12 which displays a north-south screenline and an east-west screenline. The township has mistakenly added the increases of both screenlines double counting vehicles who use east-west routes to access the Bypass and then travel on US 202 Bypass crossing the north-south screenline.

The proposed Bypass will further degrade current congestion in Chalfont - This claim is based on Figure 7 included in their documentation and comparing current traffic to Build conditions at the US 202/PA 152 intersection. A comparison of No-Build and Build volumes clearly shows construction of the Bypass will relieve congestion at this intersection. Among the alternatives presented in the DEIS, the Bypass Alternative provides the most relief to Chalfont.

The DEIS shows that by 2018, north-south traffic will increase 72 percent and the construction of the Bypass will further increase the growth to 133 percent - Constructing a bypass typically induces some additional traffic into a corridor, the key issue is how successful the additional

capacity will be in reducing traffic levels on parallel congested roadways. Examination of a screenline between PA 463 and County Line Road shows that US 202, Upper State Road, Stump Road and Lower State Road will have traffic reductions in the range of 36-60 percent if the proposed US 202 Bypass is built.

In the future, east-west traffic will increase faster than north-south traffic. Where do the additional east-west vehicles under the Bypass Alternative come from - The additional 25,700 vehicles largely represents traffic using east-west roads to access the proposed US 202 Bypass. Some of these vehicles are from north-south roads inside of the US 202 corridor. However, constructing a Bypass also increases accessibility to the corridor by vehicles who would normally avoid it due to congested conditions. Consequently, as demonstrated in an analysis of vehicles crossing at the PA 463 screenline presented in Supplement 3 (dated October 1993) over 20,000 vehicles from other north-south roads outside the US 202 corridor are being diverted due to the construction of the expressway. While the proposed Bypass will generate "new trips," any traffic increase solely attributable to this phenomenon is very minor (5%). At the regional level the number of trips is approximately the same; the US 202 Bypass will mainly divert trips from other roads. The number of induced trips in the corridor is generally very small and varies by section of the proposed Bypass. On US 202 sections north and south of the Bypass, the number of induced trips declines significantly. For example, under the Bypass Alternative there will be only 125 additional trips on US 202 at the Delaware River crossing.

IX. FINDINGS

A review and evaluation of the 2018 traffic projections, the selected link analysis, and other information presented in this report lead to the following findings:

1. The proposed US 202 Bypass offers increased mobility to all local municipalities in the corridor including Section 700 and the Northern Terminus areas. Traffic volume on the proposed Bypass peaks between PA 309 and County Line Road, well outside the Northern Terminus. Where the proposed Bypass intersects the Doylestown Bypass there will be 10,000 fewer vehicles per day on the expressway than at its peak location.
 2. Within the Northern Terminus area, the largest difference in traffic between the Build and No-Build scenarios occurs on the existing US 202 and PA 611 bypasses. The existing bypasses with their many interchanges will gradually dissipate the additional traffic attributable to the expressway.
 3. A modest traffic growth occurs on the arterials in the Northern Terminus area (e.g., Main Street or Swamp Road) due to the proposed Bypass.
 4. The traffic increase on US 202 north of PA 313 is 19 percent when comparing the Bypass Alternative volumes to the No-Build Alternative volumes. The increase on US 202 falls to 4 percent by Lahaska.
 5. In the Northern Terminus area, traffic decreases on roads parallel to US 202 (e.g., PA 263 or Stump Road); the decreases are all less than 5 percent. Traffic increases on roads intersecting with US 202, such as Mechanicsville Road, where traffic will increase by 8 percent.
 6. The Proposed Bypass offers significant traffic relief to existing US 202 and parallel roads in the corridor. This can be observed in the PA 463 screenline analysis presented in the Section 700 Supplement No. 3 report (dated October 1993). In that analysis, traffic on US 202 decreases by 40 percent, Upper State Road by 51 percent, Stump Road by 36 percent, Lower State Road by 60 percent, and on roads outside the US 202 corridor by 16
-

percent.

7. The select link analysis of the Build Alternative shows municipalities from the Northern Terminus area will generate 31 percent of the trips on the proposed US 202 Bypass between Bristol Road and the Doylestown Bypass. Buckingham Township alone will generate over 3,100 trips, or 7 percent, of the traffic on the roadway.
 8. On US 202 between Swamp Road and Mechanicsville Road, Buckingham Township will generate the largest number of trips under the No-Build Alternative; 6,600 trips or 25.8 percent of the traffic. However, even though its trips on US 202 will increase by over 8 percent in the Bypass Alternative, to 7,100 trips, Buckingham's overall share of traffic will slightly decrease to 23.5 percent due to greater increases from other municipalities.
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APPENDIX A
MACHINE TRAFFIC COUNTS

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DELAWARE VALLEY REGIONAL PLANNING COMMISSION
24-HOUR TRAFFIC COUNT RECORD

COUNTY : BUCKS
MUNICIPALITY : DOYLESTOWN TWP.

ROAD COUNTED ON : US 202 BYPASS
BETWEEN : PA 611 BYPASS & MAIN STREET
DIRECTION : NORTH

SR/SEG :
PROJECT : 202-700-A2
DATE : 11/12/96

DAY: DATE:	MON.	TUES. 11/12-F	WED. 11/13-F	THURS 11/14-F	FRI.
12:00- 1:00			15	17	
1:00- 2:00			15	22	
2:00- 3:00			10	24	
3:00- 4:00			31	20	
4:00- 5:00			34	36	
5:00- 6:00			82	69	
6:00- 7:00			208	201	
7:00- 8:00		345	345		
8:00- 9:00		331	352		
9:00-10:00		287	291		
10:00-11:00		225	220		
11:00-12:00		223	230		
12:00- 1:00		203	239		
1:00- 2:00		219	256		
2:00- 3:00		233	247		
3:00- 4:00		271	279		
4:00- 5:00		314	307		
5:00- 6:00		312	332		
6:00- 7:00		304	312		
7:00- 8:00		202	211		
8:00- 9:00		97	106		
9:00-10:00		110	106		
10:00-11:00		60	50		
11:00-12:00		44	43		
TOTALS		3780	4321	389	

DELAWARE VALLEY REGIONAL PLANNING COMMISSION
24-HOUR TRAFFIC COUNT RECORD

COUNTY : BUCKS
MUNICIPALITY : DOYLESTOWN TWP.

ROAD COUNTED ON : US 202 BYPASS
BETWEEN : PA 611 BYPASS & MAIN STREET
DIRECTION : SOUTH

SR/SEG :
PROJECT : 202-700-A2
DATE : 11/12/96

DAY: DATE:	MON.	TUES. 11/12-F	WED. 11/13-F	THURS 11/14-F	FRI.
12:00- 1:00			23	30	
1:00- 2:00			18	13	
2:00- 3:00			3	12	
3:00- 4:00			9	6	
4:00- 5:00			9	8	
5:00- 6:00			47	47	
6:00- 7:00			212	186	
7:00- 8:00			423	407	
8:00- 9:00			426	405	
9:00-10:00			337	348	
10:00-11:00			321		
11:00-12:00			317		
12:00- 1:00			329		
1:00- 2:00		338	283		
2:00- 3:00		308	317		
3:00- 4:00		385	398		
4:00- 5:00		409	397		
5:00- 6:00		404	409		
6:00- 7:00		368	380		
7:00- 8:00		208	220		
8:00- 9:00		140	131		
9:00-10:00		119	109		
10:00-11:00		73	86		
11:00-12:00		47	35		
TOTALS		2799	5239	1462	

DELAWARE VALLEY REGIONAL PLANNING COMMISSION
24-HOUR TRAFFIC COUNT RECORD

COUNTY : BUCKS
MUNICIPALITY : DOYLESTOWN TWP

ROAD COUNTED ON : US 202 BYPASS NB
BETWEEN : MAIN ST & STATE ST
DIRECTION : NORTH

SR/SEG : 0202/0170
PROJECT : 202-700-A2
DATE : 11/11/96

DAY: DATE:	MON. 11/11F	TUES. 11/12F	WED. 11/13F	THURS	FRI.
12:00- 1:00		19	25		
1:00- 2:00		18	26		
2:00- 3:00		15	32		
3:00- 4:00		35	23		
4:00- 5:00		46	41		
5:00- 6:00		103	80		
6:00- 7:00		254	251		
7:00- 8:00		450			
8:00- 9:00	473	404			
9:00-10:00	410	364			
10:00-11:00	320	275			
11:00-12:00	329	316			
12:00- 1:00	325	329			
1:00- 2:00	291	308			
2:00- 3:00	320	356			
3:00- 4:00	337	362			
4 00- 5:00	409	402			
5:00- 6:00	395	439			
6:00- 7:00	423	430			
7:00- 8:00	293	278			
8:00- 9:00	163	169			
9:00-10:00	152	156			
10:00-11:00	89	85			
11:00-12:00	72	61			
TOTALS	4801	5674	478		

DELAWARE VALLEY REGIONAL PLANNING COMMISSION
24-HOUR TRAFFIC COUNT RECORD

COUNTY : BUCKS
MUNICIPALITY : DOYLESTOWN TWP

ROAD COUNTED ON : US 202 BYPASS SB
BETWEEN : MAIN ST & STATE ST
DIRECTION : SOUTH

SR/SEG : 0202\0171
PROJECT : 202-700-A2
DATE : 11/11/96

DAY: DATE:	MON. 11/11F	TUES. 11/12F	WED. 11/13F	THURS	FRI.
12:00- 1:00		25	29		
1:00- 2:00		18	17		
2:00- 3:00		3	13		
3:00- 4:00		11	7		
4:00- 5:00		19	12		
5:00- 6:00		61	57		
6:00- 7:00		243	223		
7:00- 8:00		466	439		
8:00- 9:00		484	449		
9:00-10:00		372	390		
10:00-11:00		340			
11:00-12:00		313			
12:00- 1:00		332			
1:00- 2:00	306	296			
2:00- 3:00	330	344			
3:00- 4:00	400	413			
4:00- 5:00	433	429			
5:00- 6:00	416	447			
6:00- 7:00	425	445			
7:00- 8:00	242	250			
8:00- 9:00	153	152			
9:00-10:00	129	135			
10:00-11:00	77	95			
11:00-12:00	55	48			
TOTALS	2966	5741	1636		

DELAWARE VALLEY REGIONAL PLANNING COMMISSION
24-HOUR TRAFFIC COUNT RECORD

COUNTY : BUCKS
MUNICIPALITY : DOYLESTOWN

ROAD COUNTED ON : US 202 NB
BETWEEN : SWAMP RD & MECHANICSVILLE RD
DIRECTION : NORTH

SR/SEG : 0202/0180
PROJECT : 202-700-G4
DATE : 11/18/96

DAY: DATE:	MON. 11/18F	TUES. 11/19F	WED. 11/20F	THURS	FRI.
12:00- 1:00		48	52		
1:00- 2:00		50	36		
2:00- 3:00		40	46		
3:00- 4:00		41	59		
4:00- 5:00		79	65		
5:00- 6:00		209	193		
6:00- 7:00		510	495		
7:00- 8:00		854	760		
8:00- 9:00		765	702		
9:00-10:00		805	754		
10:00-11:00	590	645	551		
11:00-12:00	610	641	633		
12:00- 1:00	609	652			
1:00- 2:00	614	583			
2:00- 3:00	679	690			
3:00- 4:00	702	756			
4:00- 5:00	743	796			
5:00- 6:00	814	797			
6:00- 7:00	665	659			
7:00- 8:00	421	463			
8:00- 9:00	372	333			
9:00-10:00	290	319			
10:00-11:00	170	176			
11:00-12:00	81	68			
TOTALS	7360	10979	4346		

DELAWARE VALLEY REGIONAL PLANNING COMMISSION
24-HOUR TRAFFIC COUNT RECORD

COUNTY : BUCKS
MUNICIPALITY : DOYLESTOWN

ROAD COUNTED ON : US 202 SB
BETWEEN : SWAMP RD & MECHANICSVILLE RD
DIRECTION : SOUTH

SR/SEG : 0202/0180
PROJECT : 202-700-G4
DATE : 11/18/96

DAY: DATE:	MON. 11/18F	TUES. 11/19F	WED. 11/20F	THURS	FRI.
12:00- 1:00		64	53		
1:00- 2:00		37	19		
2:00- 3:00		17	11		
3:00- 4:00		17	15		
4:00- 5:00		35	33		
5:00- 6:00		98	111		
6:00- 7:00		385	403		
7:00- 8:00		697	685		
8:00- 9:00		854	819		
9:00-10:00		716	715		
10:00-11:00	614	645	611		
11:00-12:00	680	712			
12:00- 1:00	788	825			
1:00- 2:00	745	817			
2:00- 3:00	744	752			
3:00- 4:00	826	818			
4:00- 5:00	715	784			
5:00- 6:00	827	878			
6:00- 7:00	750	777			
7:00- 8:00	470	521			
8:00- 9:00	247	285			
9:00-10:00	203	241			
10:00-11:00	160	168			
11:00-12:00	77	82			
TOTALS	7846	11225	3475		

DELAWARE VALLEY REGIONAL PLANNING COMMISSION
24-HOUR TRAFFIC COUNT RECORD

COUNTY : BUCKS
MUNICIPALITY : DOYLESTOWN

ROAD COUNTED ON : US 202 NB
BETWEEN : MECHANICSVILLE RD & PA 413
DIRECTION : NORTH

SR/SEG : 0202/0214
PROJECT : 202-700-H4
DATE : 11/11/96

DAY: DATE:	MON. 11/11F	TUES. 11/12F	WED. 11/13F	THURS	FRI.
12:00- 1:00		37	23		
1:00- 2:00		29	22		
2:00- 3:00		39	22		
3:00- 4:00		43	47		
4:00- 5:00		70	75		
5:00- 6:00		168	159		
6:00- 7:00		454	409		
7:00- 8:00		704	666		
8:00- 9:00		597	564		
9:00-10:00		524			
10:00-11:00		473			
11:00-12:00		456			
12:00- 1:00	455	479			
1:00- 2:00	447	413			
2:00- 3:00	454	438			
3:00- 4:00	519	511			
4:00- 5:00	509	508			
5:00- 6:00	517	480			
6:00- 7:00	374	457			
7:00- 8:00	277	307			
8:00- 9:00	192	203			
9:00-10:00	198	201			
10:00-11:00	92	100			
11:00-12:00	52	61			
TOTALS	4086	7752	1987		

DELAWARE VALLEY REGIONAL PLANNING COMMISSION
24-HOUR TRAFFIC COUNT RECORD

COUNTY : BUCKS
MUNICIPALITY : DOYLESTOWN

ROAD COUNTED ON : US 202 SB
BETWEEN : MECHANICSVILLE RD & PA 413
DIRECTION : SOUTH

SR/SEG : 0202/0214
PROJECT : 202-700-H4
DATE : 11/11/96

DAY: DATE:	MON. 11/11F	TUES. 11/12F	WED. 11/13F	THURS	FRI.
12:00- 1:00		54	46		
1:00- 2:00		18	19		
2:00- 3:00		15	13		
3:00- 4:00		9	15		
4:00- 5:00		26	16		
5:00- 6:00		72	69		
6:00- 7:00		238	181		
7:00- 8:00		402	419		
8:00- 9:00		521	487		
9:00-10:00		484			
10:00-11:00		442			
11:00-12:00		492			
12:00- 1:00	463	567			
1:00- 2:00	493	585			
2:00- 3:00	537	557			
3:00- 4:00	587	554			
4:00- 5:00	631	578			
5:00- 6:00	667	698			
6:00- 7:00	538	602			
7:00- 8:00	383	445			
8:00- 9:00	210	250			
9:00-10:00	192	201			
10:00-11:00	108	139			
11:00-12:00	79	80			
TOTALS	4888	8029	1265		

DELAWARE VALLEY REGIONAL PLANNING COMMISSION
24-HOUR TRAFFIC COUNT RECORD

COUNTY : BUCKS
MUNICIPALITY : DOYLESTOWN

ROAD COUNTED ON : US 202 NB
BETWEEN : SOUTH OF PA 263
DIRECTION : NORTH

SR/SEG : 0263/0200
PROJECT : 202-700-H3
DATE : 011/1196

DAY: DATE:	MON. 11/11F	TUES. 11/12F	WED. 11/13F	THURS	FRI.
12:00- 1:00		38	30		
1:00- 2:00		34	23		
2:00- 3:00		43	43		
3:00- 4:00		47	56		
4:00- 5:00		99	86		
5:00- 6:00		288	196		
6:00- 7:00		617	544		
7:00- 8:00		1013	774		
8:00- 9:00		896	727		
9:00-10:00		883			
10:00-11:00		713			
11:00-12:00		686			
12:00- 1:00	645	654			
1:00- 2:00	605	582			
2:00- 3:00	560	550			
3:00- 4:00	561	604			
4:00- 5:00	617	660			
5:00- 6:00	596	574			
6:00- 7:00	481	507			
7:00- 8:00	327	337			
8:00- 9:00	235	221			
9:00-10:00	188	188			
10:00-11:00	126	110			
11:00-12:00	64	66			
TOTALS	5005	10410	2479		

DELAWARE VALLEY REGIONAL PLANNING COMMISSION
24-HOUR TRAFFIC COUNT RECORD

COUNTY : BUCKS
MUNICIPALITY : DOYLESTOWN

ROAD COUNTED ON : US 202 SB
BETWEEN : SOUTH OF PA 263
DIRECTION : SOUTH

SR/SEG : 0263/0201
PROJECT : 202-700-H3
DATE : 11/11/96

DAY: DATE:	MON. 11/11F	TUES. 11/12F	WED. 11/13F	THURS	FRI.
12:00- 1:00		53	42		
1:00- 2:00		28	28		
2:00- 3:00		24	17		
3:00- 4:00		9	18		
4:00- 5:00		27	24		
5:00- 6:00		79	68		
6:00- 7:00		305	261		
7:00- 8:00		609	586		
8:00- 9:00		644	571		
9:00-10:00		627			
10:00-11:00		625			
11:00-12:00		758			
12:00- 1:00	510	836			
1:00- 2:00	641	869			
2:00- 3:00	726	817			
3:00- 4:00	820	872			
4:00- 5:00	878	849			
5:00- 6:00	953	978			
6:00- 7:00	689	755			
7:00- 8:00	502	485			
8:00- 9:00	270	279			
9:00-10:00	221	240			
10:00-11:00	118	168			
11:00-12:00	90	109			
TOTALS	6418	11045	1615		

DELAWARE VALLEY REGIONAL PLANNING COMMISSION
24-HOUR TRAFFIC COUNT RECORD

COUNTY : BUCKS
MUNICIPALITY : DOYLESTOWN

ROAD COUNTED ON : US 202 NB
BETWEEN : PA 263 & AQUETONG RD
DIRECTION : NORTH

SR/SEG : 0202/0250
PROJECT : 202-700-J2
DATE : 11/18/96

DAY: DATE:	MON. 11/18F	TUES. 11/19F	WED. 11/20F	THURS	FRI.
12:00- 1:00		33	27		
1:00- 2:00		37	26		
2:00- 3:00		50	43		
3:00- 4:00		43	51		
4:00- 5:00		72	56		
5:00- 6:00		187	183		
6:00- 7:00		488	511		
7:00- 8:00		721	719		
8:00- 9:00		527	546		
9:00-10:00		509	541		
10:00-11:00	303	504	506		
11:00-12:00	484	469	507		
12:00- 1:00	463	457			
1:00- 2:00	410	435			
2:00- 3:00	431	448			
3:00- 4:00	417	476			
4:00- 5:00	443	470			
5:00- 6:00	434	420			
6:00- 7:00	413	406			
7:00- 8:00	274	255			
8:00- 9:00	181	198			
9:00-10:00	142	169			
10:00-11:00	116	119			
11:00-12:00	54	43			
TOTALS	4565	7536	3716		

DELAWARE VALLEY REGIONAL PLANNING COMMISSION
24-HOUR TRAFFIC COUNT RECORD

COUNTY : BUCKS
MUNICIPALITY : DOYLESTOWN

ROAD COUNTED ON : US 202 SB
BETWEEN : PA 263 & AQUETONG RD
DIRECTION : SOUTH

SR/SEG : 0202/0250
PROJECT : 202-700-J2
DATE : 11/18/96

DAY: DATE:	MON. 11/18F	TUES. 11/19F	WED. 11/20F	THURS	FRI.
12:00- 1:00		42	46		
1:00- 2:00		26	21		
2:00- 3:00		19	9		
3:00- 4:00		17	18		
4:00- 5:00		16	21		
5:00- 6:00		69	65		
6:00- 7:00		222	230		
7:00- 8:00		416	402		
8:00- 9:00		439	442		
9:00-10:00		356	422		
10:00-11:00	268	389	388		
11:00-12:00	370	395			
12:00- 1:00	461	510			
1:00- 2:00	516	530			
2:00- 3:00	525	543			
3:00- 4:00	575	592			
4:00- 5:00	664	627			
5:00- 6:00	752	750			
6:00- 7:00	691	673			
7:00- 8:00	410	412			
8:00- 9:00	185	212			
9:00-10:00	134	156			
10:00-11:00	178	164			
11:00-12:00	69	68			
TOTALS	5798	7643	2064		

DELAWARE VALLEY REGIONAL PLANNING COMMISSION
24-HOUR TRAFFIC COUNT RECORD

COUNTY : BUCKS
MUNICIPALITY : DOYLESTOWN

ROAD COUNTED ON : PA 611 BYPASS NB
BETWEEN : PA 611 & US 202 BYPASS
DIRECTION : NORTH

SR/SEG :
PROJECT : 202-700-A2
DATE : 11/11/96

DAY: DATE:	MON. 11/11-F	TUES. 11/12-F	WED. 11/13-F	THURS	FRI.
12:00- 1:00		71	86		
1:00- 2:00		27	39		
2:00- 3:00		16	26		
3:00- 4:00		29	32		
4:00- 5:00		77	74		
5:00- 6:00		105	102		
6:00- 7:00		323			
7:00- 8:00		573			
8:00- 9:00	534	548			
9:00-10:00	531	456			
10:00-11:00	433	397			
11:00-12:00	391	403			
12:00- 1:00	440	427			
1:00- 2:00	456	464			
2:00- 3:00	476	488			
3:00- 4:00	735	708			
4:00- 5:00	834	790			
5:00- 6:00	935	959			
6:00- 7:00	635	640			
7:00- 8:00	441	425			
8:00- 9:00	371	390			
9:00-10:00	269	263			
10:00-11:00	167	167			
11:00-12:00	137	151			
TOTALS	7785	8897	359		

DELAWARE VALLEY REGIONAL PLANNING COMMISSION
24-HOUR TRAFFIC COUNT RECORD

COUNTY : BUCKS
MUNICIPALITY : DOYLESTOWN

ROAD COUNTED ON : PA 611 BYPASS SB
BETWEEN : PA 611 & US 202 BYPASS
DIRECTION : SOUTH

SR/SEG :
PROJECT : 202-700-A2
DATE : 11/11/96

DAY: DATE:	MON. 11/11-F	TUES. 11/12-F	WED. 11/13-F	THURS	FRI.
12:00- 1:00		48	52		
1:00- 2:00		42	42		
2:00- 3:00		22	31		
3:00- 4:00		41	47		
4:00- 5:00		63	67		
5:00- 6:00		243	246		
6:00- 7:00		807			
7:00- 8:00		927			
8:00- 9:00	789	806			
9:00-10:00	442	457			
10:00-11:00	458	461			
11:00-12:00	467	486			
12:00- 1:00	469	490			
1:00- 2:00	484	495			
2:00- 3:00	527	544			
3:00- 4:00	620	584			
4:00- 5:00	776	713			
5:00- 6:00	758	799			
6:00- 7:00	676	674			
7:00- 8:00	459	496			
8:00- 9:00	419	430			
9:00-10:00	367	363			
10:00-11:00	223	244			
11:00-12:00	128	95			
TOTALS	8062	10330	485		

DELAWARE VALLEY REGIONAL PLANNING COMMISSION
24-HOUR TRAFFIC COUNT RECORD

COUNTY : BUCKS
MUNICIPALITY : DOYLESTOWN

ROAD COUNTED ON : PA 611 BYPASS NB
BETWEEN : US 202 BYPASS & US 202
DIRECTION : NORTH

SR/SEG :
PROJECT : 202-700-A2
DATE : 11/11/96

DAY: DATE:	MON. 11/11-F	TUES. 11/12-F	WED. 11/13-F	THURS	FRI.
12:00- 1:00		57	84		
1:00- 2:00		49	40		
2:00- 3:00		35	53		
3:00- 4:00		51	50		
4:00- 5:00		70	48		
5:00- 6:00		253	194		
6:00- 7:00		747	734		
7:00- 8:00		1048	1025		
8:00- 9:00		884			
9:00-10:00		680			
10:00-11:00		683			
11:00-12:00		749			
12:00- 1:00		716			
1:00- 2:00		665			
2:00- 3:00	679	737			
3:00- 4:00	792	866			
4:00- 5:00	931	923			
5:00- 6:00	930	925			
6:00- 7:00	696	691			
7:00- 8:00	544	496			
8:00- 9:00	377	392			
9:00-10:00	393	365			
10:00-11:00	197	217			
11:00-12:00	107	137			
TOTALS	5646	12436	2228		

DELAWARE VALLEY REGIONAL PLANNING COMMISSION
24-HOUR TRAFFIC COUNT RECORD

COUNTY : BUCKS
MUNICIPALITY : DOYLESTOWN

ROAD COUNTED ON : PA 611 BYPASS SB
BETWEEN : US 202 BYPASS & US 202
DIRECTION : SOUTH

SR/SEG :
PROJECT : 202-700-A2
DATE : 11/11/96

DAY: DATE:	MON. 11/11-F	TUES. 11/12-F	WED. 11/13-F	THURS	FRI.
12:00- 1:00		103	123		
1:00- 2:00		45	64		
2:00- 3:00		42	48		
3:00- 4:00		39	52		
4:00- 5:00		50	34		
5:00- 6:00		129	111		
6:00- 7:00		521	404		
7:00- 8:00		938			
8:00- 9:00		918			
9:00-10:00		726			
10:00-11:00		682			
11:00-12:00		740			
12:00- 1:00		805			
1:00- 2:00		830			
2:00- 3:00	915	887			
3:00- 4:00	1111	1063			
4:00- 5:00	1213	1211			
5:00- 6:00	1278	1323			
6:00- 7:00	1066	1061			
7:00- 8:00	649	659			
8:00- 9:00	473	485			
9:00-10:00	386	439			
10:00-11:00	295	339			
11:00-12:00	174	221			
TOTALS	7560	14256	836		

DELAWARE VALLEY REGIONAL PLANNING COMMISSION
24-HOUR TRAFFIC COUNT RECORD

COUNTY : BUCKS
MUNICIPALITY : DOYLESTOWN

ROAD COUNTED ON : PA 611 BYPASS NB
BETWEEN : US 202 & BROAD STREET
DIRECTION : NORTH

SR/SEG :
PROJECT : 202-700-A2
DATE : 11/11/96

DAY: DATE:	MON. 11/11-F	TUES. 11/12-F	WED. 11/13-F	THURS	FRI.
12:00- 1:00		71	86		
1:00- 2:00		38	34		
2:00- 3:00		22	23		
3:00- 4:00		26	29		
4:00- 5:00		55	58		
5:00- 6:00		124	96		
6:00- 7:00		379	354		
7:00- 8:00		733	710		
8:00- 9:00		724	768		
9:00-10:00	590	660			
10:00-11:00	615	545			
11:00-12:00	603	607			
12:00- 1:00	696	658			
1:00- 2:00	717	717			
2:00- 3:00	720	756			
3:00- 4:00	933	960			
4:00- 5:00	1074	1167			
5:00- 6:00	1103	1091			
6:00- 7:00	814	972			
7:00- 8:00	499	598			
8:00- 9:00	403	478			
9:00-10:00	345	338			
10:00-11:00	224	222			
11:00-12:00	108	159			
TOTALS	9444	12100	2158		

DELAWARE VALLEY REGIONAL PLANNING COMMISSION
24-HOUR TRAFFIC COUNT RECORD

COUNTY : BUCKS
MUNICIPALITY : DOYLESTOWN

ROAD COUNTED ON : PA 611 BYPASS SB
BETWEEN : US 202 & BROAD STREET
DIRECTION : SOUTH

SR/SEG :
PROJECT : 202-700-A2
DATE : 11/11/96

DAY: DATE:	MON. 11/11-F	TUES. 11/12-F	WED. 11/13-F	THURS	FRI.
12:00- 1:00		39	28		
1:00- 2:00		22	25		
2:00- 3:00		44	34		
3:00- 4:00		24	27		
4:00- 5:00		71	62		
5:00- 6:00		249	263		
6:00- 7:00		975	924		
7:00- 8:00		1220	1274		
8:00- 9:00		1052	1018		
9:00-10:00	624	604			
10:00-11:00	637	547			
11:00-12:00	716	641			
12:00- 1:00	683	687			
1:00- 2:00	617	640			
2:00- 3:00	692	591			
3:00- 4:00	614	784			
4:00- 5:00	818	811			
5:00- 6:00	872	899			
6:00- 7:00	583	634			
7:00- 8:00	389	438			
8:00- 9:00	266	259			
9:00-10:00	229	252			
10:00-11:00	146	140			
11:00-12:00	62	86			
TOTALS	7948	11709	3655		

DELAWARE VALLEY REGIONAL PLANNING COMMISSION
24-HOUR TRAFFIC COUNT RECORD

COUNTY : BUCKS
MUNICIPALITY : DOYLESTOWN

ROAD COUNTED ON : PA 611 BYPASS NB
BETWEEN : BROAD ST & PA 313
DIRECTION : NORTH

SR/SEG : 0611/0180
PROJECT : 202-700-D1
DATE : 11/11/96

DAY: DATE:	MON. 11/11F	TUES. 11/12F	WED. 11/13F	THURS	FRI.
12:00- 1:00		79	98		
1:00- 2:00		42	41		
2:00- 3:00		28	26		
3:00- 4:00		30	37		
4:00- 5:00		57	66		
5:00- 6:00		142	108		
6:00- 7:00		417	388		
7:00- 8:00		830	783		
8:00- 9:00		812	869		
9:00-10:00	692	777	755		
10:00-11:00	713	661			
11:00-12:00	705	731			
12:00- 1:00	834	820			
1:00- 2:00	823	866			
2:00- 3:00	833	899			
3:00- 4:00	1067	1155			
4:00- 5:00	1241	1397			
5:00- 6:00	1239	1259			
6:00- 7:00	898	1050			
7:00- 8:00	559	677			
8:00- 9:00	459	521			
9:00-10:00	375	376			
10:00-11:00	242	240			
11:00-12:00	127	174			
TOTALS	10807	14040	3171		

DELAWARE VALLEY REGIONAL PLANNING COMMISSION
24-HOUR TRAFFIC COUNT RECORD

COUNTY : BUCKS
MUNICIPALITY : DOYLESTOWN

ROAD COUNTED ON : PA 611 BYPASS SB
BETWEEN : BROAD ST & PA 313
DIRECTION : SOUTH

SR/SEG : 0611/0180
PROJECT : 20207000D1
DATE : 11/11/96

DAY: DATE:	MON. 11/11F	TUES. 11/12F	WED. 11/13F	THURS	FRI.
12:00- 1:00		46	46		
1:00- 2:00		26	30		
2:00- 3:00		46	36		
3:00- 4:00		31	32		
4:00- 5:00		76	68		
5:00- 6:00		257	270		
6:00- 7:00		987	940		
7:00- 8:00		1307	1353		
8:00- 9:00		1244	1224		
9:00-10:00	820	827			
10:00-11:00	751	709			
11:00-12:00	833	765			
12:00- 1:00	786	807			
1:00- 2:00	738	783			
2:00- 3:00	805	750			
3:00- 4:00	740	923			
4:00- 5:00	938	971			
5:00- 6:00	991	1021			
6:00- 7:00	724	775			
7:00- 8:00	491	535			
8:00- 9:00	358	336			
9:00-10:00	284	297			
10:00-11:00	186	179			
11:00-12:00	82	109			
TOTALS	9527	13808	3999		

DELAWARE VALLEY REGIONAL PLANNING COMMISSION
24-HOUR TRAFFIC COUNT RECORD

COUNTY : BUCKS
MUNICIPALITY : DOYLESTOWN

ROAD COUNTED ON : PA 611 BYPASS NB
BETWEEN : PA 313 & PA 611
DIRECTION : NORTH

SR/SEG :
PROJECT : 202-700-A2
DATE : 11/11/96

DAY: DATE:	MON. 11/11-F	TUES. 11/12-F	WED. 11/13-F	THURS	FRI.
12:00- 1:00		37	37		
1:00- 2:00		27	23		
2:00- 3:00		7	5		
3:00- 4:00		24	22		
4:00- 5:00		15	16		
5:00- 6:00		43	24		
6:00- 7:00		179	162		
7:00- 8:00		326	292		
8:00- 9:00		434	523		
9:00-10:00	355	397			
10:00-11:00	391	321			
11:00-12:00	329	412			
12:00- 1:00	468	405			
1:00- 2:00	428	470			
2:00- 3:00	353	436			
3:00- 4:00	318	430			
4 00- 5:00	231	384			
5:00- 6:00	290	316			
6:00- 7:00	298	440			
7:00- 8:00	176	276			
8:00- 9:00	145	170			
9:00-10:00	146	92			
10:00-11:00	73	50			
11:00-12:00	27	78			
TOTALS	4028	5769	1104		

DELAWARE VALLEY REGIONAL PLANNING COMMISSION
24-HOUR TRAFFIC COUNT RECORD

COUNTY : BUCKS
MUNICIPALITY : DOYLESTOWN

ROAD COUNTED ON : PA 611 BYPASS SB
BETWEEN : PA 313 & PA 611
DIRECTION : SOUTH

SR/SEG :
PROJECT : 202-700-A2
DATE : 11/11/96

DAY: DATE:	MON. 11/11-F	TUES. 11/12-F	WED. 11/13-F	THURS	FRI.
12:00- 1:00		20	15		
1:00- 2:00		8	19		
2:00- 3:00		32	27		
3:00- 4:00		13	8		
4:00- 5:00		34	29		
5:00- 6:00		95	111		
6:00- 7:00		453	468		
7:00- 8:00		645	663		
8:00- 9:00		543	522		
9:00-10:00	327	318			
10:00-11:00	263	255			
11:00-12:00	270	234			
12:00- 1:00	232	257			
1:00- 2:00	229	184			
2:00- 3:00	261	189			
3:00- 4:00	150	250			
4:00- 5:00	331	331			
5:00- 6:00	338	285			
6:00- 7:00	267	281			
7:00- 8:00	156	165			
8:00- 9:00	103	111			
9:00-10:00	67	99			
10:00-11:00	60	62			
11:00-12:00	28	37			
TOTALS	3082	4901	1862		

DELAWARE VALLEY REGIONAL PLANNING COMMISSION
24-HOUR TRAFFIC COUNT RECORD

COUNTY : BUCKS
MUNICIPALITY : DOYLESTOWN

ROAD COUNTED ON : PA611 (EASTON RD) NB
BETWEEN : MAIN ST SOUTH & EDISON-FURLONG RD
DIRECTION : NORTH

SR/SEG : 0611/0100
PROJECT : VMT PAU46
DATE : 04/25/95

DAY: DATE:	MON.	TUES. 04/25F	WED. 04/26F	THURS 04/27F	FRI.
12:00- 1:00			105	128	
1:00- 2:00			45	61	
2:00- 3:00			30	44	
3:00- 4:00			47	47	
4:00- 5:00			109	104	
5:00- 6:00			150	156	
6:00- 7:00			517		
7:00- 8:00		1162	1094		
8:00- 9:00		1239	1220		
9:00-10:00		1081	1016		
10:00-11:00		935	857		
11:00-12:00		903	931		
12:00- 1:00		982	957		
1:00- 2:00		1003	1046		
2:00- 3:00		1046	1082		
3:00- 4:00		1237	1254		
4:00- 5:00		1416	1392		
5:00- 6:00		1573	1599		
6:00- 7:00		1231	1206		
7:00- 8:00		851	863		
8:00- 9:00		634	649		
9:00-10:00		441	487		
10:00-11:00		311	319		
11:00-12:00		227	237		
TOTALS		16272	17212	540	

DELAWARE VALLEY REGIONAL PLANNING COMMISSION
24-HOUR TRAFFIC COUNT RECORD

COUNTY : BUCKS
MUNICIPALITY : DOYLESTOWN

ROAD COUNTED ON : PA611 (EASTON RD) SB
BETWEEN : MAIN ST SOUTH & EDISON FURLONG RD
DIRECTION : SOUTH

SR/SEG : 0611/0101
PROJECT : VMT-PAU46
DATE : 04/25/95

DAY: DATE:	MON.	TUES. 04/25F	WED. 04/26F	THURS 04/27F	FRI.
12:00- 1:00			94	100	
1:00- 2:00			63	65	
2:00- 3:00			43	48	
3:00- 4:00			58	61	
4:00- 5:00			81	80	
5:00- 6:00			296	307	
6:00- 7:00			1093		
7:00- 8:00		1499	1562		
8:00- 9:00		1250	1288		
9:00-10:00		900	965		
10:00-11:00		933	935		
11:00-12:00		977	1017		
12:00- 1:00		1065	1087		
1:00- 2:00		1022	1015		
2:00- 3:00		1077	1146		
3:00- 4:00		1284	1176		
4:00- 5:00		1377	1318		
5:00- 6:00		1384	1453		
6:00- 7:00		1012	996		
7:00- 8:00		803	836		
8:00- 9:00		697	724		
9:00-10:00		579	585		
10:00-11:00		325	383		
11:00-12:00		207	184		
TOTALS		16391	18398	661	

DELAWARE VALLEY REGIONAL PLANNING COMMISSION
24-HOUR TRAFFIC COUNT RECORD

COUNTY : BUCKS
MUNICIPALITY : DOYLESTOWN

ROAD COUNTED ON : PA 611 (MAIN ST) NB
BETWEEN : PA 611 BYPASS & US 202 BYPASS
DIRECTION : NORTH

SR/SEG : 1001/0030
PROJECT : 202-700-A3
DATE : 11/11/96

DAY: DATE:	MON. 11/11F	TUES. 11/12F	WED. 11/13F	THURS	FRI.
12:00- 1:00		34	42		
1:00- 2:00		18	22		
2:00- 3:00		14	18		
3:00- 4:00		18	15		
4:00- 5:00		32	30		
5:00- 6:00		45	54		
6:00- 7:00		174	204		
7:00- 8:00	354	471			
8:00- 9:00	705	632			
9:00-10:00	550	560			
10:00-11:00	502	460			
11:00-12:00	512	458			
12:00- 1:00	542	530			
1:00- 2:00	547	562			
2:00- 3:00	570	534			
3:00- 4:00	502	546			
4:00- 5:00	582	602			
5:00- 6:00	638	600			
6:00- 7:00	596	566			
7:00- 8:00	410	438			
8:00- 9:00	263	259			
9:00-10:00	172	224			
10:00-11:00	144	152			
11:00-12:00	90	86			
TOTALS	7679	8015	385		

DELAWARE VALLEY REGIONAL PLANNING COMMISSION
24-HOUR TRAFFIC COUNT RECORD

COUNTY : BUCKS
MUNICIPALITY : DOYLESTOWN

ROAD COUNTED ON : PA 611 (MAIN ST) SB
BETWEEN : PA 611 BYPASS & US 202 BYPASS
DIRECTION : SOUTH

SR/SEG : 1001/0031
PROJECT : 202-700-A3
DATE : 11/11/96

DAY: DATE:	MON. 11/11F	TUES. 11/12F	WED. 11/13F	THURS	FRI.
12:00- 1:00		46	48		
1:00- 2:00		21	23		
2:00- 3:00		21	17		
3:00- 4:00		17	14		
4:00- 5:00		18	13		
5:00- 6:00		53	61		
6:00- 7:00		226	237		
7:00- 8:00	285	395			
8:00- 9:00	461	442			
9:00-10:00	458	468			
10:00-11:00	475	464			
11:00-12:00	510	521			
12:00- 1:00	596	557			
1:00- 2:00	538	520			
2:00- 3:00	550	572			
3:00- 4:00	584	592			
4:00- 5:00	601	605			
5:00- 6:00	626	594			
6:00- 7:00	336	322			
7:00- 8:00	344	320			
8:00- 9:00	278	284			
9:00-10:00	212	222			
10:00-11:00	102	109			
11:00-12:00	79	89			
TOTALS	7035	7478	413		

DELAWARE VALLEY REGIONAL PLANNING COMMISSION
24-HOUR TRAFFIC COUNT RECORD

COUNTY : BUCKS
MUNICIPALITY : DOYLESTOWN

ROAD COUNTED ON : PA 611 NB
BETWEEN : FERRY ROAD & CURLY HILL ROAD
DIRECTION : NORTH

SR/SEG : 0611/0210
PROJECT : 202-700-E1
DATE : 11/18/96

DAY: DATE:	MON. 11/18-F	TUES. 11/19-F	WED. 11/20-F	THURS	FRI.
12:00- 1:00		52	55		
1:00- 2:00		23	19		
2:00- 3:00		23	22		
3:00- 4:00		10	21		
4:00- 5:00		47	53		
5:00- 6:00		95	84		
6:00- 7:00		214	204		
7:00- 8:00		456	478		
8:00- 9:00	358	402			
9:00-10:00	429	482			
10:00-11:00	487	481			
11:00-12:00	543	531			
12:00- 1:00	555	626			
1:00- 2:00	601	590			
2:00- 3:00	660	672			
3:00- 4:00	899	857			
4:00- 5:00	1108	1107			
5:00- 6:00	1121	1097			
6:00- 7:00	748	753			
7:00- 8:00	497	511			
8:00- 9:00	400	426			
9:00-10:00	312	344			
10:00-11:00	175	201			
11:00-12:00	114	99			
TOTALS	9007	10099	936		

DELAWARE VALLEY REGIONAL PLANNING COMMISSION
24-HOUR TRAFFIC COUNT RECORD

COUNTY : BUCKS
MUNICIPALITY : DOYLESTOWN

ROAD COUNTED ON : PA 611 SB
BETWEEN : FERRY ROAD & CURLY HILL ROAD
DIRECTION : SOUTH

SR/SEG : 0611/0210
PROJECT : 202-700-E1
DATE : 11/18/96

DAY: DATE:	MON. 11/18-F	TUES. 11/19-F	WED. 11/20-F	THURS	FRI.
12:00- 1:00		31	30		
1:00- 2:00		18	13		
2:00- 3:00		35	35		
3:00- 4:00		26	35		
4:00- 5:00		79	82		
5:00- 6:00		196	226		
6:00- 7:00		726	727		
7:00- 8:00		1023	1100		
8:00- 9:00	894	982			
9:00-10:00	636	656			
10:00-11:00	522	583			
11:00-12:00	595	538			
12:00- 1:00	602	611			
1:00- 2:00	531	544			
2:00- 3:00	534	582			
3:00- 4:00	658	575			
4 00- 5:00	644	679			
5:00- 6:00	613	686			
6:00- 7:00	519	462			
7:00- 8:00	318	302			
8:00- 9:00	181	184			
9:00-10:00	118	132			
10:00-11:00	89	112			
11:00-12:00	46	45			
TOTALS	7500	9807	2248		

DELAWARE VALLEY REGIONAL PLANNING COMMISSION
24-HOUR TRAFFIC COUNT RECORD

COUNTY : BUCKS
MUNICIPALITY : DOYLESTOWN

ROAD COUNTED ON : PA 611(MAIN ST) NB
BETWEEN : US202 BYPASS & STATE ST
DIRECTION : NORTH

SR/SEG : 1001/0040
PROJECT : 202-700-A4
DATE : 11/13/96

DAY: DATE:	MON.	TUES.	WED. 11/13F	THURS 11/14F	FRI. 11/15F
12:00- 1:00				40	40
1:00- 2:00				18	24
2:00- 3:00				14	10
3:00- 4:00				15	14
4:00- 5:00				26	29
5:00- 6:00				55	49
6:00- 7:00				176	174
7:00- 8:00				422	388
8:00- 9:00				591	581
9:00-10:00				512	561
10:00-11:00				453	520
11:00-12:00				534	
12:00- 1:00				537	
1:00- 2:00			550	516	
2:00- 3:00			562	480	
3:00- 4:00			493	520	
4:00- 5:00			533	555	
5:00- 6:00			480	504	
6:00- 7:00			507	467	
7:00- 8:00			381	354	
8:00- 9:00			214	219	
9:00-10:00			165	178	
10:00-11:00			125	125	
11:00-12:00			67	86	
TOTALS			4077	7397	2390

DELAWARE VALLEY REGIONAL PLANNING COMMISSION
24-HOUR TRAFFIC COUNT RECORD

COUNTY : BUCKS
MUNICIPALITY : DOYLESTOWN

ROAD COUNTED ON : PA 611 (MAIN ST) SB
BETWEEN : US 202 BYPASS & STATE ST
DIRECTION : SOUTH

SR/SEG : 1001/0041
PROJECT : 202-700-A4
DATE : 11/13/96

DAY: DATE:	MON.	TUES.	WED. 11/13F	THURS 11/14F	FRI. 11/15F
12:00- 1:00				53	52
1:00- 2:00				36	43
2:00- 3:00				18	20
3:00- 4:00				16	11
4:00- 5:00				20	21
5:00- 6:00				59	59
6:00- 7:00				201	226
7:00- 8:00				366	391
8:00- 9:00				444	421
9:00-10:00				479	450
10:00-11:00				495	547
11:00-12:00				599	
12:00- 1:00				658	
1:00- 2:00			555	567	
2:00- 3:00			614	585	
3:00- 4:00			677	712	
4:00- 5:00			691	701	
5:00- 6:00			694	707	
6:00- 7:00			466	515	
7:00- 8:00			393	385	
8:00- 9:00			350	369	
9:00-10:00			266	248	
10:00-11:00			154	134	
11:00-12:00			102	98	
TOTALS			4962	8465	2241

DELAWARE VALLEY REGIONAL PLANNING COMMISSION
24-HOUR TRAFFIC COUNT RECORD

COUNTY : BUCKS
MUNICIPALITY : DOYLESTOWN

ROAD COUNTED ON : PA 611 (MAIN ST) NB
BETWEEN : US 202 & SWAMP RD
DIRECTION : NORTH

SR/SEG : 1001/0070
PROJECT : 202-700-C1
DATE : 11/11/96

DAY: DATE:	MON. 11/11F	TUES. 11/12F	WED. 11/13F	THURS	FRI.
12:00- 1:00		32	27		
1:00- 2:00		11	20		
2:00- 3:00		14	16		
3:00- 4:00		8	8		
4:00- 5:00		29	28		
5:00- 6:00		43	51		
6:00- 7:00		114	115		
7:00- 8:00		314	306		
8:00- 9:00		360	334		
9:00-10:00	483	494			
10:00-11:00	506	451			
11:00-12:00	577	560			
12:00- 1:00	615	625			
1:00- 2:00	686	686			
2:00- 3:00	655	615			
3:00- 4:00	667	617			
4:00- 5:00	670	629			
5:00- 6:00	581	566			
6:00- 7:00	462	467			
7:00- 8:00	457	446			
8:00- 9:00	289	293			
9:00-10:00	214	185			
10:00-11:00	117	103			
11:00-12:00	62	48			
TOTALS	7041	7710	905		

DELAWARE VALLEY REGIONAL PLANNING COMMISSION
24-HOUR TRAFFIC COUNT RECORD

COUNTY : BUCKS
MUNICIPALITY : DOYLESTOWN

ROAD COUNTED ON : PA 611 (MAIN ST) SB
BETWEEN : US 202 & SWAMP RD
DIRECTION : SOUTH

SR/SEG : 1001/0071
PROJECT : 202-700-C1
DATE : 11/11/96

DAY: DATE:	MON. 11/11F	TUES. 11/12F	WED. 11/13F	THURS	FRI.
12:00- 1:00		18	18		
1:00- 2:00		7	17		
2:00- 3:00		6	9		
3:00- 4:00		10	10		
4:00- 5:00		12	12		
5:00- 6:00		60	43		
6:00- 7:00		135	129		
7:00- 8:00		246	261		
8:00- 9:00		423	435		
9:00-10:00		560	470		
10:00-11:00	527	571			
11:00-12:00	641	689			
12:00- 1:00	626	591			
1:00- 2:00	641	658			
2:00- 3:00	580	568			
3:00- 4:00	505	520			
4:00- 5:00	542	577			
5:00- 6:00	548	608			
6:00- 7:00	415	475			
7:00- 8:00	320	389			
8:00- 9:00	188	226			
9:00-10:00	138	129			
10:00-11:00	65	59			
11:00-12:00	31	43			
TOTALS	5767	7580	1404		

DELAWARE VALLEY REGIONAL PLANNING COMMISSION
24-HOUR TRAFFIC COUNT RECORD

COUNTY : BUCKS
MUNICIPALITY : DOYLESTOWN

ROAD COUNTED ON : PA 611 (MAIN ST) NB
BETWEEN : SWAMP RD (PA 313) & PA 611 BYPASS NB
DIRECTION : NORTH

SR/SEG : 1001/0070
PROJECT : 202-700-C2
DATE : 11/11/96

DAY: DATE:	MON. 11/11F	TUES. 11/12F	WED. 11/13F	THURS	FRI.
12:00- 1:00		17	25		
1:00- 2:00		3	9		
2:00- 3:00		12	7		
3:00- 4:00		3	6		
4:00- 5:00		22	20		
5:00- 6:00		42	46		
6:00- 7:00		95	96		
7:00- 8:00		242	247		
8:00- 9:00		260	297		
9:00-10:00		383	358		
10:00-11:00	413	400			
11:00-12:00	435	452			
12:00- 1:00	550	502			
1:00- 2:00	518	525			
2:00- 3:00	469	509			
3:00- 4:00	492	493			
4:00- 5:00	480	494			
5:00- 6:00	459	450			
6:00- 7:00	328	356			
7:00- 8:00	250	277			
8:00- 9:00	163	201			
9:00-10:00	125	124			
10:00-11:00	37	59			
11:00-12:00	32	24			
TOTALS	4771	5945	1111		

DELAWARE VALLEY REGIONAL PLANNING COMMISSION
24-HOUR TRAFFIC COUNT RECORD

COUNTY : BUCKS
MUNICIPALITY : DOYLESTOWN

ROAD COUNTED ON : PA 611 (MAIN ST) SB
BETWEEN : SWAMP RD (PA 313) & PA 611 BYPASS
DIRECTION : SOUTH

SR/SEG : 1001/0071
PROJECT : 202-700-C2
DATE : 11/11/96

DAY: DATE:	MON. 11/11F	TUES. 11/12F	WED. 11/13F	THURS	FRI.
12:00- 1:00		9	9		
1:00- 2:00		7	8		
2:00- 3:00		17	13		
3:00- 4:00		11	8		
4:00- 5:00		30	29		
5:00- 6:00		70	66		
6:00- 7:00		172	190		
7:00- 8:00		361	387		
8:00- 9:00		524	489		
9:00-10:00		534	488		
10:00-11:00	482	493			
11:00-12:00	488	544			
12:00- 1:00	633	546			
1:00- 2:00	515	547			
2:00- 3:00	489	487			
3:00- 4:00	498	502			
4:00- 5:00	519	556			
5:00- 6:00	584	523			
6:00- 7:00	375	385			
7:00- 8:00	254	289			
8:00- 9:00	155	159			
9:00-10:00	123	105			
10:00-11:00	48	34			
11:00-12:00	29	22			
TOTALS	5192	6927	1687		

DELAWARE VALLEY REGIONAL PLANNING COMMISSION
24-HOUR TRAFFIC COUNT RECORD

COUNTY : BUCKS
MUNICIPALITY : DOYLESTOWN

ROAD COUNTED ON : PA 313 (SWAMP PIKE) EB
BETWEEN : US 202 & SPRING VALLEY RD
DIRECTION : EAST

SR/SEG : 0313/0030
PROJECT : 202-700-66
DATE : 11/11/96

DAY: DATE:	MON. 11/11F	TUES. 11/12F	WED. 11/13F	THURS	FRI.
12:00- 1:00		29	15		
1:00- 2:00		15	10		
2:00- 3:00		20	24		
3:00- 4:00		26	13		
4:00- 5:00		41	43		
5:00- 6:00		115	106		
6:00- 7:00		354			
7:00- 8:00		598			
8:00- 9:00	557	554			
9:00-10:00	400	405			
10:00-11:00	378	350			
11:00-12:00	436	340			
12:00- 1:00	405	403			
1:00- 2:00	398	393			
2:00- 3:00	377	412			
3:00- 4:00	474	482			
4 00- 5:00	519	515			
5:00- 6:00	555	555			
6:00- 7:00	396	382			
7:00- 8:00	238	276			
8:00- 9:00	164	174			
9:00-10:00	193	184			
10:00-11:00	86	92			
11:00-12:00	51	55			
TOTALS	5627	6770	211		

DELAWARE VALLEY REGIONAL PLANNING COMMISSION
24-HOUR TRAFFIC COUNT RECORD

COUNTY : BUCKS
MUNICIPALITY : DOYLESTOWN

ROAD COUNTED ON : PA 313 (SWAMP PIKE) WB
BETWEEN : TR 202 & SPRING VALLEY RD
DIRECTION : WEST

SR/SEG : 0313/0031
PROJECT : 202-700-66
DATE : 11/11/96

DAY: DATE:	MON. 11/11F	TUES. 11/12F	WED. 11/13F	THURS	FRI.
12:00- 1:00		23	18		
1:00- 2:00		8	13		
2:00- 3:00		5	8		
3:00- 4:00		4	6		
4:00- 5:00		39	30		
5:00- 6:00		49	57		
6:00- 7:00		241			
7:00- 8:00	453	489			
8:00- 9:00	488	565			
9:00-10:00	318	339			
10:00-11:00	275	258			
11:00-12:00	351	359			
12:00- 1:00	395	411			
1:00- 2:00	382	398			
2:00- 3:00	399	414			
3:00- 4:00	482	483			
4:00- 5:00	503	565			
5:00- 6:00	524	600			
6:00- 7:00	433	444			
7:00- 8:00	219	240			
8:00- 9:00	150	155			
9:00-10:00	131	167			
10:00-11:00	95	101			
11:00-12:00	37	38			
TOTALS	5635	6395	132		

DELAWARE VALLEY REGIONAL PLANNING COMMISSION
24-HOUR TRAFFIC COUNT RECORD

COUNTY : BUCKS
MUNICIPALITY : DOYLESTOWN

ROAD COUNTED ON : PA 313 (SWAMP PIKE) EB
BETWEEN : CREAMERY RD & US 202
DIRECTION : EAST

SR/SEG : 0313/0040
PROJECT : 202-700-G5
DATE : 11/18/96

DAY: DATE:	MON. 11/18F	TUES. 11/19F	WED. 11/20F	THURS	FRI.
12:00- 1:00		27	28		
1:00- 2:00		18	14		
2:00- 3:00		36	17		
3:00- 4:00		42	34		
4:00- 5:00		62	69		
5:00- 6:00		167	159		
6:00- 7:00		457	436		
7:00- 8:00		649	641		
8:00- 9:00		594			
9:00-10:00	469	475			
10:00-11:00	463	465			
11:00-12:00	503	491			
12:00- 1:00	505	530			
1:00- 2:00	496	525			
2:00- 3:00	486	502			
3:00- 4:00	592	607			
4:00- 5:00	663	636			
5:00- 6:00	647	675			
6:00- 7:00	504	519			
7:00- 8:00	309	297			
8:00- 9:00	267	282			
9:00-10:00	200	187			
10:00-11:00	112	127			
11:00-12:00	51	52			
TOTALS	6267	8422	1398		

DELAWARE VALLEY REGIONAL PLANNING COMMISSION
24-HOUR TRAFFIC COUNT RECORD

COUNTY : BUCKS
MUNICIPALITY : DOYLESTOWN

ROAD COUNTED ON : PA 313 (SWAMP PIKE) WB
BETWEEN : CREAMERY RD & US 202
DIRECTION : WEST

SR/SEG : 0313/0041
PROJECT : 202-700-G5
DATE : 11/18/96F

DAY: DATE:	MON. 11/18F	TUES. 11/19F	WED. 11/20F	THURS	FRI.
12:00- 1:00		44	40		
1:00- 2:00		22	14		
2:00- 3:00		9	14		
3:00- 4:00		14	17		
4:00- 5:00		33	24		
5:00- 6:00		76	84		
6:00- 7:00		214	224		
7:00- 8:00		435	474		
8:00- 9:00		580			
9:00-10:00	491	477			
10:00-11:00	447	458			
11:00-12:00	464	531			
12:00- 1:00	476	603			
1:00- 2:00	469	495			
2:00- 3:00	476	480			
3:00- 4:00	590	606			
4:00- 5:00	613	646			
5:00- 6:00	657	718			
6:00- 7:00	601	573			
7:00- 8:00	386	390			
8:00- 9:00	228	264			
9:00-10:00	200	220			
10:00-11:00	133	141			
11:00-12:00	68	65			
TOTALS	6299	8094	891		

DELAWARE VALLEY REGIONAL PLANNING COMMISSION
24-HOUR TRAFFIC COUNT RECORD

COUNTY : BUCKS
MUNICIPALITY : DOYLESTOWN

ROAD COUNTED ON : PA 313 (SWAMP PIKE) EB
BETWEEN : MAIN ST (PA 611) & CREAMERY RD
DIRECTION : EAST

SR/SEG : 0313/0060
PROJECT : 202-700-C3
DATE : 11/11/96

DAY: DATE:	MON. 11/11F	TUES. 11/12F	WED. 11/13F	THURS	FRI.
12:00- 1:00		29	12		
1:00- 2:00		25	15		
2:00- 3:00		23	15		
3:00- 4:00		30	28		
4:00- 5:00		57	58		
5:00- 6:00		138	120		
6:00- 7:00		380	360		
7:00- 8:00		563	550		
8:00- 9:00		616	577		
9:00-10:00		586			
10:00-11:00	509	506			
11:00-12:00	509	504			
12:00- 1:00	522	546			
1:00- 2:00	554	534			
2:00- 3:00	559	565			
3:00- 4:00	563	556			
4 00- 5:00	628	660			
5:00- 6:00	592	570			
6:00- 7:00	426	454			
7:00- 8:00	274	311			
8:00- 9:00	200	238			
9:00-10:00	228	204			
10:00-11:00	92	78			
11:00-12:00	47	46			
TOTALS	5703	8219	1735		

DELAWARE VALLEY REGIONAL PLANNING COMMISSION
24-HOUR TRAFFIC COUNT RECORD

COUNTY : BUCKS
MUNICIPALITY : DOYLESTOWN

ROAD COUNTED ON : PA 313 (SWAMP PIKE) WB
BETWEEN : MAIN ST (PA 611) & CREAMERY RD
DIRECTION : WEST

SR/SEG : 0313/0060
PROJECT : 202-700-C3
DATE : 11/11/96

DAY: DATE:	MON. 11/11F	TUES. 11/12F	WED. 11/13F	THURS	FRI.
12:00- 1:00		46	50		
1:00- 2:00		22	21		
2:00- 3:00		11	13		
3:00- 4:00		11	14		
4:00- 5:00		30	29		
5:00- 6:00		118	129		
6:00- 7:00		259	236		
7:00- 8:00		464	456		
8:00- 9:00		579	628		
9:00-10:00		576			
10:00-11:00	559	536			
11:00-12:00	562	565			
12:00- 1:00	618	628			
1:00- 2:00	583	662			
2:00- 3:00	570	574			
3:00- 4:00	593	608			
4:00- 5:00	600	649			
5:00- 6:00	668	674			
6:00- 7:00	478	515			
7:00- 8:00	312	353			
8:00- 9:00	203	252			
9:00-10:00	170	173			
10:00-11:00	106	119			
11:00-12:00	50	55			
TOTALS	6072	8479	1576		

DELAWARE VALLEY REGIONAL PLANNING COMMISSION
24-HOUR TRAFFIC COUNT RECORD

COUNTY : BUCKS
MUNICIPALITY : DOYLESTOWN

ROAD COUNTED ON : PA 313 EB
BETWEEN : PA 611 & PA 611 BYPASS
DIRECTION : EAST

SR/SEG : 0313/0070
PROJECT : 202-700-D3
DATE : 11/11/96

DAY: DATE:	MON. 11/11F	TUES. 11/12F	WED. 11/13F	THURS	FRI.
12:00- 1:00		70	79		
1:00- 2:00		46	28		
2:00- 3:00		34	20		
3:00- 4:00		22	25		
4:00- 5:00		44	38		
5:00- 6:00		63	76		
6:00- 7:00		163	122		
7:00- 8:00		441	397		
8:00- 9:00		700	647		
9:00-10:00	724	759	780		
10:00-11:00	663	765	717		
11:00-12:00	753	734	686		
12:00- 1:00	787	774			
1:00- 2:00	844	848			
2:00- 3:00	820	782			
3:00- 4:00	770	808			
4:00- 5:00	695	743			
5:00- 6:00	780	802			
6:00- 7:00	744	719			
7:00- 8:00	593	706			
8:00- 9:00	459	501			
9:00-10:00	299	349			
10:00-11:00	273	258			
11:00-12:00	129	116			
TOTALS	9333	11247	3615		

DELAWARE VALLEY REGIONAL PLANNING COMMISSION
24-HOUR TRAFFIC COUNT RECORD

COUNTY : BUCKS
MUNICIPALITY : DOYLESTOWN

ROAD COUNTED ON : PA 313 WB
BETWEEN : PA 611 & PA 611 BYPASS
DIRECTION : WEST

SR/SEG : 0313/0071
PROJECT : 202-700-D3
DATE : 11/11/96

DAY: DATE:	MON. 11/11F	TUES. 11/12F	WED. 11/13F	THURS	FRI.
12:00- 1:00		75	65		
1:00- 2:00		39	35		
2:00- 3:00		13	17		
3:00- 4:00		17	19		
4:00- 5:00		27	23		
5:00- 6:00		41	43		
6:00- 7:00		157	156		
7:00- 8:00		335	351		
8:00- 9:00		524	537		
9:00-10:00	605	600	622		
10:00-11:00	618	626	592		
11:00-12:00	676	600	325		
12:00- 1:00	721	784			
1:00- 2:00	773	793			
2:00- 3:00	713	753			
3:00- 4:00	711	680			
4:00- 5:00	793	795			
5:00- 6:00	842	900			
6:00- 7:00	709	730			
7:00- 8:00	530	548			
8:00- 9:00	367	400			
9:00-10:00	287	299			
10:00-11:00	214	225			
11:00-12:00	102	88			
TOTALS	8661	10049	2785		

DELAWARE VALLEY REGIONAL PLANNING COMMISSION
24-HOUR TRAFFIC COUNT RECORD

COUNTY : BUCKS
MUNICIPALITY : DOYLESTOWN

ROAD COUNTED ON : PA 313 (SWAMP PIKE) EB
BETWEEN : PA 611 BYPASS & FERRY ROAD
DIRECTION : EAST

SR/SEG : 0313/0080
PROJECT : 202-700-D2
DATE : 11/11/96

DAY: DATE:	MON. 11/11-F	TUES. 11/12-F	WED. 11/13-F	THURS	FRI.
12:00- 1:00		27	26		
1:00- 2:00		27	15		
2:00- 3:00		19	18		
3:00- 4:00		39	32		
4:00- 5:00		77	80		
5:00- 6:00		246	224		
6:00- 7:00		725	653		
7:00- 8:00		967	961		
8:00- 9:00		946			
9:00-10:00	606	676			
10:00-11:00	544	530			
11:00-12:00	599	540			
12:00- 1:00	590	585			
1:00- 2:00	546	573			
2:00- 3:00	573	540			
3:00- 4:00	607	596			
4:00- 5:00	608	634			
5:00- 6:00	580	608			
6:00- 7:00	461	521			
7:00- 8:00	331	328			
8:00- 9:00	221	211			
9:00-10:00	173	217			
10:00-11:00	134	128			
11:00-12:00	68	73			
TOTALS	6641	9833	2009		

DELAWARE VALLEY REGIONAL PLANNING COMMISSION
24-HOUR TRAFFIC COUNT RECORD

COUNTY : BUCKS
MUNICIPALITY : DOYLESTOWN

ROAD COUNTED ON : PA 313 (SWAMP PIKE) WB
BETWEEN : PA 611 BYPASS & FERRY ROAD
DIRECTION : WEST

SR/SEG : 0313/0080
PROJECT : 202-700-D2
DATE : 11/11/96

DAY: DATE:	MON. 11/11-F	TUES. 11/12-F	WED. 11/13-F	THURS	FRI.
12:00- 1:00		69	74		
1:00- 2:00		27	31		
2:00- 3:00		14	21		
3:00- 4:00		21	18		
4:00- 5:00		25	28		
5:00- 6:00		72	71		
6:00- 7:00		226	211		
7:00- 8:00		411	375		
8:00- 9:00		403			
9:00-10:00	449	489			
10:00-11:00	509	474			
11:00-12:00	487	493			
12:00- 1:00	573	620			
1:00- 2:00	577	606			
2:00- 3:00	593	634			
3:00- 4:00	659	685			
4:00- 5:00	771	855			
5:00- 6:00	868	890			
6:00- 7:00	613	675			
7:00- 8:00	432	461			
8:00- 9:00	310	354			
9:00-10:00	295	337			
10:00-11:00	193	201			
11:00-12:00	110	114			
TOTALS	7439	9156	829		

DELAWARE VALLEY REGIONAL PLANNING COMMISSION
24-HOUR TRAFFIC COUNT RECORD

COUNTY : BUCKS
MUNICIPALITY : BUCKINGHAM

ROAD COUNTED ON : PA 263 NB
BETWEEN : PA 413 & SWAMP RD
DIRECTION : NORTH

SR/SEG : 0263/0190
PROJECT : 202-700-H1
DATE : 11/11/96

DAY: DATE:	MON. 11/11F	TUES. 11/12F	WED. 11/13F	THURS	FRI.
12:00- 1:00		17	22		
1:00- 2:00		8	11		
2:00- 3:00		18	18		
3:00- 4:00		10	13		
4:00- 5:00		39	22		
5:00- 6:00		149	84		
6:00- 7:00		354	305		
7:00- 8:00		728	583		
8:00- 9:00		571	394		
9:00-10:00		475			
10:00-11:00		356			
11:00-12:00		372			
12:00- 1:00		334			
1:00- 2:00	320	307			
2:00- 3:00	325	355			
3:00- 4:00	368	391			
4:00- 5:00	445	500			
5:00- 6:00	454	449			
6:00- 7:00	313	376			
7:00- 8:00	216	194			
8:00- 9:00	126	145			
9:00-10:00	126	134			
10:00-11:00	90	74			
11:00-12:00	43	50			
TOTALS	2826	6406	1452		

DELAWARE VALLEY REGIONAL PLANNING COMMISSION
24-HOUR TRAFFIC COUNT RECORD

COUNTY : BUCKS
MUNICIPALITY : BUCKINGHAM

ROAD COUNTED ON : PA 263 SB
BETWEEN : PA 413 & SWAMP RD
DIRECTION : SOUTH

SR/SEG : 0263/0191
PROJECT : 202-700-H1
DATE : 11/13/96

DAY: DATE:	MON.	TUES.	WED. 11/13F	THURS 11/14F	FRI. 11/15F
12:00- 1:00				23	17
1:00- 2:00				16	14
2:00- 3:00				11	9
3:00- 4:00				9	9
4:00- 5:00				21	14
5:00- 6:00				77	65
6:00- 7:00				302	281
7:00- 8:00				511	473
8:00- 9:00				482	
9:00-10:00				365	
10:00-11:00				385	
11:00-12:00				365	
12:00- 1:00				438	
1:00- 2:00			377	414	
2:00- 3:00			429	520	
3:00- 4:00			523	521	
4:00- 5:00			494	518	
5:00- 6:00			535	550	
6:00- 7:00			339	325	
7:00- 8:00			239	239	
8:00- 9:00			153	130	
9:00-10:00			124	149	
10:00-11:00			67	75	
11:00-12:00			51	52	
TOTALS			3331	6498	882

DELAWARE VALLEY REGIONAL PLANNING COMMISSION
24-HOUR TRAFFIC COUNT RECORD

COUNTY : BUCKS
MUNICIPALITY : BUCKINGHAM

ROAD COUNTED ON : PA 263 NB
BETWEEN : US 202 & AQUETONG RD
DIRECTION : NORTH

SR/SEG : 0263/0210
PROJECT : 202-700-J1
DATE : 11/18/96

DAY: DATE:	MON. 11/18F	TUES. 11/19F	WED. 11/20F	THURS	FRI.
12:00- 1:00		7	10		
1:00- 2:00		2	2		
2:00- 3:00		2	0		
3:00- 4:00		4	2		
4:00- 5:00		8	8		
5:00- 6:00		19	14		
6:00- 7:00		43	46		
7:00- 8:00		132	126		
8:00- 9:00		133	142		
9:00-10:00		147	146		
10:00-11:00		178	167		
11:00-12:00	135	156	160		
12:00- 1:00	144	150			
1:00- 2:00	198	190			
2:00- 3:00	126	140			
3:00- 4:00	156	170			
4:00- 5:00	144	138			
5:00- 6:00	141	153			
6:00- 7:00	136	122			
7:00- 8:00	88	89			
8:00- 9:00	55	57			
9:00-10:00	38	49			
10:00-11:00	24	27			
11:00-12:00	12	10			
TOTALS	1397	2126	823		

DELAWARE VALLEY REGIONAL PLANNING COMMISSION
24-HOUR TRAFFIC COUNT RECORD

COUNTY : BUCKS
MUNICIPALITY : BUCKINGHAM

ROAD COUNTED ON : PA 263 SB
BETWEEN : US 202 & AQUETONG RD
DIRECTION : SOUTH

SR/SEG : 0263/0210
PROJECT : 202-700-J1
DATE : 11/18/96

DAY: DATE:	MON. 11/18F	TUES. 11/19F	WED. 11/20F	THURS	FRI.
12:00- 1:00		9	11		
1:00- 2:00		4	3		
2:00- 3:00		1	4		
3:00- 4:00		5	7		
4:00- 5:00		10	12		
5:00- 6:00		11	15		
6:00- 7:00		18	22		
7:00- 8:00		72	81		
8:00- 9:00		141	140		
9:00-10:00		137	139		
10:00-11:00		111	125		
11:00-12:00	115	109			
12:00- 1:00	105	111			
1:00- 2:00	133	142			
2:00- 3:00	148	157			
3:00- 4:00	163	174			
4:00- 5:00	172	184			
5:00- 6:00	169	179			
6:00- 7:00	102	125			
7:00- 8:00	70	86			
8:00- 9:00	67	63			
9:00-10:00	51	56			
10:00-11:00	20	24			
11:00-12:00	15	17			
TOTALS	1330	1946	559		

DELAWARE VALLEY REGIONAL PLANNING COMMISSION
24-HOUR TRAFFIC COUNT RECORD

COUNTY : BUCKS
MUNICIPALITY : BUCKINGHAM

ROAD COUNTED ON : PA 413 NB
BETWEEN : US 202 & UPPER MOUNTAIN RD
DIRECTION : NORTH

SR/SEG : 0413/0530
PROJECT : 202-700-H2
DATE : 11/11/96

DAY: DATE:	MON. 11/11F	TUES. 11/12F	WED. 11/13F	THURS	FRI.
12:00- 1:00		28	24		
1:00- 2:00		11	14		
2:00- 3:00		4	6		
3:00- 4:00		9	4		
4:00- 5:00		30	26		
5:00- 6:00		76	75		
6:00- 7:00		229	197		
7:00- 8:00		398	410		
8:00- 9:00		457	446		
9:00-10:00		429			
10:00-11:00		389			
11:00-12:00		371			
12:00- 1:00	441	382			
1:00- 2:00	365	367			
2:00- 3:00	428	391			
3:00- 4:00	528	503			
4:00- 5:00	570	511			
5:00- 6:00	576	606			
6:00- 7:00	399	424			
7:00- 8:00	241	264			
8:00- 9:00	146	168			
9:00-10:00	145	136			
10:00-11:00	99	101			
11:00-12:00	35	51			
TOTALS	3973	6335	1202		

DELAWARE VALLEY REGIONAL PLANNING COMMISSION
24-HOUR TRAFFIC COUNT RECORD

COUNTY : BUCKS
MUNICIPALITY : BUCKINGHAM

ROAD COUNTED ON : PA 413 SB
BETWEEN : US 202 & UPPER MOUNTAIN RD
DIRECTION : SOUTH

SR/SEG : 0413/0530
PROJECT : 202-700-H2
DATE : 11/13/96

DAY: DATE:	MON.	TUES.	WED. 11/13F	THURS 11/14F	FRI. 11/15F
12:00- 1:00				24	27
1:00- 2:00				10	18
2:00- 3:00				17	13
3:00- 4:00				19	17
4:00- 5:00				32	30
5:00- 6:00				114	117
6:00- 7:00				367	
7:00- 8:00				567	
8:00- 9:00				587	
9:00-10:00				375	
10:00-11:00			365	310	
11:00-12:00			331	310	
12:00- 1:00			385	339	
1:00- 2:00			345	336	
2:00- 3:00			371	381	
3:00- 4:00			479	509	
4:00- 5:00			501	480	
5:00- 6:00			511	483	
6:00- 7:00			366	311	
7:00- 8:00			190	211	
8:00- 9:00			192	167	
9:00-10:00			173	141	
10:00-11:00			93	94	
11:00-12:00			58	52	
TOTALS			4360	6236	222

DELAWARE VALLEY REGIONAL PLANNING COMMISSION
24-HOUR TRAFFIC COUNT RECORD

COUNTY : BUCKS
MUNICIPALITY : BUCKINGHAM

ROAD COUNTED ON : PA 413 NB
BETWEEN : US 202 & MECHANICSVILLE RD
DIRECTION : NORTH

SR/SEG : 0413/0550
PROJECT : 202-700-H5
DATE : 11/11/96

DAY: DATE:	MON. 11/11F	TUES. 11/12F	WED. 11/13F	THURS	FRI.
12:00- 1:00		21	22		
1:00- 2:00		4	18		
2:00- 3:00		9	8		
3:00- 4:00		4	4		
4:00- 5:00		17	22		
5:00- 6:00		35	54		
6:00- 7:00		170	153		
7:00- 8:00		495	470		
8:00- 9:00		311			
9:00-10:00		276			
10:00-11:00		266			
11:00-12:00		310			
12:00- 1:00	308	257			
1:00- 2:00	246	279			
2:00- 3:00	329	332			
3:00- 4:00	416	439			
4:00- 5:00	467	489			
5:00- 6:00	508	509			
6:00- 7:00	351	406			
7:00- 8:00	229	308			
8:00- 9:00	144	179			
9:00-10:00	138	148			
10:00-11:00	78	78			
11:00-12:00	23	46			
TOTALS	3237	5388	751		

DELAWARE VALLEY REGIONAL PLANNING COMMISSION
24-HOUR TRAFFIC COUNT RECORD

COUNTY : BUCKS
MUNICIPALITY : BUCKINGHAM

ROAD COUNTED ON : PA 413 SB
BETWEEN : US 202 & MECHANICSVILLE RD
DIRECTION : SOUTH

SR/SEG : 0413/0550
PROJECT : 202-700-H5
DATE : 11/11/96

DAY: DATE:	MON. 11/11F	TUES. 11/12F	WED. 11/13F	THURS	FRI.
12:00- 1:00		37	26		
1:00- 2:00		10	10		
2:00- 3:00		6	9		
3:00- 4:00		4	12		
4:00- 5:00		15	17		
5:00- 6:00		27	27		
6:00- 7:00		102	90		
7:00- 8:00		330	349		
8:00- 9:00		682			
9:00-10:00		589			
10:00-11:00		332			
11:00-12:00		280			
12:00- 1:00		289			
1:00- 2:00	278	275			
2:00- 3:00	225	269			
3:00- 4:00	318	307			
4:00- 5:00	335	382			
5:00- 6:00	304	312			
6:00- 7:00	351	305			
7:00- 8:00	189	225			
8:00- 9:00	153	144			
9:00-10:00	104	98			
10:00-11:00	82	103			
11:00-12:00	33	37			
TOTALS	2372	5160	540		

DELAWARE VALLEY REGIONAL PLANNING COMMISSION
24-HOUR TRAFFIC COUNT RECORD

COUNTY : BUCKS
MUNICIPALITY : BUCKINGHAM

ROAD COUNTED ON : MECHANICSVILLE RD NB
BETWEEN : US 202 & PA 413
DIRECTION : NORTH

SR/SEG : 1002/0010
PROJECT : 202-700-K3
DATE : 11/18/96

DAY: DATE:	MON. 11/18F	TUES. 11/19F	WED. 11/20F	THURS	FRI.
12:00- 1:00		14	5		
1:00- 2:00		8	1		
2:00- 3:00		2	4		
3:00- 4:00		3	6		
4:00- 5:00		6	12		
5:00- 6:00		25	33		
6:00- 7:00		96	111		
7:00- 8:00		227	241		
8:00- 9:00	192	278			
9:00-10:00	233	258			
10:00-11:00	125	160			
11:00-12:00	116	144			
12:00- 1:00	153	145			
1:00- 2:00	155	196			
2:00- 3:00	167	217			
3:00- 4:00	231	250			
4:00- 5:00	218	238			
5:00- 6:00	258	243			
6:00- 7:00	202	192			
7:00- 8:00	104	105			
8:00- 9:00	111	101			
9:00-10:00	88	42			
10:00-11:00	37	26			
11:00-12:00	21	15			
TOTALS	2411	2991	413		

DELAWARE VALLEY REGIONAL PLANNING COMMISSION
24-HOUR TRAFFIC COUNT RECORD

COUNTY : BUCKS
MUNICIPALITY : BUCKINGHAM

ROAD COUNTED ON : MECHANICSVILLE RD SB
BETWEEN : US 202 & PA 413
DIRECTION : SOUTH

SR/SEG : 1002/0011
PROJECT : 202-700-K3
DATE : 11/18/96

DAY: DATE:	MON. 11/18/96	TUES. 11/19F	WED. 11/20F	THURS	FRI.
12:00- 1:00		9	10		
1:00- 2:00		6	1		
2:00- 3:00		2	1		
3:00- 4:00		1	2		
4:00- 5:00		9	12		
5:00- 6:00		40	44		
6:00- 7:00		165	183		
7:00- 8:00		241	224		
8:00- 9:00	277	294			
9:00-10:00	173	218			
10:00-11:00	179	193			
11:00-12:00	196	223			
12:00- 1:00	175	252			
1:00- 2:00	174	212			
2:00- 3:00	156	181			
3:00- 4:00	170	193			
4:00- 5:00	167	197			
5:00- 6:00	204	215			
6:00- 7:00	134	178			
7:00- 8:00	108	99			
8:00- 9:00	42	67			
9:00-10:00	30	38			
10:00-11:00	16	16			
11:00-12:00	8	8			
TOTALS	2209	3057	477		

DELAWARE VALLEY REGIONAL PLANNING COMMISSION
24-HOUR TRAFFIC COUNT RECORD

COUNTY : BUCKS
MUNICIPALITY : BUCKINGHAM

ROAD COUNTED ON : MECHANICSVILLE RD
BETWEEN : PA 413 & STREET RD
DIRECTION : BOTH

SR/SEG : 1002/0040
PROJECT : 202-700-K2
DATE : 11/18/96

DAY: DATE:	MON. 11/18F	TUES. 11/19F	WED. 11/20F	THURS	FRI.
12:00- 1:00		13	12		
1:00- 2:00		7	7		
2:00- 3:00		0	3		
3:00- 4:00		2	4		
4:00- 5:00		16	6		
5:00- 6:00		75	67		
6:00- 7:00		240	180		
7:00- 8:00		671	703		
8:00- 9:00		600	624		
9:00-10:00	284	539			
10:00-11:00	452	450			
11:00-12:00	376	446			
12:00- 1:00	421	472			
1:00- 2:00	322	370			
2:00- 3:00	350	367			
3:00- 4:00	344	367			
4:00- 5:00	417	430			
5:00- 6:00	364	388			
6:00- 7:00	273	287			
7:00- 8:00	189	198			
8:00- 9:00	123	133			
9:00-10:00	87	94			
10:00-11:00	43	49			
11:00-12:00	24	24			
TOTALS	4069	6238	1606		

DELAWARE VALLEY REGIONAL PLANNING COMMISSION
24-HOUR TRAFFIC COUNT RECORD

COUNTY : BUCKS
MUNICIPALITY : BUCKINGHAM

ROAD COUNTED ON : COLD SPRING CREAMERY RD NB
BETWEEN : NORTH OF PA 313
DIRECTION : NORTH

SR/SEG : 1004/0010
PROJECT : 202-700-L1
DATE : 11/11/96

DAY: DATE:	MON. 11/11F	TUES. 11/12F	WED. 11/13F	THURS	FRI.
12:00- 1:00		3	9		
1:00- 2:00		3	1		
2:00- 3:00		0	1		
3:00- 4:00		1	3		
4:00- 5:00		4	4		
5:00- 6:00		22	21		
6:00- 7:00		139	115		
7:00- 8:00		279	244		
8:00- 9:00		252	268		
9:00-10:00		244	229		
10:00-11:00		232	202		
11:00-12:00	270	259	215		
12:00- 1:00	281	310			
1:00- 2:00	274	257			
2:00- 3:00	250	273			
3:00- 4:00	320	330			
4:00- 5:00	333	336			
5:00- 6:00	382	362			
6:00- 7:00	264	302			
7:00- 8:00	188	271			
8:00- 9:00	162	167			
9:00-10:00	117	101			
10:00-11:00	57	51			
11:00-12:00	14	24			
TOTALS	2912	4222	1312		

DELAWARE VALLEY REGIONAL PLANNING COMMISSION
24-HOUR TRAFFIC COUNT RECORD

COUNTY : BUCKS
MUNICIPALITY : BUCKINGHAM

ROAD COUNTED ON : COLD SPRING CREAMERY RD SB
BETWEEN : NORTH OF PA 313
DIRECTION : SOUTH

SR/SEG : 1004/0010
PROJECT : 202-700-L1
DATE : 11/11/96

DAY: DATE:	MON. 11/11F	TUES. 11/12F	WED. 11/13F	THURS	FRI.
12:00- 1:00		6	8		
1:00- 2:00		5	0		
2:00- 3:00		8	4		
3:00- 4:00		5	5		
4:00- 5:00		8	4		
5:00- 6:00		32	44		
6:00- 7:00		146	145		
7:00- 8:00		277	283		
8:00- 9:00		365	393		
9:00-10:00		334	310		
10:00-11:00		228	249		
11:00-12:00		277	241		
12:00- 1:00	289	316			
1:00- 2:00	237	250			
2:00- 3:00	244	265			
3:00- 4:00	323	298			
4:00- 5:00	367	386			
5:00- 6:00	329	350			
6:00- 7:00	205	247			
7:00- 8:00	156	185			
8:00- 9:00	75	93			
9:00-10:00	44	47			
10:00-11:00	30	30			
11:00-12:00	15	12			
TOTALS	2314	4170	1686		

DELAWARE VALLEY REGIONAL PLANNING COMMISSION
24-HOUR TRAFFIC COUNT RECORD

COUNTY : BUCKS
MUNICIPALITY : BUCKINGHAM

ROAD COUNTED ON : COLD SPRING CREAMERY RD
BETWEEN : SOUTH OF PA 413
DIRECTION : BOTH

SR/SEG : 1004/0050
PROJECT : 202-700-L1
DATE : 11/11/96

DAY: DATE:	MON. 11/11F	TUES. 11/12F	WED. 11/13F	THURS	FRI.
12:00- 1:00		8	10		
1:00- 2:00		3	3		
2:00- 3:00		3	2		
3:00- 4:00		4	7		
4:00- 5:00		6	2		
5:00- 6:00		42	32		
6:00- 7:00		152	143		
7:00- 8:00		318	298		
8:00- 9:00		441	429		
9:00-10:00		308	284		
10:00-11:00		277	239		
11:00-12:00	219	349			
12:00- 1:00	286	330			
1:00- 2:00	268	303			
2:00- 3:00	271	314			
3:00- 4:00	413	369			
4:00- 5:00	300	361			
5:00- 6:00	349	398			
6:00- 7:00	270	281			
7:00- 8:00	196	221			
8:00- 9:00	97	104			
9:00-10:00	81	89			
10:00-11:00	51	45			
11:00-12:00	20	17			
TOTALS	2821	4743	1449		

DELAWARE VALLEY REGIONAL PLANNING COMMISSION
24-HOUR TRAFFIC COUNT RECORD

COUNTY : BUCKS
MUNICIPALITY : PLUMSTEAD

ROAD COUNTED ON : FERRY RD
BETWEEN : PA 313 & PA 611
DIRECTION : BOTH

SR/SEG : 1006/0150
PROJECT : 202-700-S1
DATE : 11/18/96

DAY: DATE:	MON. 11/18F	TUES. 11/19F	WED. 11/20F	THURS	FRI.
12:00- 1:00		40	15		
1:00- 2:00		1	10		
2:00- 3:00		6	5		
3:00- 4:00		11	10		
4:00- 5:00		40	25		
5:00- 6:00		108	115		
6:00- 7:00		269	255		
7:00- 8:00		293	282		
8:00- 9:00		249	238		
9:00-10:00		207	226		
10:00-11:00		197	206		
11:00-12:00	139	166			
12:00- 1:00	176	193			
1:00- 2:00	177	199			
2:00- 3:00	260	284			
3:00- 4:00	331	339			
4:00- 5:00	357	335			
5:00- 6:00	248	259			
6:00- 7:00	167	173			
7:00- 8:00	117	95			
8:00- 9:00	80	88			
9:00-10:00	42	47			
10:00-11:00	33	27			
11:00-12:00	18	14			
TOTALS	2145	3640	1387		

DELAWARE VALLEY REGIONAL PLANNING COMMISSION
24-HOUR TRAFFIC COUNT RECORD

COUNTY : BUCKS
MUNICIPALITY : PLUMSTEAD

ROAD COUNTED ON : DANBORO-PT PLEASANT PIKE
BETWEEN : PA 611 & PA 413
DIRECTION : BOTH

SR/SEG : 1006/0190
PROJECT :202-700-M3
DATE : 11/18/96

DAY: DATE:	MON. 11/18F	TUES. 11/19F	WED. 11/20F	THURS	FRI.
12:00- 1:00		12	16		
1:00- 2:00		6	10		
2:00- 3:00		2	9		
3:00- 4:00		5	9		
4:00- 5:00		12	13		
5:00- 6:00		55	59		
6:00- 7:00		195	200		
7:00- 8:00		323	328		
8:00- 9:00		299	296		
9:00-10:00		217	233		
10:00-11:00		210	199		
11:00-12:00	230	200			
12:00- 1:00	237	227			
1:00- 2:00	188	180			
2:00- 3:00	223	206			
3:00- 4:00	315	308			
4:00- 5:00	345	355			
5:00- 6:00	361	313			
6:00- 7:00	204	238			
7:00- 8:00	165	172			
8:00- 9:00	108	118			
9:00-10:00	83	84			
10:00-11:00	67	70			
11:00-12:00	47	36			
TOTALS	2573	3843	1372		

DELAWARE VALLEY REGIONAL PLANNING COMMISSION
24-HOUR TRAFFIC COUNT RECORD

COUNTY : BUCKS
MUNICIPALITY : PLUMSTEAD

ROAD COUNTED ON : BROAD STREET
BETWEEN : EAST OF PA 611 BYPASS
DIRECTION : EAST

SR/SEG :
PROJECT : 202-700-F2
DATE : 11/11/96

DAY: DATE:	MON. 11/11F	TUES. 11/12F	WED. 11/13F	THURS	FRI.
12:00- 1:00		7	17		
1:00- 2:00		3	5		
2:00- 3:00		3	4		
3:00- 4:00		9	6		
4:00- 5:00		9	9		
5:00- 6:00		10	9		
6:00- 7:00		21	19		
7:00- 8:00		102			
8:00- 9:00		263			
9:00-10:00		334			
10:00-11:00		231			
11:00-12:00	137	146			
12:00- 1:00	114	131			
1:00- 2:00	146	165			
2:00- 3:00	148	203			
3:00- 4:00	148	168			
4:00- 5:00	140	177			
5:00- 6:00	144	147			
6:00- 7:00	161	159			
7:00- 8:00	119	102			
8:00- 9:00	122	80			
9:00-10:00	61	44			
10:00-11:00	42	44			
11:00-12:00	21	30			
TOTALS	1503	2588	69		

DELAWARE VALLEY REGIONAL PLANNING COMMISSION
24-HOUR TRAFFIC COUNT RECORD

COUNTY : BUCKS
MUNICIPALITY : PLUMSTEAD

ROAD COUNTED ON : BROAD STREET
BETWEEN : EAST OF PA 611 BYPASS
DIRECTION : WEST

SR/SEG :
PROJECT : 202-700-F2
DATE : 11/11/96

DAY: DATE:	MON. 11/11F	TUES. 11/12F	WED. 11/13F	THURS	FRI.
12:00- 1:00		31	25		
1:00- 2:00		11	19		
2:00- 3:00		5	11		
3:00- 4:00		6	5		
4:00- 5:00		7	10		
5:00- 6:00		14	8		
6:00- 7:00		22	16		
7:00- 8:00		44			
8:00- 9:00		116			
9:00-10:00		84			
10:00-11:00		140			
11:00-12:00	142	158			
12:00- 1:00	138	165			
1:00- 2:00	183	245			
2:00- 3:00	167	196			
3:00- 4:00	169	195			
4:00- 5:00	197	272			
5:00- 6:00	276	391			
6:00- 7:00	264	325			
7:00- 8:00	154	155			
8:00- 9:00	118	120			
9:00-10:00	82	85			
10:00-11:00	70	65			
11:00-12:00	36	36			
TOTALS	1996	2888	94		

DELAWARE VALLEY REGIONAL PLANNING COMMISSION
24-HOUR TRAFFIC COUNT RECORD

COUNTY : BUCKS
MUNICIPALITY : PLUMSTEAD

ROAD COUNTED ON : BROAD STREET
BETWEEN : WEST OF PA 611 BYPASS
DIRECTION : EAST

SR/SEG :
PROJECT : 202-700-F1
DATE : 11/11/96

DAY: DATE:	MON. 11/11F	TUES. 11/12F	WED. 11/13F	THURS	FRI.
12:00- 1:00		4	2		
1:00- 2:00		0	1		
2:00- 3:00		3	3		
3:00- 4:00		3	2		
4:00- 5:00		3	3		
5:00- 6:00		3	3		
6:00- 7:00		12	10		
7:00- 8:00		40			
8:00- 9:00		122			
9:00-10:00		176			
10:00-11:00		118			
11:00-12:00	66	70			
12:00- 1:00	58	66			
1:00- 2:00	74	89			
2:00- 3:00	87	98			
3:00- 4:00	79	91			
4:00- 5:00	75	88			
5:00- 6:00	78	88			
6:00- 7:00	98	90			
7:00- 8:00	69	61			
8:00- 9:00	75	48			
9:00-10:00	40	27			
10:00-11:00	25	24			
11:00-12:00	10	13			
TOTALS	834	1337	24		

DELAWARE VALLEY REGIONAL PLANNING COMMISSION
24-HOUR TRAFFIC COUNT RECORD

COUNTY : BUCKS
MUNICIPALITY : PLUMSTEAD

ROAD COUNTED ON : BROAD STREET
BETWEEN : WEST OF PA 611 BYPASS
DIRECTION : WEST

SR/SEG :
PROJECT : 202-700-F1
DATE : 11/11/96

DAY: DATE:	MON. 11/11F	TUES. 11/12F	WED. 11/13F	THURS	FRI.
12:00- 1:00		15	14		
1:00- 2:00		5	5		
2:00- 3:00		0	5		
3:00- 4:00		1	2		
4:00- 5:00		2	0		
5:00- 6:00		12	1		
6:00- 7:00		4	7		
7:00- 8:00		20			
8:00- 9:00		58			
9:00-10:00		46			
10:00-11:00		78			
11:00-12:00	89	84			
12:00- 1:00	82	106			
1:00- 2:00	102	125			
2:00- 3:00	114	109			
3:00- 4:00	112	106			
4:00- 5:00	120	166			
5:00- 6:00	170	227			
6:00- 7:00	216	238			
7:00- 8:00	120	128			
8:00- 9:00	100	80			
9:00-10:00	58	70			
10:00-11:00	55	45			
11:00-12:00	27	24			
TOTALS	1365	1749	34		