## Appendix O:

Updated Transportation Analysis Exhibits August 2006

### Appendix O:

### Updated Transportation Analysis Exhibits

- T-1A Turning Movement Volume Summary of Counts
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- T-3 Calibration Process for Queue Lengths
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#### **Turning Movement Volume Summary**

Project: Scenario: 04007.00 Wood Trails

AM Peak Hour- Proposed Action

#### Actual Counts

		1	156th Ave NE/
		2004	NE 203rd PL
Count	Date: 12/1/2004	<b>≜</b> N	
Count	Source: Trafficount		3 3
	EB WB NB SB Total		5
	0% 0% 3% 3%		358
PHF	0.93		5 <u> </u> <u> </u>
	Peak Hour Used:		
	From 730 To 830	balan	ced Thru-Movements
		2	156th Ave NE/
		2004	NE 202nd St
Count	Date: 12/1/2004	<b>≜</b> N	
Count	Source: Traffic Count	ľ	218 3
	EB WB NB SB Total	3	8
%HV	0% 0% 3% 4%		355
PHF	0.94	8	
	Peak Hour Used:		- 108
	From 715 To 815	balan	ced Thru-Movements
		3	156th Ave NE/ NE 201st St
Count	Date: 12/1/2004	2004	NE 20151 31
	Source: Traffic Count	<b>T</b> ''	- 223 -
oouni	EB WB NB SB Total	2	. 8
%HV	22% 0% 4% 1%	2	366
PHF	0.92	16	
	Peak Hour Used:		113
	From 715 To 815		
		4	156th Ave NE/
Count	Date: 12/1/2004	2004	NE 198th St
	Source: Traffic Count	<b>≜</b> N	<u>1</u> 24 0
Count	EB WB NB SB Total	2	0 <u>27</u> 92 14
%HV	5% 0% 5% 3%	2	430 3
PHF	0.96	19	29
	Peak Hour Used:		12 103 3
	From 730 To 830		
		5	156th Ave NE/
-	Date: 12/1/2004	2004	NE 195th St
		<b>≜</b> N	∞
Count	Source: Traffic Count		e 568
%HV	EB WB NB SB Total 0% 12% 6% 3%	4	459 2
PHF	0.96	12	31
	Peak Hour Used:		20 20
	From 730 To 830		· + (4
<u> </u>		6	156th Ave NE/
ļ		2004	Woodinville-Duvall Rd
Count	Date: 12/1/2004	<b>≜</b> N	
Count	Source: Traffic Count		216
	EB WB NB SB Total	73	9
%HV PHF	11% 2% 0% 4%	485	1,883 974
PHF	0.99 Peak Hour Used:		+ $+$ $+$ $+$ $+$ $+$ $+$ $+$ $+$
	From 700 To 800		

#### **Turning Movement Volume Summary**

Project: Scenario: 04007.00 Wood Trails PM Peak Hour- Proposed Action

Actual Counts

				1	156th Ave NE/
0 D		40/0/2	0004	2004	NE 203rd PL
Count Da Count So		12/8/2 Traffic (		♠ N	5 5
е %HV ()	B WB	NB SB			526
PHF			0.94		3
Fr	<b>Реак Н</b> о rom 1630	our Used: О то			balanced Thru-Movements
	-				
				2 2004	156th Ave NE/ NE 202nd St
Count Da	ite:	1/13/2		<b>≜</b> N	
Count So	ource:	TC	2		9 210
		NB SB	Total		1
%HV 0	0% 0% 0	0% 0%			537
PHF			0.92		10
	Peak He	our Used:			12 295
Fr	rom 1630	0 То	1730		balanced Thru-Movements
				3 2004	156th Ave NE/ NE 201st St
Count Da	ite:	1/13/2	2004	2004 ▲ N	NE 2013COL
Count So		TC		Τ	<u> </u>
		NB SB			
%ну 0		0% 0%	TOTAL		544
PHF			0.89		11
	Poak H	our Used:			300 19
E,	rom 1630		1730		
	1030	0 10	1730		balanced Thru-Movements
				4 2004	156th Ave NE/ NE 198th St
Count Da	ite:	6/1/2	004		
			004	2004	NE 198th St
Count So	ource: Traf	ficount		2004	NE 198th St
Count So	ource: Traf	ficount		2004	NE 198th St
Count So E	ource: Traf	ficount <b>NB SB</b> 1% 1%		2004	NE 198th St
Count So E %HV 0	ource: Trafi E <b>B WB</b> I% 0% <sup>-</sup>	ficount <b>NB SB</b> 1% 1%	<b>Total</b> 0.88	2004	NE 198th St
Count So E %HV 0 PHF	ource: Trafi E <b>B WB</b> I% 0% <sup>-</sup>	ficount NB SB 1% 1% o <i>ur Used:</i>	<b>Total</b> 0.88	2004	NE 198th St
Count So E %HV 0 PHF	ource: Traff EB WB 1 % 0% Peak He	ficount NB SB 1% 1% o <i>ur Used:</i>	Total 0.88	2004	NE 198th St $\begin{array}{c cccc} \hline \hline \\ \hline$
Count So E %HV 0 PHF	ource: Traff EB WB 1 % 0% Peak He	ficount NB SB 1% 1% o <i>ur Used:</i> 0 To	Total 0.88 1730	2004	NE 198th St
Count So E %HV () PHF Fr Count Da	nurce: Trafi EB WB 1 1% 0% <sup>-/</sup> <i>Peak He</i> rom 1630 nte:	ficount NB SB 1% 1% our Used: 0 To 3/4/2	Total 0.88 1730	2004 ♠ N	NE 198th St
Count So E %HV () PHF Fr Count Da	ource: Trafi EB WB 1 1% 0% <sup>-/</sup> <i>Peak He</i> rom 1630	ficount NB SB 1% 1% our Used: 0 To 3/4/2	Total 0.88 1730	2004 ▲ N 5 2004	NE 198th St
Count So E %HV 0 PHF Fr Count Da Count So	nurce: Trafi EB WB 1 1% 0% 2 Peak He rom 1630 nte: purce:	ficount NB SB 1% 1% our Used: 0 To 3/4/2	Total 0.88 1730 004 Smithy	2004 ▲ N 5 2004	NE 198th St
Count So E %HV 0 PHF Fr Count Da Count So E %HV 0	Burce: Traff B WB % 0% Peak He rom 1630 tte: burce: EB WB	ficount NB SB 1% 1% our Used: 0 To 3/4/2: TrafficS NB SB 3% 3%	Total 0.88 1730 004 Smithy Total	2004 ▲ N 5 2004	NE 198th St
Count So E %HV 0 PHF Fr Count Da Count So E	Burce: Traff B WB % 0% Peak He rom 1630 tte: burce: EB WB	ficount NB SB 1% 1% our Used: 0 To 3/4/2: TrafficS NB SB 3% 3%	Total 0.88 1730 004 Smithy	2004 ▲ N 5 2004	NE 198th St $\overline{N}$ $\overline{D}$ $\overline{\Gamma}$ 1         585         2           7         13         13 $\overline{L}$ $\overline{D}$ $\overline{N}$ IS6th Ave NE/ NE 195th St           State of the second seco
Count So E %HV 0 PHF Fr Count Da Count So E %HV 0	purce:         Traff           EB         WB         1           1%         0%         2           Peak         Ho         2           rom         1630           nte:         2           purce:         2           EB         WB         1           1%         8%         3	ficount NB SB 1% 1% our Used: 0 To 3/4/2: TrafficS NB SB 3% 3%	Total 0.88 1730 004 Gmithy Total 0.92	2004 ▲ N 5 2004	NE 198th St
Count So PHF Count Da Count So PHF	purce:         Traff           EB         WB         1           1%         0%         2           Peak         Ho         2           rom         1630           nte:         2           purce:         2           EB         WB         1           1%         8%         3	ficount NB SB 1% 1% our Used: 0 To 3/4/2 TrafficS NB SB 3% 3% our Used:	Total 0.88 1730 004 Gmithy Total 0.92	2004 ▲ N 5 2004	NE 198th St $\overline{N}$ $\overline{D}$ $\overline{\Gamma}$ 1         585         2           7         13         13 $\overline{L}$ $\overline{D}$ $\overline{N}$ IS6th Ave NE/ NE 195th St           State of the second seco
Count So PHF Count Da Count So PHF	Perce: Traff EB WB 1 W 0% Peak Ho rom 1630 me: purce: EB WB 1 WB 1 Peak Ho	ficount NB SB 1% 1% our Used: 0 To 3/4/2 TrafficS NB SB 3% 3% our Used:	Total 0.88 1730 004 Gmithy Total 0.92	2004 ▲ N 5 2004 ▲ N	NE 198th St
Count So PHF Count Da Count So PHF	Perce: Traff EB WB 1 W 0% Peak Ho rom 1630 me: purce: EB WB 1 WB 1 Peak Ho	ficount <b>NB SB</b> 1% 1% our Used: 0 To 3/4/2 TrafficS <b>NB SB</b> 3% 3% our Used: 5 To	Total 0.88 1730 004 Smithy Total 0.92 1715	2004 ▲ N 5 2004 ▲ N 6 2003	NE 198th St       N     N     C     C       1     585     13       7     585     13       L     L     L       0     623     0       6     14       N     S     14       N     S     S       balanced Thru-Movements     S     S
Count So PHF Count Da Count So PHF	Period Pe	ficount NB SB 1% 1% our Used: 0 To 3/4/2 TrafficS NB SB 3% 3% our Used:	Total 0.88 1730 004 Smithy Total 0.92 1715	2004 ▲ N 5 2004 ▲ N	NE 198th St           N         N         P           1         585         13           1         585         13           7         1         585         13           1         585         13         14           1         585         13         156th Ave NE/           NE 195th St         N         N         N         N           3         623         0         14         14           56th Ave NE/         N         14         14         14           balanced Thru-Movements         156th Ave NE/         Woodinville-Duvall Rd         156th Ave NE/
Count So PHF Count Da Count So PHF Fr PHF Fr	Period Pe	ficount <b>NB SB</b> 1% 1% our Used: 0 To 3/4/2 TrafficS <b>NB SB</b> 3% 3% our Used: 5 To	Total 0.88 1730 004 Smithy Total 0.92 1715	2004 ▲ N 5 2004 ▲ N 6 2003	NE 198th St
Count So PHF Count Da Count So PHF Fr Count Da Count Da Count Da	Period Pe	ficount NB SB 1% 1% our Used: 0 To 3/4/2 TrafficS NB SB 3% 3% our Used: 5 To 5/20/2 King C	Total 0.88 1730 004 Smithy Total 0.92 1715	2004 ▲ N 5 2004 ▲ N 6 2003	NE 198th St         N       N       P         1       585       13         7       13       13         1       585       13         7       10       13         1       585       13         1       585       13         1       580       13         1       580       13         1       580       13         1       580       13         1       580       13         1       580       13         1       580       13         1       580       13         1       580       13         1       623       0         3       623       14         1       14       14         balanced Thru-Movements       156th Ave NE/         Woodinville-Duvall Rd       14
Count So PHF Count Da Count Da Count So PHF Fr Count Da Count Da Count So Count So Count So	purce:         Traff           EB         WB         1           1%         0%         2           Peak         He         163(           nte:	ficount NB SB 1% 1% our Used: 0 To 3/4/21 TrafficS NB SB 3% 3% our Used: 5 To 5/20/2 King CC NB SB 3%	Total 0.88 1730 004 Smithy Total 0.92 1715	2004 ▲ N 5 2004 ▲ N 6 2003	NE 198th St         N<
Count So PHF Count Da Count Da Count So PHF Fr Count Da Count Da Count So Count So Count So	purce:         Traff           EB         WB         1           1%         0%         2           Peak         He         1           purce:         EB         WB         1           1%         8%         3           Peak         He         1           purce:         EB         WB         1           purce:         EB         WB         1           purce:         8%         3%         3%           9%         3%         9%         3%	ficount NB SB 1% 1% our Used: 0 To 3/4/2 TrafficS NB SB 3% 3% our Used: 5 To 5/20/2 King C NB SB 3% 0.91	Total 0.88 1730 004 Smithy Total 0.92 1715 2003 ounty Total	2004 ▲ N 5 2004 ▲ N 6 2003	NE 198th St       N     N     N     N       1     585     2       7     13       L     L     L       156th Ave NE/ NE 195th St         NE 195th St         0     C       3     623     0       6     14       N     S       Dalanced Thru-Movements         156th Ave NE/ Ne 195th St
Count So PHF Count Da Count Da Count Da PHF Fr Count Da Count Da Count Da Count Da Count Da Count Da	purce:         Traff           EB         WB         1           1%         0%         2           Peak         He         1           purce:         EB         WB         1           1%         8%         3           Peak         He         1           purce:         EB         WB         1           purce:         EB         WB         1           purce:         8%         3%         3%           9%         3%         9%         3%	ficount NB SB 1% 1% our Used: 0 To 3/4/2 TrafficS NB SB 3% 3% our Used: 5 To 5/20/2 King C NB SB 3% 0.91 our Used:	Total 0.88 1730 004 Smithy Total 0.92 1715 2003 ounty Total	2004 ▲ N 5 2004 ▲ N 6 2003	NE 198th St       N     N     N     N       1     585     2       7     13       L     L     L       156th Ave NE/ NE 195th St         NE 195th St         0     C       3     623     0       6     14       N     S       Dalanced Thru-Movements         156th Ave NE/ Ne 195th St

#### **Turning Movement Volume Summary**

Project: Scenario: 04007.00 Wood Trails AM Peak Hour- Proposed Action

Actual Counts

	7 W	oodinville-Duvall Rd/
	2004 NE	North Woodinville Way
Count Date: 12/1/2004	<b>▲</b> N	
Count Source: Traffic Count		
EB WB NB SB Total		
%HV 7% 1% 6% 0%	506	1,891 903
PHF 0.94	51	287
Peak Hour Used:	61	83
From 700 To 800		4
	8 Woo	dinville-Snohomish Rd/
	2004	NE 195th St
Count Date: 12/1/2004	<b>≜</b> N	<b>_</b>
Count Source: Traffic Count	80	358
EB WB NB SB Total	182	43
%HV 7% 4% 14% 12%	647	2,823 900
PHF 0.98	186	14
Peak Hour Used:	150	133
From 700 To 800		<u> </u>
	9	168th Avenue NE
	2004 NE	Woodinville-Duvall Rd
Count Date: 12/1/2004	<b>≜</b> N	
Count Source: Traffic Count	217	- 62
EB WB NB SB Total	187	18
% <b>HV</b> 7% 4% 1% 9%	487	2,076 884
PHF 0.90	56	60
Peak Hour Used:	70	33

 
 Turning Movement Volume Summary

 Project:
 04007.00
 Wood Trails

 Scenario:
 PM Peak Hour- Proposed Action
 PM Peak Hour- Proposed Action

#### Actual Counts

	7 Woodinville-Duvall Rd/
<b>B</b> ( <b>B</b> )	2003 NE North Woodinville Way
Count Date: 5/20/2003	<b>≜</b> N
Count Source: King County EB WB NB SB Total	
%HV 0% 0% 0% 2%	1,006 2,700 719
PHF 0.92 0.96 0.89	97 296
Peak Hour Used:	2 3
From 1600 To 1700	2 4
From 1600 16 1700	
	8 Woodinville-Snohomish Rd/
	2004 NE 195th St
Count Date: 3/4/2004	<b>▲</b> N
Count Source: Trafficount	263
EB WB NB SB Total	70 77
%HV 3% 3% 4% 3%	731 3,225 711
PHF 0.96	207 46
Peak Hour Used:	311 311
From 1615 To 1715	<u> </u>
	10 SR 522 NB Off-Ramp/
	2004 NE 195th St
Count Date: 3/4/2004	<b>▲</b> N
Count Source: TrafficSmithy	
EB WB NB SB Total	
<b>%нv</b> 1% 3% 4%	304 2,394 1,270
PHF 0.92	
Peak Hour Used:	762
From 1615 To 1715	balanced Thru-Movements
	11 SR 522 SB On-Ramp/
0	2004 NE 195th St
Count Date: 3/4/2004	
Count Source: TrafficSmithy	2004 NE 195th St
	2004 NE 195th St
Count Source: TrafficSmithy EB WB NB SB Total	2004 NE 195th St
Count Source:         TrafficSmithy           EB         NB         SB         Total           %HV         0%         0%         0%         0%	2004 NE 195th St ▲ N 342 1,778 505
Count Source:         TrafficSmithy           EB         WB         NB         SB         Total           %HV         0%         0%         0%         0%           PHF         0.88         0.88         0.88         0.88	2004 NE 195th St ▲ N 342 1,778 505
Count Source: TrafficSmithy EB WB NB SB Total %HV 0% 0% 0% 0% PHF 0.88 Peak Hour Used:	2004         NE 195th St           ▲ N
Count Source: TrafficSmithy EB WB NB SB Total %HV 0% 0% 0% 0% PHF 0.88 Peak Hour Used:	2004         NE 195th St           ▲ N
Count Source: TrafficSmithy EB WB NB SB Total %HV 0% 0% 0% 0% PHF 0.88 Peak Hour Used: From 1615 To 1715	2004         NE 195th St           N         342         1,778         505           58         873           101         156th Ave NE/           2004         240th St
Count Source:         TrafficSmithy           EB         WB         NB         SB         Total           %HV         0%         0%         0%         0%           PHF         0.88         Peak Hour Used:         To         1715           From         1615         To         1715           Count Date:         4/6/2006         4/6/2006	2004         NE 195th St           N
Count Source:         TrafficSmithy           EB         WB         NB         SB         Total           %HV         0%         0%         0%         0%           PHF         0.88         0.88         Peak Hour Used:           From         1615         To         1715           Count Date:         4/6/2006         Count Source:         TC2	2004 NE 195th St N 342 1,778 505 58 1,778 505 873 101 101 156th Ave NE/ 2004 240th St N St St St St St St St St St St
Count Source:         TrafficSmithy           EB         WB         NB         SB         Total           %HV         0%         0%         0%         0%           PHF         0.88         Peak Hour Used:           From         1615         To         1715           Count Date:         4/6/2006         Count Source:         TC2           EB         WB         NB         SB         Total	2004         NE 195th St           N
Count Source:         TrafficSmithy           EB         WB         NB         SB         Total           %HV         0%         0%         0%         0%           PHF         0.88           0.88           Peak Hour Used:          1615         To         1715           Count Date:         4/6/2006              Count Source:         TC2          EB         WB         NB         SB         Total           %HV         0%         1%         0%	2004         NE 195th St           ▲ N
Count Source:         TrafficSmithy           EB         WB         NB         SB         Total           %HV         0%         0%         0%         0%           PHF         0.88         Peak Hour Used:         0.88           From         1615         To         1715           Count Date:         4/6/2006         4/6/2006         000           Count Source:         TC2         EB         WB         NB         SB         Total           %HV         0%         1%         0%         PHF         0.90	2004         NE 195th St           N
Count Source:         TrafficSmithy           EB         WB         NB         SB         Total           %HV         0%         0%         0%         0%           PHF         0.88           0.88           Peak Hour Used:          1615         To         1715           Count Date:         4/6/2006              Count Source:         TC2          EB         WB         NB         SB         Total           %HV         0%         1%         0%               Gount Source:         TC2 </td <td>2004         NE 195th St           ▲ N        </td>	2004         NE 195th St           ▲ N
Count Source:         TrafficSmithy           EB         WB         NB         SB         Total           %HV         0%         0%         0%         0%           PHF         0.88              Peak         Hour Used:           1715           Count Date:         4/6/2006              Count Source:         TC2          EB         WB         NB         SB         Total           %HV         0%         1%         0%	2004         NE 195th St           N
Count Source:         TrafficSmithy           EB         WB         NB         SB         Total           %HV         0%         0%         0%         0%           PHF         0.88         Peak Hour Used:         0.88           From         1615         To         1715           Count Date:         4/6/2006         4/6/2006         0%           Count Source:         TC2         EB         WB         NB         SB         Total           %HV         0%         1%         0%         PHF         0.90           PHF         0.90         Peak Hour Used:         1         0.90	2004     NE 195th St       N     101       101     156th Ave NE/       2004     240th St       N     101       101     156th Ave NE/       2004     240th St
Count Source:         TrafficSmithy           EB         WB         NB         SB         Total           %HV         0%         0%         0%         0%           PHF         0.88         Peak Hour Used:         0.88           From         1615         To         1715           Count Date:         4/6/2006         4/6/2006         0%           Count Source:         TC2         EB         WB         NB         SB         Total           %HV         0%         1%         0%         PHF         0.90           PHF         0.90         Peak Hour Used:         1         0.90	2004         NE 195th St           N         342         1,778         505           58         873         873           101         156th Ave NE/         2004           2004         240th St         1           N         SQ         To           46         112         500           112         SQ         To
Count Source:         TrafficSmithy           EB         WB         NB         SB         Total           %HV         0%         0%         0%         0%           PHF         0.88         Peak Hour Used:         0.88           From         1615         To         1715           Count Date:         4/6/2006         4/6/2006         0%           Count Source:         TC2         EB         WB         NB         SB         Total           %HV         0%         1%         0%         PHF         0.90           PHF         0.90         Peak Hour Used:         1         0.90	2004         NE 195th St           N
Count Source:         TrafficSmithy           EB         WB         NB         SB         Total           %HV         0%         0%         0%         0%           PHF         0.88         Peak Hour Used:           From         1615         To         1715           Count Date:         4/6/2006         Count Source:         TC2           EB         WB         NB         SB         Total           %HV         0%         1%         0%           PHF         0.90         Peak Hour Used:           From         1630         To         1730	2004         NE 195th St           N
Count Source:         TrafficSmithy           EB         WB         NB         SB         Total           %HV         0%         0%         0%         0%           PHF         0.88         Peak Hour Used:           From         1615         To         1715           Count Date:         4/6/2006         Count Source:         TC2           EB         WB         NB         SB         Total           %HV         0%         1%         0%           PHF         0.90         Peak Hour Used:         From           From         1630         To         1730           Count Date:         4/6/2006         Count Date:         4/6/2006	2004         NE 195th St           N
Count Source:         TrafficSmithy           EB         WB         NB         SB         Total           %HV         0%         0%         0%         0%           PHF         0.88         Peak Hour Used:         .88           From         1615         To         1715           Count Date:         4/6/2006         .70         1715           Count Source:         TC2         EB         WB         NB         SB         Total           %HV         0%         1%         0%         PHF         0.90         Peak Hour Used:           From         1630         To         1730	2004         NE 195th St           N
Count Source:         TrafficSmithy           EB         WB         NB         SB         Total           %HV         0%         0%         0%         0%           PHF         0.88         Peak Hour Used:           From         1615         To         1715           Count Date:         4/6/2006         Count Source:         TC2           EB         WB         NB         SB         Total           %HV         0%         1%         0%           PHF         0.90         Peak Hour Used:         From           From         1630         To         1730           Count Date:         4/6/2006         Count Date:         4/6/2006	2004     NE 195th St       N     101       342     1,778       58     58       101     156th Ave NE/       2004     240th St       N     0       46     112       112     0       2006     240th St
Count Source:         TrafficSmithy           EB         WB         NB         SB         Total           %HV         0%         0%         0%         0%           PHF         0.88         Peak Hour Used:         0.88           From         1615         To         1715           Count Date:         4/6/2006         Count Source:         TC2           EB         WB         NB         SB         Total           %HV         0%         1%         0%         PHF           0.90         Peak Hour Used:         From         1630         To         1730           Count Date:         4/6/2006         Count Source:         TC2         EB         WB         NB         SB         Total           %HV         0%         1%         1%         2%         PHF         0.96	2004         NE 195th St           N         342         1,778         505           58         1,778         505           58         873           101         156th Ave NE/           2004         240th St           N
Count Source:         TrafficSmithy           EB         WB         NB         SB         Total           %HV         0%         0%         0%         0%           PHF         0.88         Peak Hour Used:         .88           From         1615         To         1715           Count Date:         4/6/2006         Count Source:         TC2           EB         WB         NB         SB         Total           %HV         0%         1%         0%         PHF         0.90           PHF         0.90         Peak Hour Used:         From         1630         To         1730           Count Date:         4/6/2006         Count Source:         TC2         EB         WB         NB         SB         Total           %HV         0%         1%         NB         SB         Total         \$%	2004         NE 195th St           N

WOODINVILLE, WASHINGTON 156TH AVE NE E 203RD PL

#### LOC# 08A TPG04335M

File Name: TPG33608ASite Code: 00000008Start Date: 12/01/2004Page No: 1

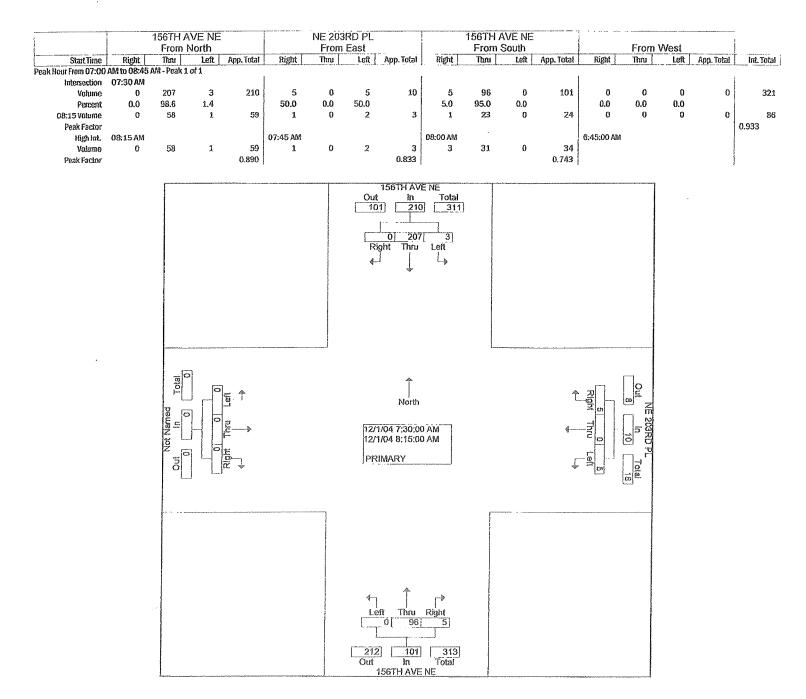
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										Groups	s Printe	ed- PR	IMARY	1									
	1	156	THAV	ENE			NE	203R	D PL			156	THAV	ENE					Anala, y - angagana aki je				
	1	F	rom No	orth			F	rom E	ast			Fr	om So	uth			Fr	om W	est				
Start Time	Right	Thru	Leit	Truck	App. Totəl	Right	Thru	Left	Truck	App. Total	Right	Thru	Left	Truck	App. Total	Right	Thru	Left	Truck	App. Total	Exclu. Total	inciu. Total	but. Total
Factor	1.0	1.0	1.0	1.0		1.0	1.0	1.0	1.0		1.0	1.0	1.0	1.0		1.0	1.0	1.0	1.0				
07:00 AM	0	29	1	0	30	1	0	2	0	3	1	20	0	0	21	D	0	0	0	0	0	54	54
07:15 AM	0	32	0	0	32	1	0	2	0	3	2	23	0	1	25	0	0	0	0	0	1	60	61
07:30 AM	0	49	0	2	49	0	0	1	0	1	0	20	0	1	20	0	0	0	0	0	3	70	73
07:45 AM	0	54	0	D	54	1	0	2	0	3	1	22	0	0	23	0	0	0	0	Ð	0	80	80
Total	0	164	1	2	165	3	0	7	0	10	4	85	0	2	89	0	0	0	0	0	4	264	268
08:00 AM	0	46	2	1	48	3	0	0	0	3	3	31	0	2	34	0	0	0	0	0	3	85	88
08:15 AM	0	58	1	4	59	1	0	2	0	3	1	23	0	0	24	0	0	0	0	0	4	86	90
08:30 AM	0	24	2	0	26	7	0	5	1	12	2	15	0	0	17	0	0	0	0	0	1	55	56
08:45 AM	0	32	1	0	33	0	0	0	0	0	0	- 13	0	1	13	0	0	0	0	0	1	46	47
Total	0	160	6	5	166	11	0	7	1	18	6	82	0	3	88	0	0	0	0	0	9	272	281
Grand Total	0	324	7	7	331	14	0	14	1	28	10	167	0	5	177	0	0	0	0	0	13	536	549
Apprch %	0.0	97.9	2.1		1	50.0	0.0	50.0			5.6	94.4	0.0			0.0	0.0	0.0					
Total %	0.0	60.4	1.3		61.8	2.6	0.0	2.6		5.2	1.9	31.2	0.0		33.0	0.0	0.0	0.0		0.0	2.4	97.6	
															•					'			

A		156TH From	AVE NE North			NE 203 From	BRD PL East			156TH . From	AVE NE South			From	Nest		
Start Time	Right	Thru	Leît	App. Total	Right	Thru	Left	App. Total	Right	The	Left	App. Total	Right	Thru	Left	App. Total	Int. Total
Peak Hour From 07:00	AM to 08:45	AM - Peak	1 of 1		······································				·		·						
Intersection	07:30 AM				l				1							}	
Volume	0	207	3	210	5	0	5	10	5	96	0	101	0	0	0	0	321
Percent	0.0	98.6	1.4		50.0	0.0	50.0		5.0	95.0	0.0		0.0	0.0	0.0		wex
08:15 Volume	0	58	3	59	1	0	2	3	2	23	0	24	0	0	0	0	86
Peak Factor														·		Ů	0.933
High Int.	08:15 AM				07:45 AM				08:00 AM				6:45:00 AM				0.000
Volume	0	58	1	59	1	0	2	3	3	31	0	34					
Peak Factor				0.890				0.833				0.743				ļ	
Peak Hour From 07:00	AM to 08:45	AM - Peak 1	l of 1														
By Approach	07:30 AW				07:45 AM				07:15 AM			1	07:00 AM			1	
Volume	0	207	3	210	12	0	9	21	6	96	0	102	0	0	0	0	
Percent	0.0	98.6	1.4		57.1	0.0	12.9		5.9	94.1	0.0		-	-	-	Ĩ	
High Int.	08:15 AM				08:30 AM				08:00 AM				•				
Volume	0	58	1	59	7	0	5	12	3	31	0	34	~	-			
Peak Factor				0.890				0.438				0,750				-	

#### WOODINVILLE, WASHINGTON 156TH AVE NE NE 203RD PL

)C# 08ATPG04335M

File Name: TPG33608ASite Code: 00000008Start Date: 12/01/2004Page No: 2



#### p.02

#### TRAFFICOUNT, INC. PMB 195 4820 YELM HWY SE STE B LACEY, WA 98503 360-491-8116

File Name : TPG34301P Site Code : 00000001 Start Date : 12/08/2004 Page No : 1

#### V DINVILLE, WASHINGTON 156TH AVE NE NE 203RD PL LOC# 01P TPG04341M

UH ULP	Iruu	4341	.198																				
										Groups	Printe	d- PRI	MARY	·									
	ľ	156	HAV	ENE			NE	203RI	) PL			1567	'H AV	ENE						Í			
			om No				F	rom Ea	ast			Fre	om So	uth			Fn	om We	est	ļ			
Start Time	Right	Thru	Leit	Truck	App. Total	Right	Thru	Left	Truck	App. Total	Right	Thru	Left	Truck	App. Total	Right	Thru	Left	Truck	App. Total	Exclu. Total	inclu. Total	Int. Total
Factor	1.0	1.0	1.0	1.0		1.0	1.0	1.0	1.0		1.0	1.0	1.0	1.0		1.0	1.0	1.0	1.0				
04:00 PM	0	34	1	0	35	0	Ö	4	0	4	2	52	0	0	54	0	0	0	0	0	0	93	93
04:15 PM	Ō	25	0	0	25	1	0	0	0	1	4	34	D	0	38	0	0	0	0	0	0	64	64
04:30 PM	0	40	1	1	41	1	0	1	0	2	4	51	0	1	55	0	0	0	0	0	2	98	100
04:45 PM	0	39	2	2	41	3	0	1	0	4	4	53	0	0	57	0	0	0	0	0	2	102	104
Total	0	138	4	3	142	5	0	6	0	11	14	190	0	1	204	0	0	0	0	0	4	357	361
05:00 PM	0	40	2	0	42	0	0	1	0	2	3	64	0	1	67	0	0	0	0	0	1	110	111
05:15 PM	õ	37	ē	1	37	0	0	0	0	0	3	63	0	1	66	0	0	0	0	0	2	103	105
05:30 PM	õ	27	3	ē	30	1	0	2	0	3	1	58	0	0	59	0	0	0	0	0	0	92	92
05:45 PM	Ő	32	0	0	32	2	0	2	0	Ą	2	31	0	0	33	0	0	0	0	0	0	69	69
Total	0	136	5	3	141	3	0	5	0	8	9	216	0	2	225	0	0	0	0	0	3	374	377
Franci Total	0	274	9	4	283	8	0	11	0	19	23	406	0	3	429	0	0	0	0	0	7	731	738
Appreh %	0.0	96.8	3.2			42.1	0.0	57.9			5.4	94.6	0.0		1	0.0	0.0	0.0					
Total %	0.0	37.5	1.2		38.7	1.1	0.0	1.5		2.6	3.1	55.5	0.0		58.7	0.0	0.0	0.0		0.0	0.9	99.1	

		156TH A From				NE 203 From	East			156TH A From S	South			From		App. Total	Int. Total
Start Time	Right	Thru	Left	App. Total	Right	Thru	Left	App. Total	Right	Thru	Left	App. Total	Right	Thru	Lon	App. rotai	IIIC TOTAL
Peak Hour From 04:00		PM - Peak 1	l of 1		*							,				1	
Intersection	04:30 PM							_			•	aar	0	0	0	0	413
Volume	0	156	5	161	4	0	Э	7	14	231	0	245	0	-	•	v	423
Percent	0.0	96.9	3.1		57.1	0.0	42.9		5.7	94.3	0.0		0.0	0.0	0.0		110
7 35:00 Volume	0	40	2	42	0	0	1	1	3	64	0	67	0	0	0	0	
Peak Factor																	0.939
High Int.	05:00 PM				04:45 PM				05:00 PM			. –	3:45:00 PM				
Volume	0	40	2	42	3	0	1	4	3	64	0	67					
Peak Factor				0.958				0.438				0.914				I	
Peak Hour From 04:00	PM to 05:45	PM - Peak 1	l of 1														
By Approach	04:30 PM				04:00 PM				04:45 PM				04:00 PM	_			
Volume	0	156	5	161	5	0	6	11	11	238	0	249	0	0	0	0	
Percent	0.0	96.9	3.1		45.5	0.0	54.5		4,4	95.6	0.0		~	•			
High Int.	05:00 PM				04:00 PM				05:00 PM				~				
Volume	0	40	2	42	0	0	4	ß	3	64	0	67		•	~		
Peak Factor				0.958				0.688				0.929				~	

VIC ODINVILLE, WASHINGTON I AVE NE NE 203RD PL LOC# 01P TPG04341M File Name: TPG34301PSite Code: 00000001Start Date: 12/08/2004Page No: 2

		156TH	AVE NE			NE 2031	RD PL			156TH	AVE NE			From	Mact		
		From			D'-th	From	East Leît	App. Total	Right	Thru	South Left	App. Total	Right	Thru	Left	App. Total	int Total
Start Time Peak Hour From 04:00	Right	Thru FM Rosk	Left	App. Total	Right	Thru	Leat	upp rarai	i		L						
Peak nour From 04:00 Intersection		rm-rean	1011									0.017		0	0	0	413
Volume	0	156	5	161	4	0	3	7	14	231	0 0.0	245	0 0.0	0 0.0	0.0	υ	-910
Percent	0.0	96.9	3.1		57.1	0.0	42.9	1	5.7 3	94.3 64	0.0	67	0.0	0	D	0	110
05:00 Volume	0	40	2	42	0	0	1	7	5	~	•						0.939
Peak Factor High Int.	05:00 PM				04:45 PM				05:00 PM				3:45:00 PM				
Volume	05.00 Pm 0	40	2	42	3	0	1	4	3	64	0	67					
Peak Factor				0.958				0.438				0.914	1				
		<b></b>					1	56TH AV	E NE Total								
							Out 235	In 16		1 1							
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		RN -		<u></u> <u></u>			12/8	04 4:30: 04 5:15:	N PM			¥	-hru	17 80			
		Not		0-2									e				
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		C	2	_u. 🖤									·	Total 26			
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WOODINVILLE, WASHINGTON 156TH AVE NE

#### File Name : TPG33601A Site Code : 00000001 Start Date : 12/01/2004 Page No : 1

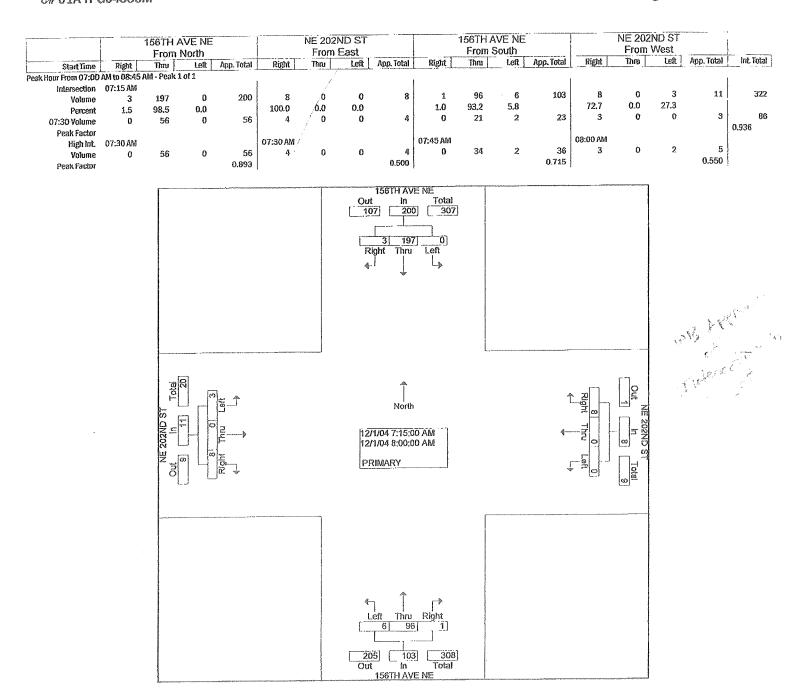
LOC# 01A TPG04335M

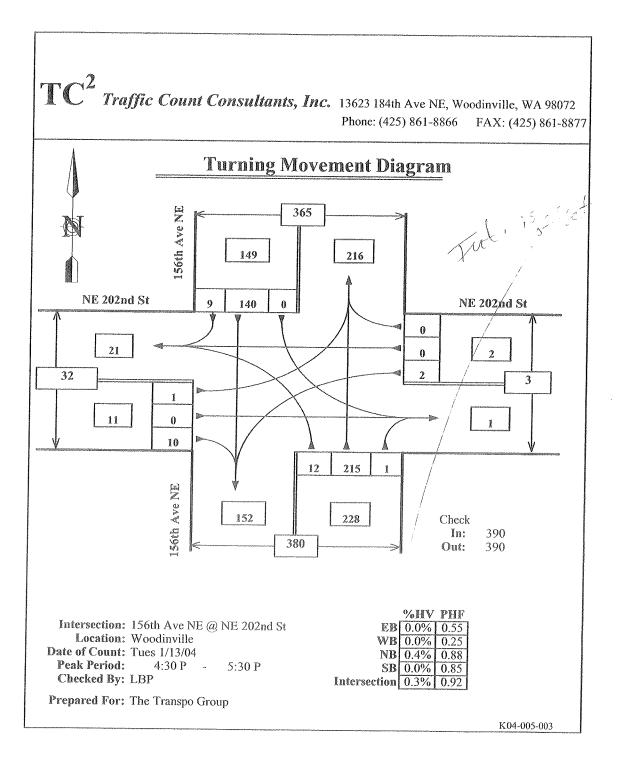
E202ND ST

										Groups	Printe												
			FH AV om No	ENE				202NI rom Ei					'H AVI om So					202NI om W					
Start Time	Right	Thru	Left	Truck	App. Total	Right	Thru	Left	Truck	App. Total	Right	Thru	Leît.	Truck	App. Total	Right	Three	Left	Truck	App. Total	Exclu. Totat	Inclu. Total	in Tot
Factor	1.0	1.0	1.0	1.0		1.0	1.0	1.0	1.0		1.0	1.0	1.0	1.0		1.0	1.0	1.0	1.0				
07:00 AM	. 0	34	0	0	34	1	0	0	0	1	0	20	0	1	20	5	0	0	0	5	1	60	6
07:15 AM	0	45	0	2	45	0	0	0	0	0	0	22	2	1	24	1	0	0	0	1	3	70	73
07:30 AM	0	56	0	0	56	Ą	0	0	0	4	0	21	2	0	23	3	0	0	0	3	0	86	8(
07:45 AM	0	44	0	1	44	1	0	0	0	1	0	34	2	2	36	1	0	1	0	2	3	83	80
Total	0	179	Ð	3	179	6	0	0	0	6	0	97	6	4	103	10	0	1	0	11	7	299	30
08:00 AM	3	52	0	5	55	3	0	0	0	3	1	19	0	0	20	3	0	2	0	5	5	83	81
08:15 AM	0	30	0	0	30	0	0	1	0	1	0	24	2	0	26	1	0	0	0	1	0	58	5
08:30 AM	0	36	1	1	37	0	0	0	0	0	0	13	1	2	14	1	0	0	0	1	3	52	53
08:45 AM	Ð	35	0	0	35	0	0	0	0	0	0	16	0	1	16	1	0	1	0	2	1	53	54
Total	3	153	1	6	157	3	0	1	0	4	1	72	3	3	76	6	0	3	0	9	9	246	255
Trand Total	3	332	1	9	336	9	0	1	0	10	1	169	9	7	179	16	o	Ą	0	20	16	545	56
Appreh %	0.9	98.8	0.3		i	90.0	0.0	10.0			0.6	94.4	5.0			80.0	0.0	20.0					
Total %	0.6	60.9	0.2		61.7	1.7	0.0	0.2		1.8	0.2	31.0	1.7		32.8	29	0.0	0.7		3.7	29	97.1	

		156TH / From					2ND ST East			156TH / From				NE 202 From			
Start Time	Right	Thru	Left	App. Total	Right	Thru	Left	App. Total	Right	Thru	Left	App. Total	Right	ີການ	Left	App. Total	Int. Total
Peak Hour From 07:00	AM to 08:45	AM - Peak 1	l of 1														
Intersection	07:15 AM																
Volume	3	197	0	200	8	0	0	8	1	96	6	103	8	0	3	11	322
Percent	1.5	98.5	0.0		100.0	0.0	0.0		1.0	93.2	5.8		72.7	0.0	27.3		
07:30 Volume	0	56	0	56	4	0	0	4	0	21	2	23	3	0	0	з	86
Peak Factor																	0.936
High Int.	07:30 AM				07:30 AM				07:45 AM				08:00 AM				
Volume	0	56	0	56	4	0	0	4	0	34	2	36	3	0	2	5	
Peak Factor				0.893				0.500	}			0.715				0.550	
Peak Hour From 07:00	AM to 08:45	AM - Peak 1	. ហ៍ រំ														
By Approach	07:15 AM				07:30 AM				07:30 AM				07:00 AM				
Volume	3	197	0	200	8	0	1	9	1	98	6	105	10	0	i	11	
Percent	1.5	98.5	0.0		88.9	0.0	11.1		1.0	93,3	5.7		90.9	0.0	9.1		
High Int.	07:30 AM				07:30 AM				07:45 AM				07:00 AM				
Volume	0	56	0	56	4	0	0	4	0	34	2	36	5	0	0	5	
Peak Factor				0.893	Ì			0.563				0.729				0.550	

WOODINVILLE, WASHINGTON 156TH AVE NE NE 202ND ST C# 01A TPG04335M File Name: TPG33601ASite Code: 00000001Start Date: 12/01/2004Page No: 2





 $TC^2$ Traffic Count Consultants, Inc. 13623 184th Ave NE, Woodinville, WA 98072 Phone: (425) 861-8866 FAX: (425) 861-8877 Vehicle Volume Summary Intersection: 156th Ave NE @ NE 202nd St Date of Count: Tues 1/13/04 Location: Woodinville Checked By: LBP From South on (NB) Time From North on (SB) From East on (WB) From West on (EB) Interval Interval 156th Ave NE 156th Ave NE NE 202nd St NE 202nd St Total Ending at S R I Ť Ľ S R T \ L S R S R L 4:15 P 4:30 P Q 4:45 P O/ Õ 5:00 P 5:15 P 5:30 P 5:45 P 6:00 P ý 6:15 P 6:30 P 6:45 P 7:00 P Total Survey 4:30 P 5:30 P Peak Hour Summary to Total ] Approach %HV 0% 0% 0% 0% 0% PHF 0.85 0.88 0.25 0.55 0.92 Legend: T= Number of heavy vehicles (greater than 4 wheels) L= Left -Turn S= Straight R= Right-Turn HV= Heavy Vehicles PHF= Peak hour Factor (Peak hour volume / (4\*Highest 15 minutes)) **Prepared For:** The Transpo Group K04-005-003

### TRAFFICOUNT, INC. PMB 195 4820 YELM HWY SE STE B LACEY, WA 98503

WOODINVILLE, WASHINGTON 156TH AVE NE 5201ST ST

LOC# 02A TPG04335M

Appreh %

Total %

3.8 96.2

2.3 57.3 0.0

0.0

0.0

0.0

59.5

0.0

0.0

0.0

0.0

#### 360-491-8116

File Name : TPG33602A Site Code : 0000002 Start Date : 12/01/2004 Page No : 1

#### Groups Printed- PRIMARY 156TH AVE NE 156TH AVE NE NE 201ST ST From North From East From South From West App. App. App. Арр. Exclu. Inclu. tnt. Right Left Truck Right Thru Left Truck Right Thru Left | Truck Left Start Time Thru Right Thru Truck Total Total Total Total Total Total Total Factor 1.0 1.0 1.0 1.0 1.0 1.0 1.0 1.0 1.0 1.0 1.0 1.0 1.0 1.0 1.0 1.0 07:00 AM 07:15 AM 07:30 AM 07:45 AM n Ð a А Total 08:00 AM 08:15 AM 08:30 AM 08:45 AM Ð ø Total Grand Total

0.0 85.9

0.0 27.7

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5.7

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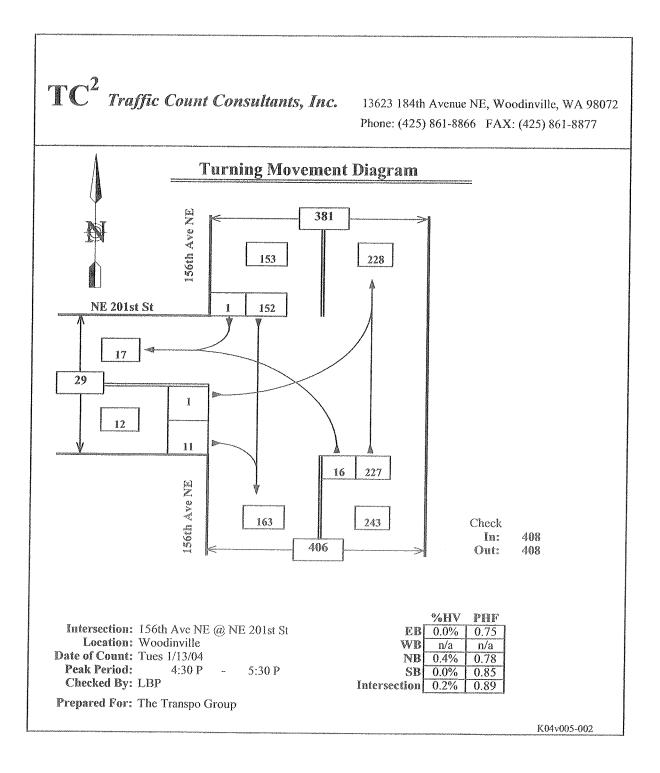
96.7

		156TH							]	156TH A				NE 201			
		From	North			From	East			From S	South		ļ	From	West		
Start Time	Right	Thru	Left	App. Total	Right	Thni	Left	App. Total	Right	Thu	Left	App. Total	Right	Thru	Left	App. Total	Int. Total
ak Hour From 07:00	AM to 08:45	AM - Peak	1 of 1														
Intersection	07:15 AM				1											į	
Volume	1	201	0	202	0	0	0	0	0	93	11	104	10	0	2	18	324
Percent	0.5	99.5	0.0		0.0	0.0	0.0		0.0	89.4	10.6		88.9	0.0	11.1		
07:30 Volume	0	60	0	60	0	0	0	0	0	20	3	23	3	0	2	5	88
Peak Factor																	0.920
High Int.	07:30 AM				6:45:00 AM				07:45 AM				07:15 AM				
Volume	0	60	0	60	0	0	0	0	0	28	4	32	7	0	0	7	
Peak Factor				0.842				I				0.813				0.643	
ak Hour From 07:00	AM to 08:45 /	W - Peak i	lofi														
By Approach	07:15 AM				07:00 AM			]	07:30 AM				08:00 AM				
Volume	1	201	0	202	0	0	0	0	0	97	13	110	19	0	11	30	
Percent	0.5	99.5	0.0		-		•		0.0	88.2	11.8		63,3	0.0	36.7		
High Int.	07:30 AM				-				07:45 AM				08:15 AM				
Volume	0	60	0	60			**	~	0	28	4	32	6	0	5	11	
Peak Factor				0.842				-				0.859				0.682	

WOODINVILLE, WASHINGTON 156TH AVE NE NE 201ST ST /C# 02A TPG04335M

# File Name: TPG33602ASite Code: 00000002Start Date: 12/01/2004Page No: 2

ĺ	T	156TH	AVE NE							156TH	AVE NE				IST ST		
			North			From		4			South	Roy Tubol	Dicks	From Thru	West Left	App. Total	Int Total
Start Time Peak Hour From 07:00	Right	Thru AM - Peak	Left 1 of 1	App. Total	Right	Thru	Left	App. Total	Right	Thru	Leat	App. Total	Right	1 0 211	Len	App. 100/	Int Total
Intersection Volume Percent	07:15 AM 1 0.5	201 99.5	0 0.0	202	0.0	0 0.0	0.0	0	0	93 89,4	11 10.6	104	16 88.9	0 0.0	· 2 11.1	18	324
07:30 Volume	0	60	0	60	0	0	0	0	0	20	3	23	3	0	2	5	88 0.920
Peak Factor High Int. Volume Peak Factor	07:30 AM 0	60	0	60 0.842	6:45:00 AM 0	0	0	0	07:45 AM 0	28	4	32 0.813	07:15 AM 7	0	0	7 0.643	0.320
					•				•							·	
							Out 9	5 20; 1 20; 9ht Thru	Total 2 297								
		E 201S					12/	North 1/04 7:15:0 1/04 8:00:0 IMARY	0 AM			₹ ←	Right Thru Left	Out Not Named			
							217 Out	aft Thru 11 93	] [ <u>321</u> ] Total								



TC	2	Traj	ffic Col	unt Co	msult	ants, 1	nc.	80 <sup>-56</sup> -90 <sup>-4</sup> -40 <sup>-40</sup> -40 <sup>-4</sup>		13623 1					e, WA 986 : (425) 861		
					Veh	icle V	olume	e Sui	nma	ry							
Intersectio Location:	n:	156th Wood		@ NE 2(	)1st St								of Cor ked B		Tues 1 LBP	/13/04	1
Time		From N	lorth on (	(SB)	T F	rom Sou	th on (N	B)	l F	rom Ea	st on M	(R)	l c	'rom W	est on (I	- 637	Interval
Interval		156	th Ave N	E			Ave NE	-•			n/a	,			201st St	-10 J	Total
Ending at	T	L	S	R	T	L	S	R	T	L	S	R	T	L	S	R	
4:15 P	0	0	34	0	0	0	46	0	0	0	0	0	0	0	0	4	84
4:30 P 4:45 P	0	0	42	0	0	2	50	0	0	0	0	0	0	0	0	4	98
4.43 P 5:00 P	0		45	0	1	4	46	0	0	0	0	0	0	0	0	3	98
5:15 P	0	0	35	0	0	4	51	0	0	0	0	0	0	0	0	4	94
5:30 P	0	0	38	0	0	4	56	0	0	0	0	0	0	1	0	3	102
5:45 P	0	0	34 37	1	0	4	74	0	0	0	0	0	0	0	0	1	114
6:00 P	0	0	37	1	0	4	40	0	0	0	0	0	0	0	0	3	87
6:15 P	0	0	0	1	0	4	58	0	0	0	0	0	0	0	0	2	98
6:30 P	õ	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
6:45 P	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
7:00 P	õ	Õ	0	0		0	0	0	0	0	0	0	0	0	0	0	0
	******				۱ <u> </u>					0			0	0	0	0	0
Total													2921123222222222				
Survey	0	0	298	3	1	28	421	0	0	0	0	0	0	1	0	24	775
			an a		Roman and a state of the state	1999/1999/1999/1999/1999/1999/1999		and a second	here and a second second		a service and a service of the servi		********	NUMBER OF TAXABLE			
				4:30 P	to	5:30 P	No. of Contractory of Contractory	Hour S	dumma	згу							
Total	0	0	152	1		16	227	0	0	0	0	0	0	1	0	11	408
Approach %HV	in and a substant	153 0%		17.03.03.03.03.00.00.00.00.00.00.00.00.00.	aranan manazara	243	49770-974990-0000000	*****	ninan (sense sesse	0	****		10743154202712440	12			408
PHF	99999888992daa	0.85			an-sicces/staticalises	0%				n/a	141676 <b>12</b> 4666688876566698	14643312220455		0%			0%
	0100096809989000	0.00			nanondordara and an	0.78	277703504V030208420			n/a			55760000000	0.75			0.89
สสาราสาราสาราสาราสาราสาราสาราสาราสาราสา	.egen	аналанан аланан алан Электериятика аланан аланан Электериятика аланан	T= Numl L= Left - S= Straig R= Right	ght	avy veł	0.78 nicles (gr	eater th	an 4 w	heels)	n/a				0.75			0.89
			HV= Hea	vy Vehic ak hour		(Peak hc	ur volur	ne / (4	*High	est 15 r	ninutes)	)					
Prepa	sred F	or:	The Tran	spo Groi	лр												(04v005-00

### TRAFFICOUNT, INC. PMB 195 4820 YELM HWY SE STE B LACEY, WA 98503

WOODINVILLE, WASHINGTON 156TH AVE NE

#### 360-491-8116

File Name : TPG33603A Site Code : 0000003 Start Date : 12/01/2004 Page No : 1

#### LOC# 03A TPG04335M

										Groups	Fina						A 167	40077	107	······ ;			
		156	TH AV	E NE			NE	198Tł	IST	1			HAV					198T)		Í			
	•	Fr	om No	orth			FI	om Ea	ast			Fro	m So	uth			Fr	om W	est				
Start Time	Right	Thau	Left	Truck	App. Total	Right	Thru	Left	Truck	App. Totai	Right	โปษน	Leît	Truck	App. Total	Right	Thru	Left	Inuck	App. Total	Exclu. Totol	inclu. Total	
Factor	1.0	1.0	1.0	1.0		1.0	1.0	1.0	1.0		1.0	1.0	1.0	1.0		1.0	1.0	1.0	1.0				
07:00 AM	0	34	0	0	34	0	0	7	0	7	0	20	0	1	20	2	0	2	0	4	1	65	
07:15 AM	2	48	0	0	50	0	0	4	0	4	1	22,	1	5	24	3	0	1	0	4	5	82	
)7:30 AM	0	66	5	2	71	1	1	3	0	5	1	20	2	0	23	7	1	1	i	9	3	108	
)7:45 AM	0	57	3	1	60	3	0	6	0	9	1	34	0	3	35	2	0	1	0	3	4	107	
Total	2	205	8	3	215	4	1	20	0	25	3	96	3	9	102	14	1	5	i	20	13	362	
00:00 AM	0	50	2	3	52	4	2	10	0	16	5	25	0	1	30	3	1	0	0	4	4	102	
)8:15 AM	0	54	6	1	60	6	0	10	0	16	5	22	i	2	28	7	0	0	1	7	4	111	
18:30 AM	0	49	3	0	52	3	0	9	0	12	4	23	0	2	27	4	0	1	0	5	2	96	
)8:45 AM	1	48	3	1	52	5	1	10	0	16	5	21	1	1	27	3	1	1	0	5	2	100	
Total	1	201	14	5	216	18	3	39	0	60	19	91	2	6	112	17	2	2	1	21	12	409	
and Total	з	406	22	8	431	22	4	59	0	85	22	187	5	15	214	31	З	7	2	41	25	771	
Appren %	0.7	94.2	5.1			25.9	4.7	69.4			10.3	87.4	2.3			75.6	7.3	17.1					
Total %	0.4	52.7	2.9		55.9	2.9	0.5	7.7		11.0	2.9	24.3	0.6		27.8	4.0	0.4	0.9		5.3	3.1	96.9	

		156TH / From				NE 198 From			· · · ·	156TH A From S				NE 198 From			
Start Time	Right	Thru	Left	App. Total	Right	Thru	Left	App. Total	Right	าทณ	Left	App. Total	Right	Thru	Left	App. Total	Int. Total
Peak Hour From 07:00	AM to 08:45	AM - Peak 1	of 1														
Intersection	07:30 AM				1												
Volume	0	227	16	243	14	3	29	46	12	101	Э	116	19	2	2	23	428
Percent	0.0	93.4	6.6		30.4	6.5	63.0		10.3	87.1	2.6		82.6	8.7	8.7		
08:15 Volume	0	54	6	60	6	0	10	16	5	22	1	28	7	0	0	7	111
Peak Factor					]												0.964
High Int.	07:30 AM				08:00 AM				07:45 AM				07:30 AM				
Volume	0	66	5	71	4	2	10	16	1	34	0	35	7	1	1	9	
Peak Factor				0.856				0.719				0.829				0.639	
Peak Hour From 07:00	AM to 08:45	AM - Peak 1	. of 1														
By Approach	07:30 AM				08:00 AM				07:45 AM				07:30 AM				
Volume	0	227	16	243	18	3	39	60	15	104	1	120	19	2	2	23	
Percent	0.0	93.4	6.6		30.0	5.0	65.0		12.5	86.7	0.8		82.6	8.7	8,7		
High Int.	07:30 AM				08:00 AM				07:45 AM				07:30 AM				
Volume	0	66	5	71	4	2	10	16	1	34	0	35	7	1	1	9	
Peak Factor				0.856				0.938				0.857				0.639	

. . .

5 198TH ST

WOODINVILLE, WASHINGTON 195TH ST WOODINVILLE-SNOHOMISH RD LOC# 01 TPG04064M

 File Name
 : TPG06401P

 Site Code
 : 00000001

 Start Date
 : 03/04/200/

 Page No
 : 2

WOODINVILLE-SNOHOMISH WOODINVILLE-SNOHOMISH NE 195TH ST NE 195TH ST RD From North RD From South From East From West Start Time Right Thru Left App. Total Int. Total Peak Hour From 04:00 PM to 05:45 PM - Peak 1 of 1 Intersection 04:15 PM Volume 263 279 77 619 77 711 46 834 41 412 311 764 207 731 70 1008 3225 Percent 42.5 45.1 12.4 9.2 85.3 5.5 5.4 53.9 40.7 20.5 72.5 6.9 04:30 Volume 101 59 19 179 17 187 19 223 8 97 192 87 53 181 34 248 842 Peak Factor 0.958 High Int. 04:30 PM 05:00 PM 05:00 PM 04:45 PM Volume 101 59 19 179 22 192 10 224 11 124 82 217 52 200 15 267 Peak Factor 0.865 0.931 0.880 0.944 NE 195TH ST Out Total 1178 In 559 619 Í 263 2791 \_\_\_\_\_ Left Right ۰. را Thru ŝ., L . *2*, North 3/4/04 4:15:00 PM 3/4/04 5:00:00 PM PRIMARY Z ┌⋗ Thru Right Left 3111 412 41 532 764 1296 Out In Total NE 195TH ST

WOODINVILLE, WASHINGTON

#### **`TH AVE NE** INL 198TH ST LOC# 01P TPG04149M

## File Name : TPG15301P 4

	00000001
Site Code :	UUUUUUUU T
Start Date :	06/01/2004
Page No :	1
NE 198TH ST	

		/ 8 -2. e Q	/102																	agei	ν <b>υ</b> .	-L.	
										Groups	Printe	d- PRI	MARY	/									
		156	ΓΗ Αν	'E NE			NE	198TI	1 ST			1567	"H AV	E NE			NE	198TF	1 ST				
		Fr	om No	orth			Fi	rom E	ast			Fro	om So	uth			Fr	om W	est	ĺ			
Start Time	Right	Thru	Left	Truck	App. Total	Right	Thru	Left	Truck	App. Total	Right	Thru	Left	Truck	App. Total	Right	Thru	Left	Truck	App. Total	Exclu. Total	inciu. Total	in Tota
Factor	1.0	1.0	1.0	1.0		1.0	1.0	1.0	1.0		1.0	1.0	1.0	1.0		1.0	1.0	1.0	1.0				
04:00 PM	1	39	2	1	42	0	0	7	0	7	3	67	2	1	72	1	0	0	0	1	2	122	124
04:15 PM	1	38	1	1	40	3	0	4	0	7	7	59	1	0	67	1	0	0	0	1	1	115	11(
04:30 PM	0	50	0	0	50	0	0	2	0	2	6	70	3	1	79	3	0	0	0	3	1	134	135
04:45 PM	2	52	0	0	54	1	0	4	0	5	7	71	3	1	81	0	0	1	0	1	1	141	14:
Total	4	179	3	2	186	4	0	17	0	21	23	267	9	3	299	5	0	1	0	6	5	512	51
05:00 PM	0	47	1	1	48	0	0	6	0	6	2	83	4	0	89	1	0	0	0	1	1	144	14
05:15 PM	0	64	0	0	64	1	0	1	0	2	6	83	7	0	96	3	1	0	0	4	0	166	16
05:30 PM	0	40	0	0	40	2	1	4	0	7	6	57	2	0	65	6	0	0	0	6	0	118	118
05:45 PM	1	46	1	0	48	1	0	10	0	11	4	63	3	0	70	2	0	0	0	2	0	131	131
Total	1	197	2	1	200	4	1	21	0	26	18	286	16	0	320	12	1	0	0	13	1	559	560
irand Total	5	376	5	3	386	8	1	38	0	47	41	553	25	3	619	17	1	1	0	19	6	1071	1077
Apprch %	1.3	97.4	1.3			17.0	2.1	80.9			6.6	89.3	4.0			89.5	5.3	5.3					
Total %	0.5	35.1	0.5		36.0	0.7	0.1	3.5		4.4	3.8	51.6	2.3		57.8	1.6	0.1	0.1		1.8	0.6	99.4	

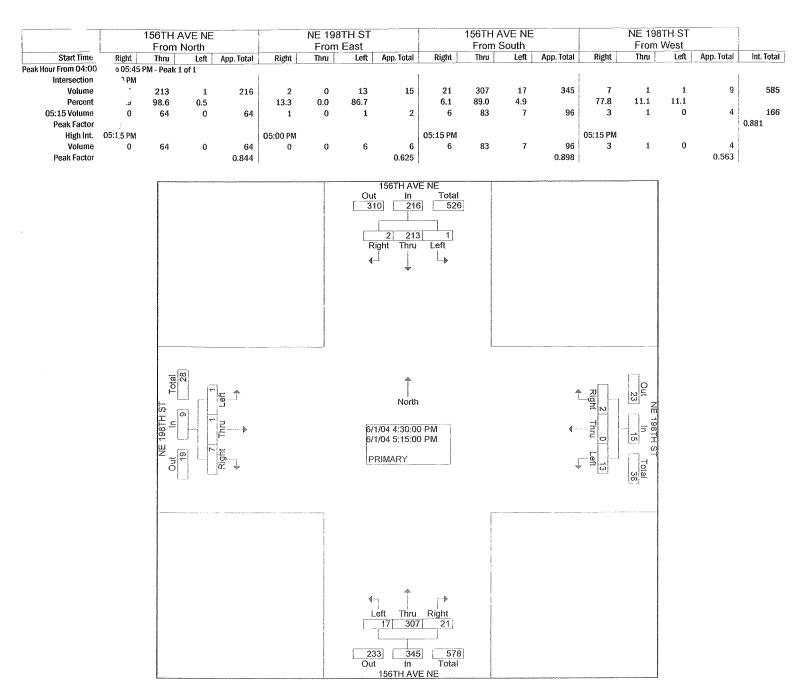
		156TH A From				NE 198 From				156TH A From S				NE 198 From			
Start Time	Right	Thru	Left	App. Total	Right	Thru	Left	App. Total	Right	Thru	Left	App. Total	Right	Thru	Left	App. Total	Int. Total
Peak Hour From 04:00			· · · · · · · · · · · · · · · · · · ·								LOIT	App. rotur	inent ;	mu	LOIL	App. Iotai	inc. rotar
Intersection	04:30 PM												-				
Volume	2	213	1	216	2	0	13	15	21	307	17	345	7	1	1	9	585
Percent	0.9	98.6	0.5		13.3	0.0	86.7		6.1	89.0	4.9	0.0	77.8	11.1	11.1	0	000
05:15 Volume	0	64	0	64	1	0	1	2	6	83	7	96	3	1	0	А	166
Peak Factor											•	00	U	*	0	~	0.881
High Int.	05:15 PM				05:00 PM				05:15 PM				05:15 PM				0.001
Volume	0	64	0	64	0	0	6	6	6	83	7	96	3	1	0	A	
Peak Factor				0.844				0.625				0.898	Ū		Ŷ	0.563	
Peak Hour From 04:00	PM to 05:45	PM - Peak 1	of 1														
By Approach	04:30 PM				05:00 PM				04:30 PM				05:00 PM				
Volume	2	213	1	216	4	1	21	26	21	307	17	345	12	1	0	13	
Percent	0.9	98.6	0.5		15.4	3.8	80.8	1	6.1	89.0	4.9	;	92.3	7.7	0.0	20	
High Int.	05:15 PM				05:45 PM				05:15 PM			1	05:30 PM				
Volume	0	64	0	64	1	0	10	11	6	83	7	96	6	0	0	6	
Peak Factor				0.844				0.591				0.898	-			0.542	

#### WOODINVILLE, WASHINGTON .156TH AVE NE .98TH ST LOCi<sup>44</sup> 01P TPG04149M

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File Name : TPG15301P Site Code : 00000001 Start Date : 06/01/2004 Page No : 2



WOODINVILLE, WASHINGTON 156TH AVE NE 195TH ST

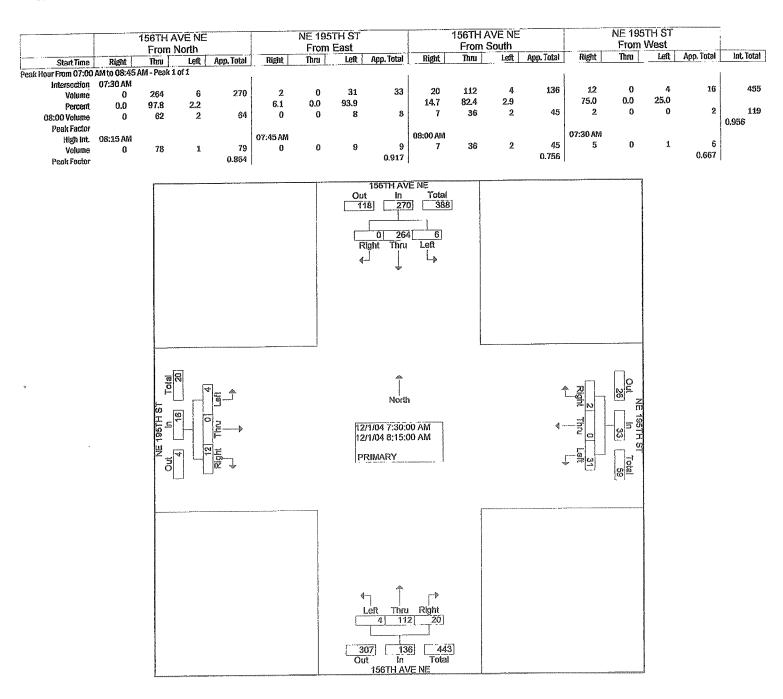
# File Name: TPG33604ASite Code: 00000004Start Date: 12/01/2004Page No: 1

#### LUC# 04A TPG04335M

										Groups	Printe	d-PRI	MAR	r									
		156	<b>THAV</b>	E NE			NE	195TI	IST			1567	'H AV	E NE			NE	195TH	IST				
		Fr	om No	onth			F	rom E	ast			Fre	om So	uth			Fr	om W	est	İ			
Start Time	Right	Thru	Left	Truck	App. Total	Right	Thru	Left	Truck	App. Total	Right	Thru	Left	Truck	App. Total	Right	Thru	Left	Truck	App. Total	Exclu. Total	Inclu. Total	int. Total
Factor	1.0	1.0	1.0	1.0		1.0	1.0	1.0	1.0		1.0	1.0	1.0	1.0		1.0	1.0	1.0	1.0		]		
07:00 AM	0	36	1	0	37	0	0	6	0	6	3	19	1	0	23	3	1	1	0	5	0	71	71
07:15 AM	0	49	2	0	51	1	0	6	0	7	6	22	2	0	30	3	0	2	0	5	0	93	93
07:30 AM	Ū	65	1	2	66	0	0	8	1	8	7	24	2	1	33	5	0	1	0	6	4	113	117
07:45 AM	0	59	2	0	61	0	0	9	0	9	4	28	0	2	32	4	0	0	0	4	2	106	108
Total	0	209	6	2	215	1	0	29	1	30	20	93	5	3	118	15	1	4	0	20	6	383	389
08:00 AM	0	62	2	1	64	0	0	8	1	8	7	36	2	4	45	2	0	0	0	2	6	119	125
08:15 AM	0	78	1	5	79	2	0	6	2	8	2	24	0	1	26	1	0	3	0	4	8	117	125
08:30 AM	0	53	1	0	54	0	0	4	0	4	0	23	0	0	23	5	0	3	0	8	0	89	89
08:45 AM	0	46	0	1	46	1	1	7	1	9	4	20	2	2	26	з	1	0	0	4	4	85	89
Total	0	239	4	7	243	3	1	25	4	29	13	103	4	7	120	11	1	6	0	18	18	410	428
Grand Total	0	448	10	9	458	4	1	54	5	59	33	196	9	10	238	26	2	10	0	38	24	793	817
Appreh %	0.0	97.8	22		1	6.8	1.7	91.5			13.9	82.4	3.8			68.4	5.3	26.3					
Total %	0.0	56.5	1.3		57.8	0.5	0.1	6.8		7.4	4.2	24.7	1.1		30.0	3.3	0.3	1.3		4.8	2.9	97.1	

		156TH A From				NE 195 From			[	156TH / From	AVE NE South			NE 195 From			
Start Time	Right	Thou	Left	App. Total	Right	Thru	Left	App. Total	Right	Thru	Left	App. Total	Right	Thru	Left	App. Total	int, Total
Peak Hour From 07:00	AM to 08:45	AM - Peak 1	of 1														
Intersection	07:30 AM																
Volume	0	264	6	270	2	0	31	33	20	112	4	136	12	0	4	16	455
Percent	0.0	97.8	2.2		6.1	0.0	93.9		14.7	82.4	2.9		75.0	0.0	25.0		
08:00 Volume	0	62	2	64	0	0	8	8	7	36	2	45	2	0	0	2	119
Peak Factor																	0.956
High Int.	08:15 AM				07:45 AM				08:00 AM				07:30 AM				
» Volume	Q	78	1	79	0	0	9	9	7	36	2	45	5	0	1	6	
Peak Factor				0.854				0.917	]			0.756				0.667	
Peak Hour From 07:00	AM to 08:45	AM - Peak 1	ofi														
By Approach	07:30 AM				07:30 AM				07:15 AM				07:00 AM				
Volume	0	264	6	270	2	0	31	33	24	110	6	140	15	1	4	20	
Percent	0,0	97.8	2.2		6.1	0.0	93.9		17.1	78.6	4.3		75.0	5.0	20.0		
High Int.	08:15 AM				07:45 AM				08:00 AM				07:30 AM				
Volume	0	78	1	79	0	0	9	9	7	36	2	45	5	0	2	6	
Peak Factor				0.854				0.917	]			0.778				0.833	

WOODINVILLE, WASHINGTON 156TH AVE NE NE 195TH ST C# 04A TPG04335M File Name: TPG33604ASite Code: 00000004Start Date: 12/01/2004Page No: 2



TRAFFIC SMITHY

	TERSECTIC	N TURN	MOVEMENT	r sump	iary f	EPORT					ile: Ecds	
	r= 3.1 %	) ]	P= 0.81		Peak Ho 6:15-17			LOCAT				
	↓ <b>200</b> 2	192	<b>307</b>	Tot	al Entry \ 562	/olume			TH STREET	Г АТ 156	TH AVEN	ue ne
< <u>−</u> 14 3	Ļ ↑	$\checkmark$	L, ↑_ 2	< 16 T	= 7.5 %		1	Date: Time:	03/04/0 16:00 -		Day:	THU
0 = 0.45	>		÷~~~ ()		= 0.67				Prepared for ANSPO GRO			
6 9	→ ← 12 ↓ <b>212</b> ↓ T= 2.6 %	302	,		> Frucks By IF By App	Approach broach		626- 120 Bellevi Phone-	d By: IC SMITHY DTH AVENUI JE, WA 9800 425-688-78 Reviewed by	È NE SUI 05 888 FAX	TE B102 - 425-688	-7784
			1	ЛНВОЦ			RTHBO			ESTBOUN		
TME PERIOD	J.	⇒ ↑	<u>ج</u> _ا		L.	-	<u> </u>	•	J.		<u>↑</u>	ALL
:00-16:05 :05-16:10 :10-16:15 :15-16:20	0 0 2 0 3 0 2 0	0 0 1	0 0 0 0	12 16 21 16	0 0 0	2 0 1 1	21 19 21 27	3 2 0 2	1 1 3 0	0 0 0	0 0 1 0	39 40 51 49
:20-16:25 :25-16:30 :30-16:35		0 0	2 0 	13 13 14	1 0 0	1. 2 11	20	3 6 1	0 1 1	0	0 0 0	53 42 37
:35-16:40 :40-16:45 :45-16:50		0 0	0 0	13 _ 15 19	0 0 0	2 1 2	18 27 31	0 0 1	2 .2 	0 0 0	0 <sup>1</sup>	37 
50-16:55 55-17:00 00-17:05	0 0 1 0 0 0	0 . 0 0	0 0 0	22 9 16	0 1 1	0 0 0	26 29 25	1 1 	2 1 0	0 0 0	0 0 	51 42 47
05-17:10 10-17:15 15-17:20	$ \begin{array}{cccccccccccccccccccccccccccccccccccc$	2 0 0	. 0 . 0	19 23 10	2 1 1	2 0 2	24 	2 1 1	3	0 0	0 1 0	54 51 43
20-17:25 25-17:30 30-17:35		0 0 0	0	16 13 13	0 0	0 0 0	15 26 	2 2 3	2  2	0 0 0	1 0	37 42 50
35-17:40 40-17:45 45-17:50	0 0 0 0 0	0		15 _ 17 _ 18	0 . 1	1 0	24 22 14	1	0 1	0 0	0 0 0	41 43 37
:50-17:55 :55-18:00		0	1 2	18 21 10	1. Q	1 1	14 16 20	1 0 1	1 1 4	1 0 0	0 4 0	37 46 39

t to subconcerne.	and the second s		y 1000 fellen alle alle anno 1000 felle anno 1	1 1 1 C ES WYOTHER PRODUCTS	and a state of the	23-5eveneeeeeeee	1 1212 C CONTRACTOR D		1 1 ~ 1988	Leorer		1 PERSONAL STREET	Children or -
TOTALS	15	0	5	7	374	10	20	559	40	31	1	8	1070
PHF	0.38	0	0.38	0.25	0.83	0.38	0.6	0.88	0.52	0.7	õ	0.5	0.92
% Trucks	0	0	0	14.3	2.7	10	0	2.7	2.5	6.5	ñ	12.5	2.9
Stopped Buses	0	0	0	0	0	0	0	0	0	ñ	กั	0	217
Pedestrians		1			0			õ		•	ñ	J	
		Contract Party over		in the second second second		······					0		

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inte	RSEC	TION T	URN M	OVEMENT	PEAK	HOUR F	REPORT					File: Ecds	5
**************************************	T= ;	3%	2000/0010/00/00/00/00/00/00/00/00	P= 0.81		Peak Ho 16:15-17		1	LOCATIC	DN:	ang dagu bèn bèn daaboogaag	8 6000000000000000000000000000000000000	
	↓ 20			307 1	Т	otal Entry V	/olume		NE 195TH WOODINN		AT 15	6TH AVE	nue ne
	; ~	<u>2</u> 	192	6 L		562				/ 1 ks laks			an a an a chuir an
<u>≪</u> 14 3			$\checkmark$	Ĺ2	- 10	þ		1		3/04/(		Day	: THU
Γ= 0 % 0	>			<u>~</u> 0		T= 6.3 %				.6:00 -			
≥= 0.45	·					P= 0.67			<i>Report Pre</i> , The trans			EG H B & ENGLISHING HIM IS F ( + 1 + 1 - CM -	
6	J,		$\uparrow$	<sup>14</sup> ہے					Surveyed E TRAFFIC		. INC		
9 · >	:	1	302	23	29	 ₀ Trucks By	Ameropeia	6	526- 120TH BELLEVUE,	1 AVENUE	NE SL	JITE B102	1
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LL <b>VEHICLES</b> 6:15-16:30	4	0	1	2	42	1	4	78	11	1	0	0	144
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ak Hour By Mo													
PHF	0.38	0	0.38	0.25	0.83	0.38	0.75	0.88	0.52	0,7	0	0.5	0.92
% Trucks(All)	0	0	0	0	2.6	16.7	0	4	4.3	7.1	0	0	3.6
% Trucks(M+H)		0	0	0	0.5	0	0	0	0	0	0	0	0.2
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#### WOODINVILLE, WASHINGTON 156TH AVE NE 'OODINVILLE-DUVALL RD

#### LUC# 05A TPG04335M

#### File Name : TPG33605A Site Code : 00000005 Start Date : 12/01/2004

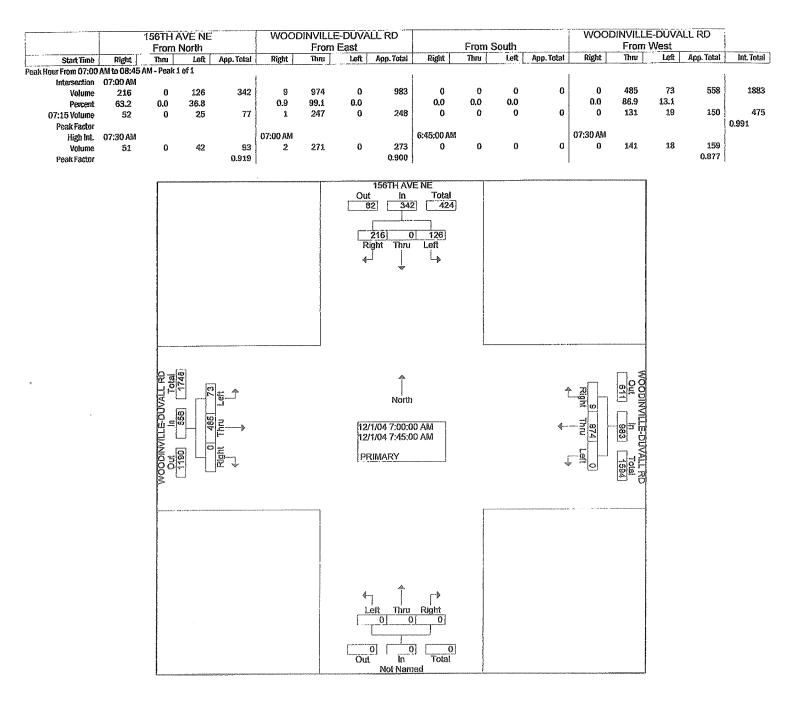
Page No : 1

LOWI OUR																						664	
										Groups	Printe	d-PRI	MARY	r .									
	T	156	THAV	E NE		WOO	DINV	ILLE-I	JUVAL	LRD						WOO	DDINV	ILLE-	DUVAL	LRD			
		Fr	om No	onh			Fr	om E	ast			Fro	m So	uth			Fr	w mo	est				
StartTime	Right	Thru	Left	Truck	App. Totel	Right	Thru	Leît	Truck	App. Total	Right	Thru	Left	Truck	App. Total	Right	Thru	Left	Truck	App. Total	Exclu. Total	Inclu. Total	int. Total
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07:00 AM	64	0	20	2	84	2	271	0	2	273	0	0	0	0	0	0	99	19	26	118	30	475	505
07:15 AM	52	0	25	3	77	1	247	0	7	248	0	0	0	0	0	0	131	19	9	150	19	475	494
07:30 AM	51	0	42	5	93	0	222	0	3	222	0	0	0	0	0	0	141	18	16	159	24	474	498
07:45 AM	49	0	39	3	88	6	234	0	7	240	0	0	0	0	0	0	114	17	8	131	18	459	477
Total	216	0	126	13	342	9	974	0	19	983	0	0	0	0	0	0	485	73	59	558	91	1883	1974
08:00 AM	41	O	25	7	66	2	233	0	7	235	0	0	0	0	0	0	112	25	4	137	18	438	456
08:15 AM	53	0	38	5	91	4	192	0	2	196	0	0	0	0	0	0	153	21	9	174	16	461	477
08:30 AM	55	õ	23	0	78	3	217	Ö	6	220	0	0	0	0	0	0	135	9	12	144	18	442	460
08:45 AM	48	ő	30	ō	78	2	218	Ő	9	220	Ó	ō	Ō	0	ō	Ó	100	18	6	118	15	416	431
Total	197	Ő	116	12	313	11	860	0	24	871	0	0	Ō	0	0	0	500	73	31	573	67	1757	1824
Grand Total	413	0	242	25	655	20	1834	0	43	1854	0	0	0	0	0	0	985	146	90	1131	158	3640	3798
	63.1	0.0	36.9	6467	000	1.1	98.9	0.0			0.0	0.0	0.0		-	0.0	87.1	12.9					
Apprch % Total %	11.3	0.0	6.6		18.0	0.5	50.4	0.0		50.9	0.0	0.0	0.0		0.0	0.0	27.1	4.0		31.1	4.2	95.8	
10(3) %	11.3	0.0	0.0		10.0	0.0	00.4	0.0		30.5	0.0	0.0	0.0		0.0	0.0	2112	-7.0		0.1.1	4.6	00.0	

		156TH / From			WOOL		E-DUVA East	LL RD		From	South		WOOL	DINVILLI From	E-DUVA West	LL RD	
Start Time	Right	Thru	Left	App. Total	Right	Thru	Left	App. Total	Right	Thru	Left	App. Total	Right	Thru	Left	App. Total	Int. Total
Peak Hour From 07:00	AM to 08:45.	AM - Peak 1	l of 1		Samera and an allow												
Intersection	07:00 AM																
Volume	216	Ũ	126	342	9	974	0	983	0	0	0	0	0	485	73	558	1683
Percent	63.2	0.0	36.8		0.9	99.1	0.0		0.0	0.0	0.0		0.0	86.9	13.1		
07:15 Volume	52	0	25	77	1	247	0	248	0	0	0	0	0	131	19	150	475
Peak Factor																	0.991
High Int.	07:30 AM				07:00 AM				6:45:00 AM				07:30 AM				
Volume	51	0	42	93	2	271	0	273	0	0	0	0	0	141	18	159	4
Peak Factor				0.919				0.900								0.877	
Peak Hour From 07:00	AM to 08:45.	AM - Peak 1	of1														
By Approach	07:00 AM				07:00 AM				07:00 AM				07:30 AM				
Volume	216	0	126	<sup>*</sup> 342	9	974	0	983	0	0	0	0	0	520	81	601	
Percent	63.2	0.0	36.8		0.9	99.1	0.0		~		~		0.0	86.5	13.5		
High Int.	07:30 AM				07:00 AM				•				08:15 AM				
Volume	51	0	42,	93	2	271	0	273				^	0	153	21	174	
Peak Factor				0.919				0.900				-				0.864	

#### WOODINVILLE, WASHINGTON 156TH AVE NE WOODINVILLE-DUVALL RD /C# 05A TPG04335M

File Name: TPG33605ASite Code: 00000005Start Date: 12/01/2004Page No: 2



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Lane Group	EBL	EBT	WBT	WBR	SBL	SBR	
Volume (vph)	311	1076	771	23	162	141	
Confl. Peds. (#/hr)							
Confl. Bikes (#/hr)							
Peak Hour Factor	0.97	0.97	0.93	0.93	0.91	0.91	
Growth Factor	100%	100%	100%	100%	100%	100%	
Heavy Vehicles (%)	1%	1%	3%	3%	3%	3%	
Bus Blockages (#/hr)	0	0	0	0	0	0	
Parking (#/hr)							
Mid-Block Traffic (%)		0%	0%		0%		
Intersection Summary							

M:\03\03045 Woodinville\Synchro\KC Updates\Woodinville Existing PM.sy6

#### WOODINVILLE, WASHINGTON NE WOODINVILLE WAY "E WOODINVILLE-DUVALL RD \_JC# 06A TPG04335M

# File Name: TPG33606ASite Code: 00000006Start Date: 12/01/2004Page No: 1

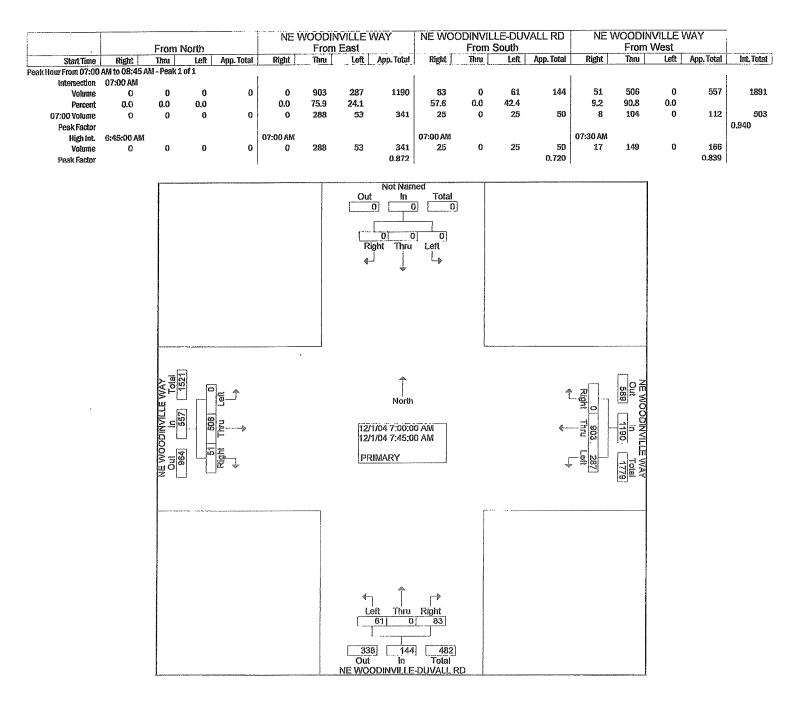
C# UDA	Iruv	4000	8140							_				-						1 090 1	<i>60</i>	684	
										Groups													
		Fr	om No	orth		NE		DINV rom E	LLE W ast	IAY	NE V		INVILI RD om So	_E-DU\ uth	/ALL	NE		DINVI om W	LLE W. est	AY			
Start Time	Right	Thnu	Left	Truck	App. Totai	Right	Thra	Left	Truck	App. Total	Right	Thnu	Left	Truck	App. Total	Right	Thru	Left	Truck	App. Total	Exclu. Total	Inclu. Total	lu Tot:
Factor	1.0	1.0	1.0	1.0		1.0	1.0	1.0	1.0		1.0	1.0	1.0	1.0		1.0	1.0	1.0	1.0				
07:00 AM	0	0	0	0	0	0	288	53	1	341	25	0	25	2	50	8	104	0	17	112	20	503	52
07:15 AM	0	0	0	0	0	0	227	52	2	279	17	0	6	0	23	16	139	0	6	155	8	457	46
07:30 AM	0	0	0	0	0	0	211	81	4	292	20	0	17	6	37	17	149	0	15	166	25	495	52
07:45 AM	0	0	0	0	0	0	177	101	5	278	21	0	13	1	34	10	114	0	2	124	8	436	44
Total	0	0	0	0	0	0	903	287	12	1190	83	0	61	9	144	51	506	0	40	557	61	1891	195
08:00 AM	0	0	0	0	0	o	196	83	2	279	29	0	10	4	39	14	105	0	3	119	9	437	44
08:15 AM	0	0	0	0	0	0	181	81	4	262	47	0	13	Ą	60	18	128	0	2	146	10	468	47
08:30 AM	0	0	0	0	0	0	198	96	7	294	29	0	21	3	50	14	123	0	4	137	14	481	49
08:45 AM	0	0	0	0	0	0	200	101	8	301	32	0	14	1	46	23	95	0	1	118	10	465	47
Total	0	0	0	0	0	0	775	361	21	1136	137	0	58	12	195	69	451	0	10	520	43	1851	189
Grand Total	0	0	0	0	0	0	1678	648	33	2326	220	0	119	21	339	120	957	0	50	1077	104	3742	384
Appreh %	0.0	0.0	0.0			0.0	72.1	27.9			64.9	0.0	35.1			11.1	88.9	0.0					
Total %	0.0	0.0	0.0		0.0	0.0	44.8	17.3		62.2	5.9	0.0	3.2		9.1	3.2	25.6	0.0		28.8	2.7	97.3	

					NE V	VOODIN		WAY	NE WO			ALL RD	NE V	VOODIN		MAY	
		From 1	North			From	East			From	South						
Start Time	Right	វីវាល	Left	App. Total	Right	Thru	Left	App. Total	Right	ที่ชบ	Leñ	App. Total	Right	ากบ	Left	App. Total	Int. Total
Peak Hour From 07:00	AM to 08:45 A	M - Peak 1	of 1														
Intersection	07:00 AM																
Volume	0	0	0	0	0	903	287	1190	83	0	61	144	51	506	0	557	1891
Percent	0.0	0.0	0.0		0.0	75.9	24.1		57.6	0.0	42.4		9.2	90.8	0.0		
07:00 Volume	0	0	0	0	0	288	53	341	25	0	25	50	8	104	0	112	503
Peak Factor																	0.940
High Int.	6:45:00 AM				07:00 AM				07:00 AM				07:30 AM				
Volume	0	0	0	0	0	288	53	341	25	0	25	50	17	149	0	166	
Peak Factor								0.872				0.720				0.839	
Peak Kour From 07:00	AM to 08:45 A	M - Peak 1	of 1														
By Approach	07:00 AM				07:00 AM				08:00 AM				07:15 AM				
Volume	0	0	0	0	0	903	287	1190	197	0	58	195	57	507	0	564	
Percent		-			0.0	75.9	24.1		70.3	0.0	29.7		10.1	89.9	0.0		
High Int.					07:00 AM				08:15 AM				07:30 AM				
Volume	-			~	0	288	53	341	47	0	13	60	17	149	0	166	
Peak Factor				-				0.872	l			0.813				0.849	

#### WOODINVILLE, WASHINGTON NE WOODINVILLE WAY NE WOODINVILLE-DUVALL RD )C# 06A TPG04335M

#### TRAFFICOUNT, INC. PMB 195 4820 YELM HWY SE STE B LACEY, WA 98503 360-491-8116

File Name: TPG33606ASite Code: 00000006Start Date: 12/01/2004Page No: 2



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Lane Group	EBT	EBR	WBL	WBT	NBL	NBR	
Volume (vph)	1006	97	296	719	71	511	
Confl. Peds. (#/hr)							
Confl. Bikes (#/hr)							
Peak Hour Factor	0.92	0.92	0.96	0.96	0.89	0.89	
Growth Factor	100%	100%	100%	100%	100%	100%	
Heavy Vehicles (%)	0%	0%	0%	0%	0%	0%	
Bus Blockages (#/hr)	0	0	0	0	0	0	
Parking (#/hr)							
Mid-Block Traffic (%)	0%			0%	0%		
Intersection Summary							

#### WOODINVILLE, WASHINGTON WOODINVILLE-SNOHOMISH RD 195TH ST/ NE WOODINVILLE WAY ...JC# 07A TPG04335M

#### File Name: TPG33607A Site Code : 0000007 Start Date : 12/01/2004 Page No :1

Int.

#### Groups Printed- PRIMARY WOODINVILLE-SNOHOMISH WOODINVILLE-SNOHOMISH NE 195TH ST NE WOODINVILLE WAY RD RD From East From West From North From South App. Exclu. Inctu. App. App. App. Right Thru Left Truck Truck Right Thru Truck Right Thnu Leñ Truck Left 1.efr Start Time Right Thru Total Total Total Total Total Total Total 1.0 1.0 1.0 1.0 1.0 1.0 1.0 1.0 1.0 1.0 1.0 1.0 1.0 1.0 1.0 1.0 Factor 07:00 AM 07:15 AM 07:30 AM 07:45 AM Total MA 00:80 08:15 AM 08:30 AM 08:45 AM Total Grand Total 18.7 4.9 93.0 2.1 5.8 46.1 48.1 19.4 63.5 17.1 Appreh % 15.2 66.2 20.6 0.7 32.0 9.8 7.3 23.8 37.5 6.8 93.2 13.7 3.9 1.6 29.8 0.6 4.5 4.7 6.4 Total % 3.1

	WOOD	F	E-SNOH( RD I North	OMISH	NE V	VOODIN From	VILLE V East	VAY	WOOD	F	E-SNOH 2D South	OMISH		NE 19 From	5TH ST West		
Start Time	Right	Thn	Left.	App. Total	Right	Thru	left	App. Total	Right	Thru	Left	App. Total	Right	Thru	Left	App. Total	Int. Total
Peak Hour From 07:00	AM to 08:45	AM - Peak	1 of 1						,								
Intersection	07:00 AM												ļ				
Volume	80	358	114	552	43	900	14	957	16	133	150	299	186	647	182	1015	2823
Percent	14.5	64.9	20.7		4.5	94.0	1.5		5.4	44.5	50.2		18.3	63.7	17.9		
07:45 Volume	21	84	33	138	13	215	8	236	8	33	16	57	56	180	51	287	718
Peak Factor																	0.983
High Int.	07:15 AM				07:00 AM				07:15 AM				07:45 AM				
Volume	21	107	24	152	8	263	ı	272	3	33	54	90	56	180	51	287	
Peak Factor				0.908				0.880				0.831				0.884	
Peak Hour From 07:00	AM to 08:45.	AM - Peak	1 of 1														
By Approach	07:15 AM				07:00 AM				07:00 AM				07:30 AM				
Volume	86	374	108	568	43	900	14	957	16	133	150	299	190	717	195	1102	
Percent	15.1	65.8	19.0		4.5	94.0	1.5		5.4	44.5	50.2		17.2	65.1	17.7		
High Int.	07:15 AW				07:00 AM				07:15 AM				08:00 AM				
Volume	21	107	24	152	8	263	L	272	3	33	54	90	53	193	50	296	
Peak Factor				0.934				0.880				0.831				0.931	

#### WOODINVILLE, WASHINGTON WOODINVILLE-SNOHOMISH RD NE 195TH ST/ NE WOODINVILLE WAY )C# 07A TPG04335M

#### TRAFFICOUNT, INC. PMB 195 4820 YELM HWY SE STE B LACEY, WA 98503 360-491-8116

File Name: TPG33607ASite Code: 00000007Start Date: 12/01/2004Page No: 2

		NVILLE R From	D North			From	VVILLE V East		,	R From	E-SNOHO D South				West		
Start Time	Right	Thni	Left	App. Total	Right	Thru	Left	App. Total	Right	Thru	Left	App. Total	Right	Tha	Left	App. Total	Int. Total
Peak Hour From 07:00		AM - Peak i	l of 1		I				1				I			1	
Intersection	07:00 AM 80	358	114	552	43	900	14	957	16	133	150	299	186	647	182	1015	5000
Volume Percent	14.5	64.9	20.7	552	43	94.0	14	301	5.4	44.5	50.2	299	18.3	63.7	162	1010	2823
07:45 Volume	21	84	33	138	13	215	8	236	8	33	.50.2 16	57	56	180	51	287	718
Peak Factor	64	04	ഹം	100		610	•	2.50	S.		*0	51		100	44	201	0.983
High Int.	07:15 AM				07:00 AM				07:15 AM				07:45 AM				0.000
Volume	21	107	24	152	8	263	2	272	3	39	54	90	56	180	51	287	
Peak Factor				0.908				0.880				0.831				0.884	
					•								•			,	
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558 299 857 Out In Total WOODINVILLE-SNOHOMISH RD

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#### TRAFFICOUNT, INC. PMB 195 4820 YELM HWY SE STE B LACEY, WA 98503 360-491-8116

21/1

# File Name : TPG06401P Site Code : 00000001 Start Date : 03/04/2004 Page No : 1

ODINVILLE, WASHINGTON VE 195TH ST WOODINVILLE-SNOHOMISH RD LOC# 01 TPG04064M

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			195T			woo		RD RD	NOHO ast	MISH			195TI			woo		RD RD	SNOHC	MISH			
Start Time	Right	Thru	Left	Truck	App. Total	Right	Tanı	Left	Truck	App. Total	Right	Thru	Left	Truck	App. Total	Right	Thru	Left	Truck	App. Total	Exclu. Total	Inclu. Total	int. Total
Factor	1.0	1.0	1.0	1.0		1.0	1.0	1.0	1.0		1.0	1.0	1.0	1.0		1.0	1.0	1.0	1.0				
04:00 PM	45	63	8	4	116	19	164	11	9	194	12	122	79	5	213	44	149	19	11	212	29	735	764
04:15 PM	62	67	15	~ 9	144	21	173	8	11	202	12	102	71	<b>`9</b>	185	44	172	30	7	246	36	777	815
04:30 PM	101	59	19	4	179	17	187	19	5	223	8	97	87	4	192	53	181	14	10	248	23	842	86
04:45 PM	46	82	29	4	157	17	159	9	4	185	10	89	71	6	170	52	200	15	5	267	19	779	79R
Total	254	271	71	21	596	74	683	47	29	804	42	410	308	24	760	193	702	78	33	973	107	3133	3240
05:00 PM	54	71	14	4	139	22	192	10	5	224	11	124	82	10	217	58	178	11	4	247	23	827	850
05:15 PM	29	72	7	1	108	24	166	10	6	200	7	99	75	4	181	42	168	14	8	224	19	713	732
05:30 PM	37	52	16	2	1.05	17	157	14	4	188	5	100	80	4	185	52	202	7	s	261	15	739	754
05:45 PM	26	72	14	1	112	16	122	5	1	143	11	115	67	3	193	64	178	10	7	252	12	700	712
Total	146	267	51	8	464	79	637	39	16	755	34	438	304	21	776	216	726	42	24	984	69	2979	3048
Grand Total	400	538	122	29	1060	153	1320	86	45	1559	76	848	612	45	1536	409	1428	120	57	1957	176	6112	6238
<ul> <li>Apprch %</li> </ul>	37.7	50.8	11.5			9.8	84.7	5.5			4.9	55.2	39.8			20.9	73.0	6.1					
Total %	6.5	8.8	2.0		17.3	2.5	21.6	1.4		25.5	1.2	13.9	10.0		25.1	6.7	23.4	2.0		32.0	2.8	97.2	4
A ;															,								$\langle a \rangle b_1^*$

		NE 195 From			WOOD	NVILLE RI From	D	OMISH			5TH ST South		WOOD	INVILLE R From	D	OMISH	]
Start Time	Right	Thru	Left	App. Total	Right	Thru	Left	App. Total	Right	Thru	Left	App. Total	Right	Thru	Left	App. Total	Int. Total
Peak Hour From 04:00	PM to 05:45	PM - Peak	1 of 1														
Intersection	04:15 PM				[												í
Volume	263	279	77	619	77	711	46	834	41	412	311	764	207	731	70	1008	3225
Percent	42.5	45.1	12.4		9.2	85.3	5.5		5.4	53.9	40.7		20.5	72.5	6.9		40 La 24 40
04:30 Volume	101	59	19	179	17	187	19	223	8	97	87	192	53	181	14	248	842
Peak Factor																	0.958
High Int.	04:30 PM				05:00 PM				05:00 PM				04:45 PM				13
Volume	101	59	19	179	22	192	10	224	11	124	82	217	52	200	15	267	
Peak Factor				0.865				0.931				0.880				0.944	
Peak Hour From 04:00	PM to 05:45	PM - Peak 1	l of 1														
By Approach	04:15 PM				04:15 PM				05:00 PM				04:15 PM			1	
Volume	263	279	77	619	77	711	46	834	34	438	304	776	207	731	70	1008	
Percent	42.5	45.1	12.4		9.2	85.3	5.5		4.4	56.4	39,2		20.5	72.5	6.9	2000	
High Int.	04:30 PM				05:00 PM				05:00 PM				04:45 PM	2 Da - W	0.0		
Võlume	101	59	19	179	22	192	10	224	11	124	82	217	52	200	15	267	·,
Peak Factor				0.865				0.931			0.0	0.894				0.944	

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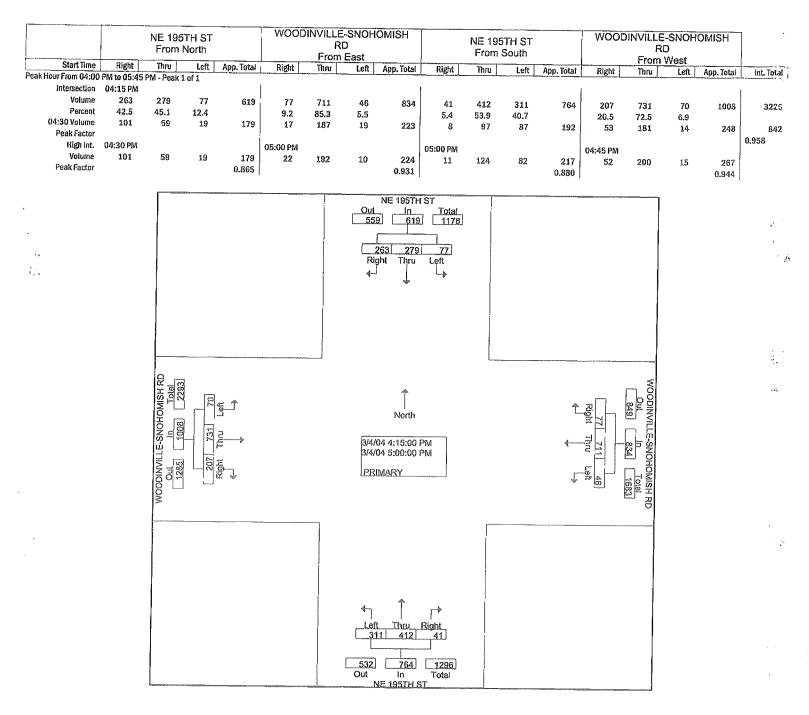
WOODINVILLE, WASHINGTON 195TH ST WOODINVILLE-SNOHOMISH RD LOC# 01 TPG04064M

 File Name
 : TPG06401P

 Site Code
 : 00000001

 Start Date
 : 03/04/2004

 Page No
 : 2



## Exhibit T-2

### Highway Capacity Manual, 2000

**Signalized intersection** level of service (LOS) is defined in terms of the average total vehicle delay of all movements through an intersection. Vehicle delay is a method of quantifying several intangible factors, including driver discomfort, frustration, and lost travel time. Specifically, LOS criteria are stated in terms of average delay per vehicle during a specified time period (for example, the PM peak hour). Vehicle delay is a complex measure based on many variables, including signal phasing (i.e., progression of movements through the intersection), signal cycle length, and traffic volumes with respect to intersection capacity. Table 1 shows LOS criteria for signalized intersections, as described in the *Highway Capacity Manual* (Transportation Research Board, Special Report 209, 2000).

able 1.	Level of Service Criteria f	or Signalized Intersections					
Level of Service	Average Control Delay (sec/veh)	General Description (Signalized Intersections)					
А	≤10	Free Flow					
В	>10 - 20	Stable Flow (slight delays)					
С	>20 - 35	Stable flow (acceptable delays)					
D	>35 - 55	Approaching unstable flow (tolerable delay, occasionally wait through more than one signal cycle before proceeding)					
E	>55 - 80	Unstable flow (intolerable delay)					
F	>80	Forced flow (jammed)					

**Unsignalized intersection** LOS criteria can be further reduced into two intersection types: all-way stop-controlled and two-way stop-controlled. All-way, stop-controlled intersection LOS is expressed in terms of the average vehicle delay of all of the movements, much like that of a signalized intersection. Two-way, stop-controlled intersection LOS is defined in terms of the average vehicle delay of an individual movement(s). This is because the performance of a two-way, stop-controlled intersection is more closely reflected in terms of its individual movements, rather than its performance overall. For this reason, LOS for a two-way, stop-controlled intersection is defined in terms of its individual movements. With this in mind, total average vehicle delay (i.e., average delay of all movements) for a two-way, stop-controlled intersection should be viewed with discretion. Table 2 shows LOS criteria for unsignalized intersections (both all-way and two-way, stop-controlled).

Table 2.	Level of Service Criteria for Unsignalized Intersections						
L	evel of Service	Average Control Delay (sec/veh)					
	А	0 - 10					
	В	>10 - 15					
	С	>15 - 25					
	D	>25 - 35					
	E	>35 - 50					
	F	>50					

# Exhibit T-3a Queue Observations and Calibration

WOODINVILLE, WASHINGTON 156TH AVE NE WOODINVILLE-DUVALL RD

TPG04335M SB QUEUE OBSERVATIONS

	SB	SB
	RIGHT	LEFT
TIME	TURN	TURN
7:00:05 7:01:58	6	2
7:03:44	5	3
7:05:33	3	5
7:07:25	11	2
7:09:13	6	4
7:11:00	5	0
7:12:55	6	2
7:14:40 7:16:35	7 10	2
7:18:25	4	2
7:20:20	3	4
7:22:05	5	3
7:23:55	0	4
7:25:45	6	1
7:27:30	2	3
7:29:23	1	5
7:31:11 7:33:03	4	5 6
7:34:54	5	7
7:36:44	4	4
7:38:36	0	2
7:40:22	7	7
7:42:15	4	7
7:44:03	4	3
7:45:54	3	5
7:47:44	3	6
7:49:34 7:51:24	1	7
7:53:12	4	3
7:55:00	0	2
7:56:55	0	4
7:58:55	0	1
8:00:35	6	1
8:02:22	2	5
8:04:13	1	3
8:06:04	1	4
8:07:53 8:09:44	5	2
8:11:34	3	5
8:13:25	5	2
8:15:15	2	2
8:17:05	0	2
8:18:55	1	7
8:20:45	0	6
8:22:35	3	3
8:24:23	2	3
8:26:13 8:28:05	9	5 5
8:29:55	4	0
8:31:45	8	1
8:33:35	5	2
8:35:23	5	6
8:37:14	2	3
8:39:03	4	4
8:40:55 8:42:44	2	1 2
8:44:33	4	1
8:46:23	4	7
8:48:13	8	3
8:50:04	5	2
8:51:55	2	2
8:53:45	5	1
8:55:33	2	5
8:57:23	1	4
8:59:13	2	0
95th%		
Queue	8.75	7
-		

## Exhibit T-3b Queue Observations and Calibration

	EXISTING					NO A	ACTION	PROPOS	ED ACTION	R-1 ZON	ING ALT.	ATTACHED H	IOUSING ALT.
	Existing AM Peak Synchro 95th% (feet)	Existing AM Peak 95th % Observed (vehicles)	Existing AM Peak 95th % Observed (feet) <sup>1</sup>	Calibration Factor	Calibrated Existing 95th% Queue (feet)	Synchro 95th% Queue	Calibrated 95th% Queue (feet)	Synchro 95th% Queue	Calibrated 95th% Queue (feet)	Synchro 95th% Queue	Calibrated 95th% Queue (feet)	Synchro 95th% Queue	Calibrated 95th% Queue (feet)
SB Left	101	8.75	175	1.73	175	108	187	122	211	112	194	118	204
SB Right	138	7	140	1.01	140	147	149	170	172	154	156	166	168

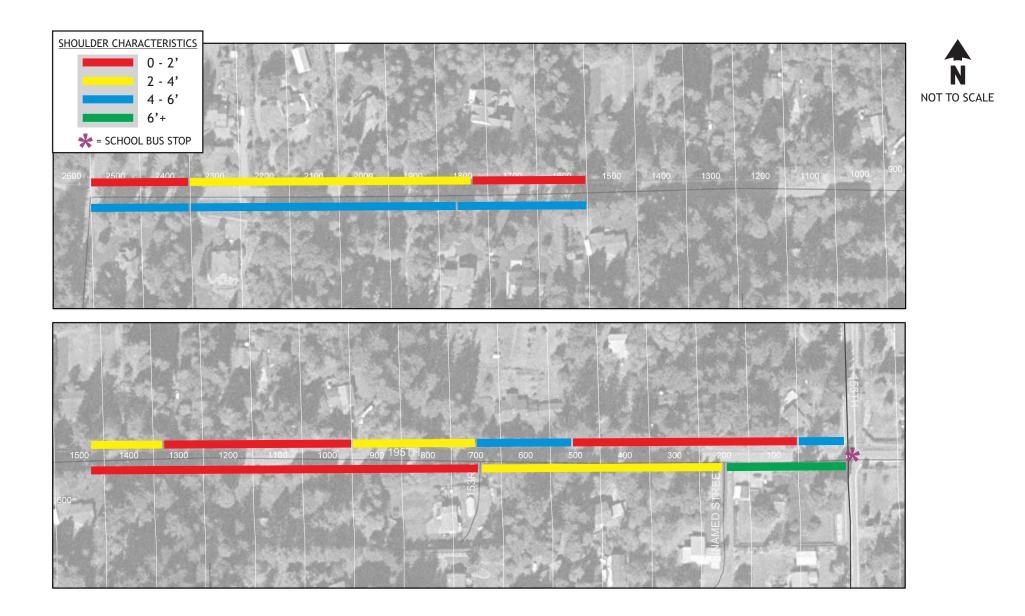
'- Based on on 20 foot average vehicle length/spacing (per field observations)

# Exhibit T-4 KING COUNTY RECOMMENDED LINK TYPE CAPACITY VALUES

T Y	Number of	Area	Pavement Type	Width of Traffic Lane	Intersection Control	Other Information	ADT Cap Two	oacity One	Peak Cap.
P E	Lanes		Type	i ante canto			Direc.	Direc.	One Direc.
 	Centroid connector	- ·		and a second			100,000	50,000	5,00
1		and the second design of the							
الماحلموس	Arterials			Less than 20'	Stop sign	Minimal .	7,400	(3,700)	) 74
2	Two Lane	Rural	Oil mat	Less man 20	Drop sign	shoulders			/
			Paved	18'-20'	Stop sign	Minimal	9,520	4,760	74
3	Two Lane	Rural or	Paved	18-20	JION SIGN	shoulders			
		Urban		20'-22'	A nu time	Long Dist. Btw	19,000	9,500	1,24
4	Two Lane	Rural or	Paved	20-22	Any type	Cont. Intersec.		· · · · · · · · · · · · · · · · · · ·	
		Urban	·	1001.04	Stop Sign	Adequate	11.620	5,810	76
5	Two Lane	Urban	Paved	22'-24'	stop sign	Shoulders			
					T-off a Singali	Adequate	13.200	6,600	76
6	Two Lane	Urban '	Paved	22'-24'	Traffic Signal	Shoulders			
					A T	Long Dist. Btw	21,120	10,560	1,32
7	Two Lane	Urban	Paved	22'-24'	Any Type	Cont. Intersec.			
					m 0° 0'	Channel at	16,900	8,450	1,03
8	Two Lane/	Urban	Paved	32'-36'	Traffic Signal			<u>, 134</u>	
	turn channel			at intersection		Intersection	19.220	9,610	1,03
9	Three Lane	Urban	Paved	32'-40'	Traffic Signal	Two Way	19,220		
						Turn Lane	25,380	12,690	1,93
10	Four Lane	Urban	Paved	40'-44'	Traffic Signal	T D' Davis	38,000	19,000	2,60
11	Four Lanc	Urban	Paved	40'-48'	Апу Турс	Long Dist. Btw	38,000	17,000	2,00
						Cont. Intersec.	30,560	15,280	2,10
12	Four Lane/	Urban	Paved	56'-60'	Traffic Signal			13,200	
12	turn channel			at intersection			24.240	17,120	2,16
13	Five Lane Section	Urban	Paved	56'-60'	Traffic Signal		34,240	17,120	2,85
	Six Lanc	Urban	Paved	60'-72'	Traffic Signal			20,050	3,06
15	Six Lanc/turn chan.	Urban 🐪	Paved	78'-84'	Traffic Signal		40,100	15,640	2,45
16	Four Lanc/turn	Urban	Paved	60'-72'	Traffic Signal			10,010	6,70
10	chan. Transit/carpool						2024-04 M		
								CONTRACTOR OF	
	Freeways	Urban	Paved	24'	Interchange		27,500	13,750	1,92
17	Two Lane		Taveo						
	controlled access	Urban	Paved	48'	Interchange	Full access	72,600	36,300	3,90
18	Four Lane frwy	Utban				control			
		Urban	Paved	72'	Interchange	Full access	103,500	51,750	6,2
19	Six Lane frwy	Urban	Tavea			control			
			Paved	96'	Interchange	Full access	138,000	69,000	8,28
20	Eight Lane frwy	Urban	Faveu			control			
		r F 1	Paved	60' include.	Interchange	Full access	74,940	37,470	5,40
21		Urban	Paveo	shoulder		control			
	w/Transit/carpool			88' include	Interchange	Full access	105,040	52,520	7,7
22	Orth Durito an in	Urban	Paved	shoulder	1111010101010	control			
	Transit/carpool	and the second sec	Non-manufacture of the second se	Namp with the state of the stat					
	External Links	1					AND A CONTRACT OF A CONTRACT O	26 220	3,8
	Four-Six Lane	Urban	Paved	88'+	Traffic Signal	20-25 MPH	50,660	25,330	3,0
ninennin CC	LOULOIV Patto	CBD	Paved					0.500	10
23	Arterial		and the second s		Long Distance		19,000	9,500	1,2
	Arterial		Paved			1		A 160	7
24	Two Lane Arterial	Rural	Paved Paved				9,520	4,760	1.1
24 25	Two Lane Arterial Two Lane Arterial	Rural Rural	Paved				13,720	6,860	7
24 25 26	Two Lane Arterial Two Lane Arterial Two Lane Arterial	Rural Rural Urban	Paved Paved		Long Distance		13,720 38,000	6,860 19,000	7,6
24 25 26 27	Two Lane Arterial Two Lane Arterial Two Lane Arterial Four Lane Arterial	Rural Rural Urban Rural	Paved Paved Paved		Long Distance		13,720	6,860 19,000 12,690	7,6 1,9
24 25 26 27 28	Two Lane Arterial Two Lane Arterial Two Lane Arterial Four Lane Arterial Four Lane Arterial	Rural Rural Urban Rural Rural	Paved Paved Paved Paved		Long Distance		13,720 38,000	6,860 19,000 12,690 16,860	7,6 1,9 2,1
24 25 26 27 28 29	Two Lane Arterial Two Lane Arterial Two Lane Arterial Four Lane Arterial Four Lane Arterial Four Lane Arterial	Rural Rural Urban Rural Rural Urban	Paved Paved Paved Paved Paved		Long Distance		13,720 38,000 25,380	6,860 19,000 12,690	7,6 1,9 2,1 3,0
24 25 26 27 28	Two Lane Arterial Two Lane Arterial Two Lane Arterial Four Lane Arterial Four Lane Arterial	Rural Rural Urban Rural Rural	Paved Paved Paved Paved		Long Distance		13,720 38,000 25,380 33,720	6,860 19,000 12,690 16,860	7,6 1,9 2,1

Source: King County Department of Transportation, Transportation System Planning Section, as reviewed and recommended by the KJS &

Associates in 1995.

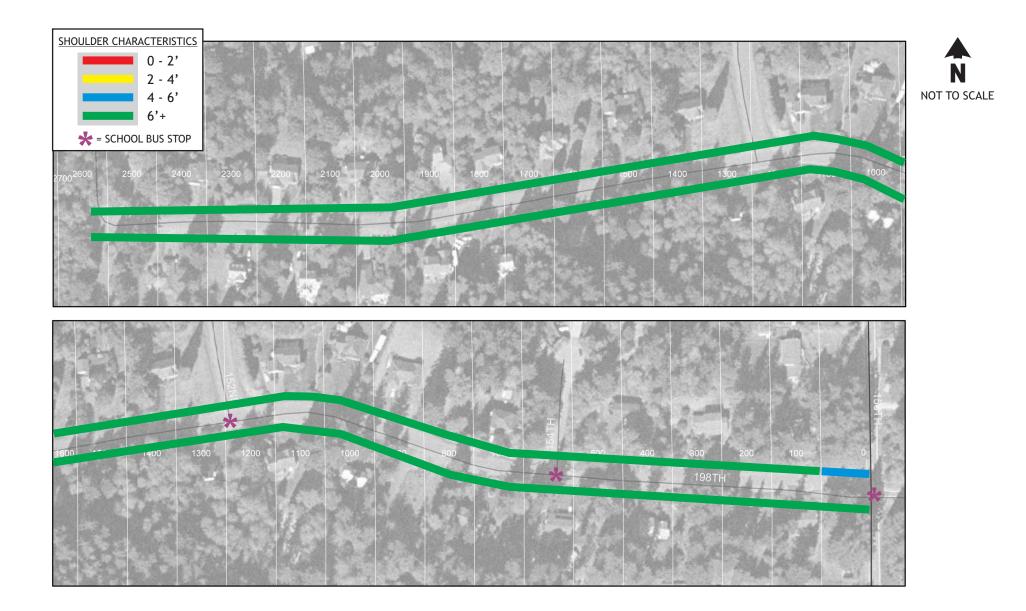


Wood Trails

Exhibit T-5a Roadway Shoulder Inventory (195th Street)



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Transpo Group

Exhibit T-5b Roadway Shoulder Inventory (198th Street)

Wood Trails & Montevallo

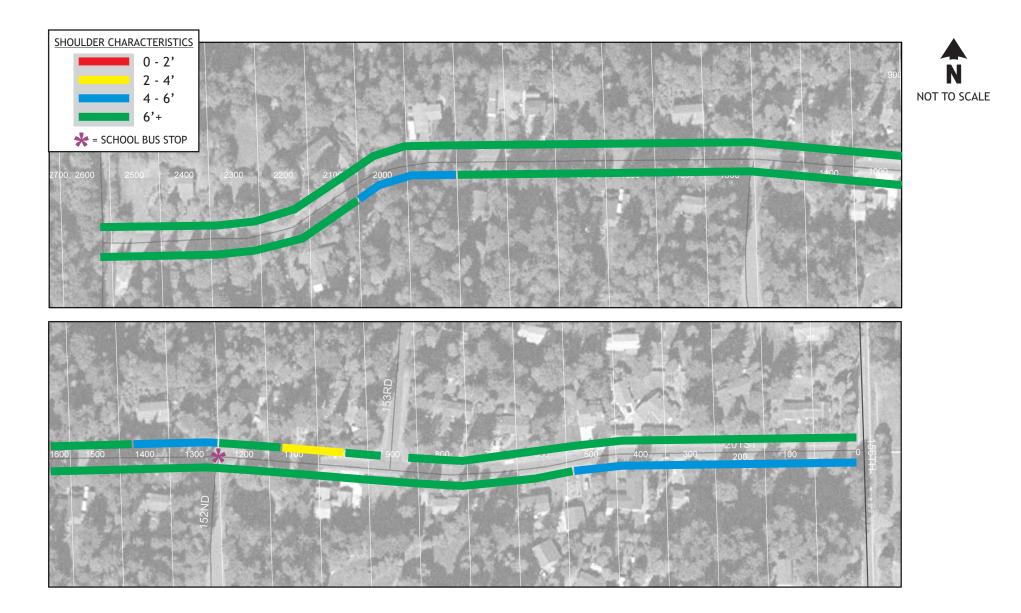


Exhibit T-5c Roadway Shoulder Inventory (201st Street)

Wood Trails & Montevallo

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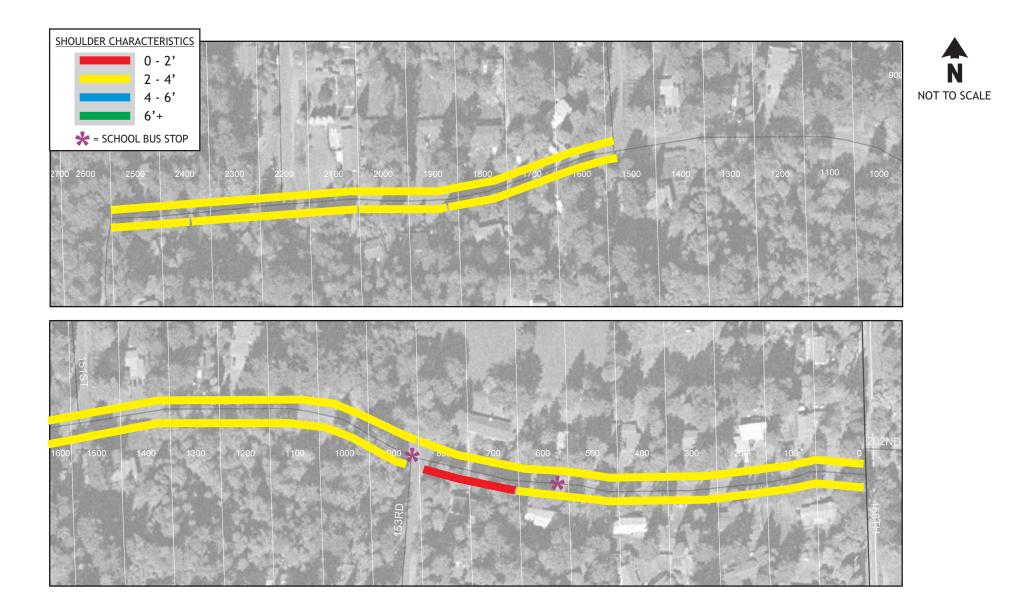


Exhibit T-5d Roadway Shoulder Inventory (202nd Street)

Wood Trails

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# EXHIBIT T-6: TECHNICAL MEMORANDUM

То:	File	Date:	February 15, 2005
From:	Mike Swenson, P.E., P.T.O.E. Brandon Moen, AICP	TG:	04007.00
Subject:	Wood Trails/Montevallo EIS: Sig	ıht Distan	ce Conditions

The purpose of this technical memorandum is to provide a summary of the stopping sight distance conditions of local residential roadways in the area of the proposed developments, particularly the roadways that could connect the Wood Trails site to 156<sup>th</sup> Avenue NE, including:

- NE 202<sup>nd</sup> Street
- NE 201<sup>st</sup> Street
- NE 198<sup>th</sup> Street
- NE 195<sup>th</sup> Street

The estimated stopping sight distance along each roadway is discussed below.

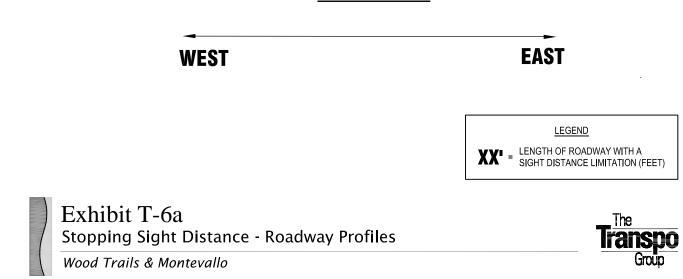
# Sight Distance

Stopping sight distance along NE 202<sup>nd</sup> Street, NE 201<sup>st</sup> Street, NE 198<sup>th</sup> Street, and NE 195<sup>th</sup> Street was calculated using information obtained through field collection efforts. Existing roadway profiles were estimated using Global Positioning System (GPS) technology. All four roadways were traveled multiple times while collecting GPS data using a handheld GPS unit. This GPS unit has an accuracy within one to two meters depending on the positioning of the satellites and current coverage. The roadway profiles and subsequent sight distance calculations reflect only the vertical alignment of the roadway. If a horizontal curve exists (such as on the west end of NE 201<sup>st</sup> Street) that would influence the SSD, it is not reflected in these calculations. Observations in the field indicated both horizontal curves and vertical curves at the west end of NE 201<sup>st</sup> Street.

The calculated sight distance measurements were then compared to City of Woodinville sight distance requirements, which are based on American Association of State Highways and Transportation Officials (AASHTO) standards. The design speed of the roadway used in the calculations was assumed to be the posted speed limit (25 mph) plus eight mph, per City of Woodinville standards. Using these assumptions, City of Woodinville stopping sight distance standards are met at all locations along NE 201<sup>st</sup> Street with the exception of the west end of the road, near the connection to the proposed development. Along NE 198<sup>th</sup> Street only one location, extending 85 feet, is shown to be deficient in the estimated stopping sight distance. Along NE 195<sup>th</sup> Street, one segment of 468 feet in length is shown to be deficient. Along NE 202<sup>nd</sup> Street, two segments are shown to be deficient, each extending 357 feet and 389 feet in length. A graphical representation of the most restricted stopping sight distance location along NE 198<sup>th</sup> Street and NE 201<sup>st</sup> Street are shown in Figure C-5a, while Figure C-5b shows the same information for NE 195<sup>th</sup> Street and NE 202<sup>nd</sup> Street.

As noted, the roadway profiles generated for this analysis are not exact and were not surveyed. Thus, the precise location and extents of the sight distance restrictions are provided for general information only.

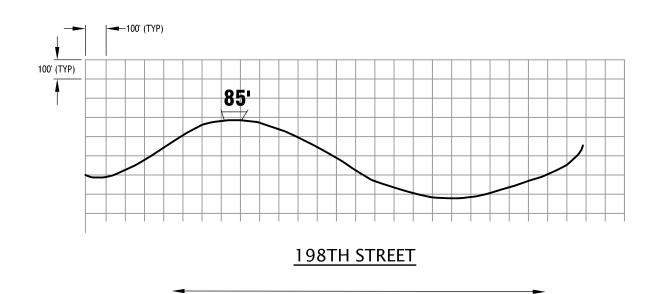
A review of historic accident records along each roadway over the past three complete years of which data is available (2001-2003), shows that two accidents were reported along these four roadways. However, neither accident appears to have been affected by sight distance limitations. One of the accidents involved a vehicle striking a pole, which likely wasn't affected by sight distance. The other accident occurred 150 feet west of the 156<sup>th</sup> Avenue NE/NE 201<sup>st</sup> Street intersection, which has not been identified as an area with a sight distance deficiency. Therefore, the accident records provided suggest that no accident history directly attributable to sight distance limitations exists along these four local roadways.

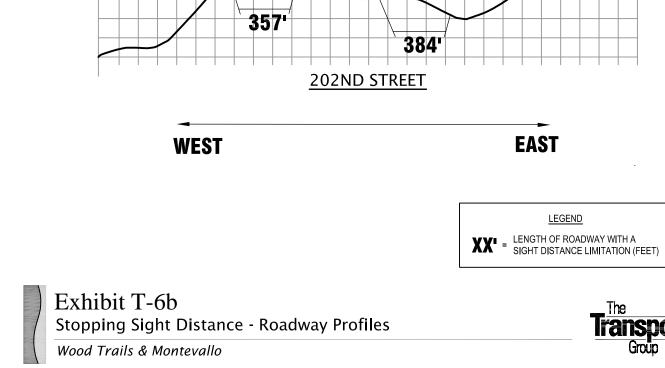












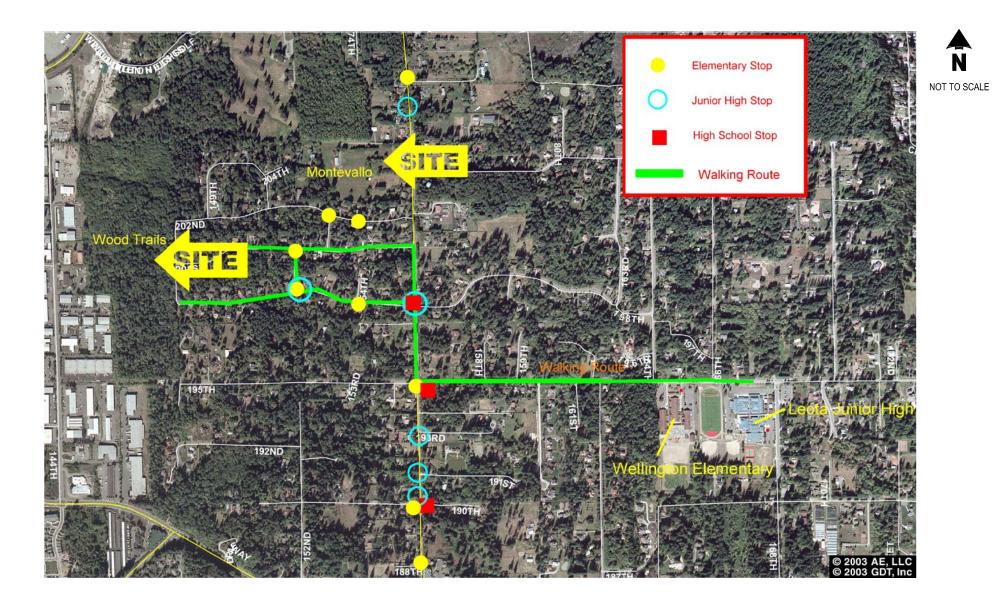


100' (TYP)

100' (TYP)



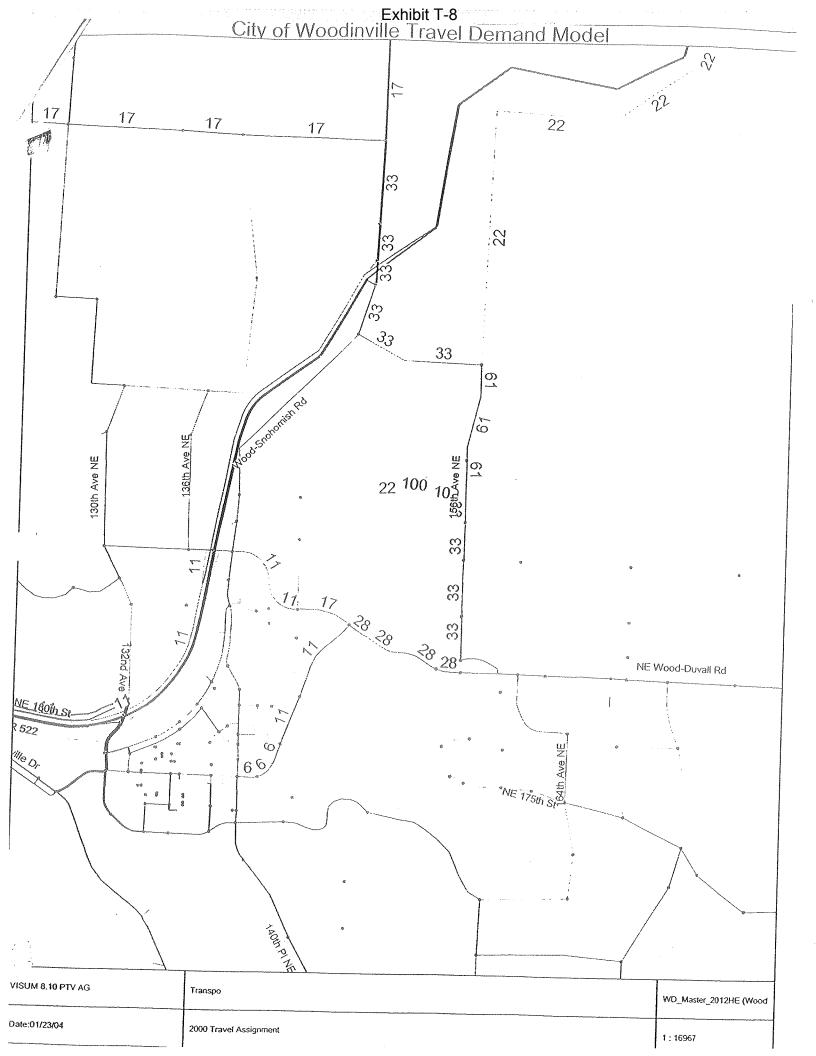


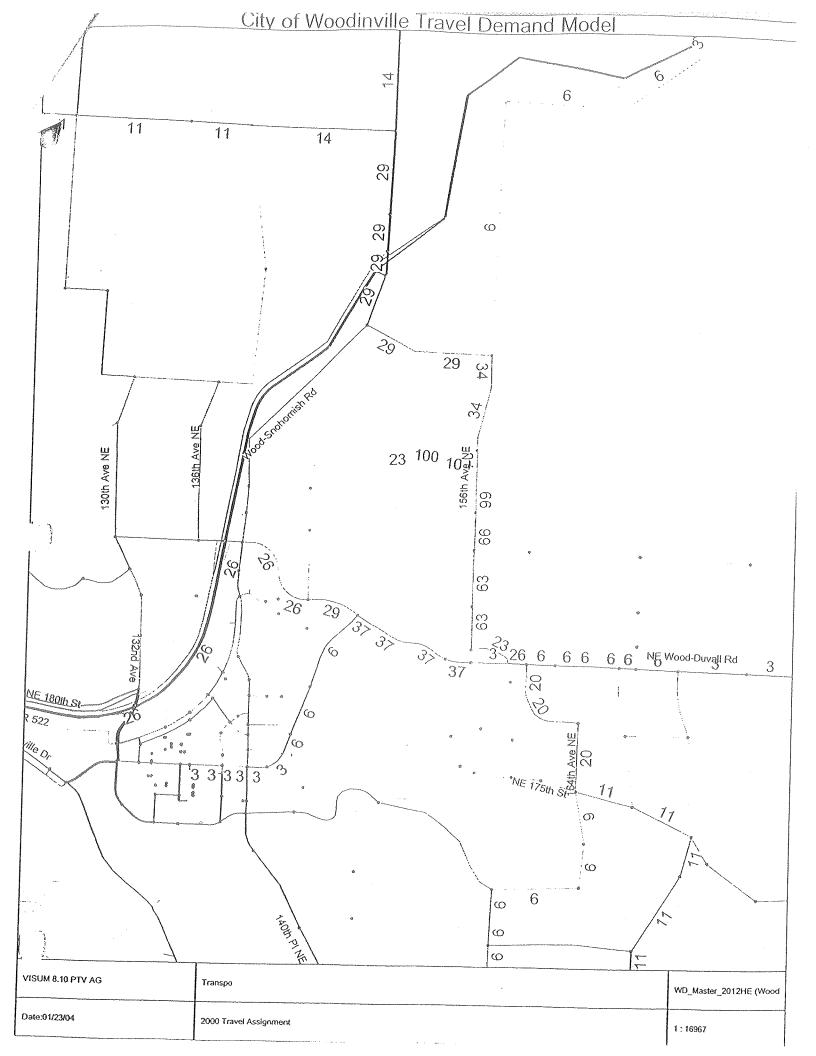




Wood Trails & Montevallo M:104104007 Wood trails\Graphics\Graphic04.dwg, A, 7/14/06 2:53:19 PM, megans





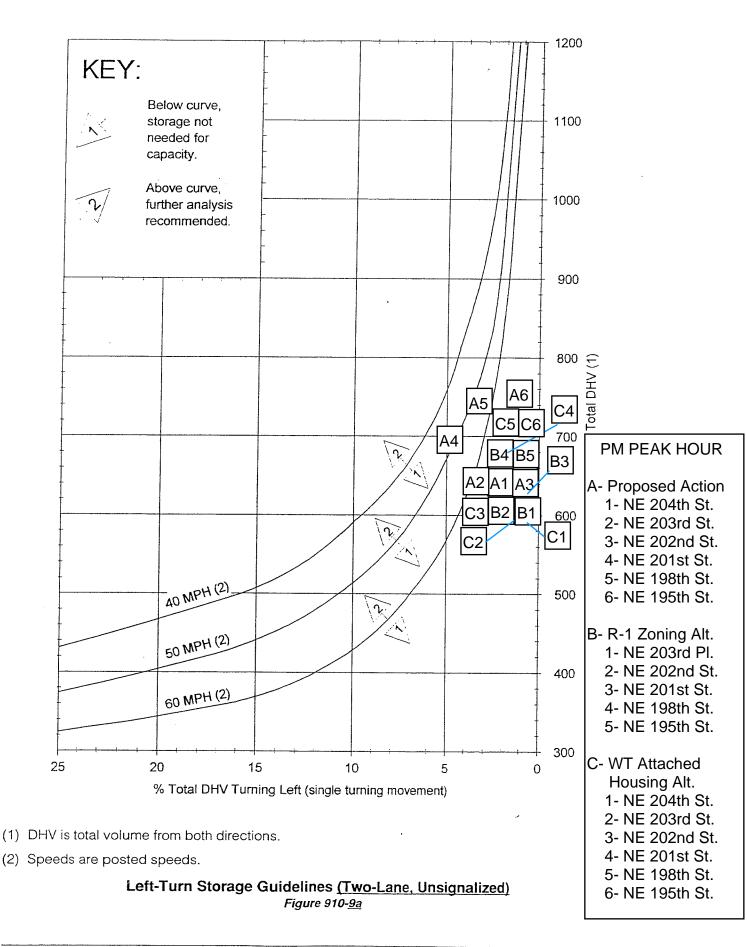


	20068 No Action Conditions			200 <mark>68</mark>	20068 with Proposed Action			0 <mark>68</mark> with R-	1 Zoning	200 <mark>68</mark> with Attached Housing			
Weekday AM Peak Hour	LOS <sup>1</sup>	Delay <sup>2</sup>	WM or V/C³	LOS	Delay	WM or V/C	LOS	Delay	WM or V/C	LOS	Delay	WM or V/C	
156 <sup>th</sup> Ave NE/NE 203 <sup>rd</sup> PI	В	10.0	WB App.	В	10.2	WB App.	В	10.7	EB App.	В	10.2	WB App.	
156 <sup>th</sup> Ave NE/NE 202 <sup>nd</sup> St	В	10.1	EB App.	В	10.3	EB App.	В	10.2	EB App.	В	10.3	EB App.	
156 <sup>th</sup> Ave NE/NE 201 <sup>st</sup> St	В	10.5	EB App.	В	11.1	EB App.	В	10.6	EB App.	В	10.9	EB App.	
156 <sup>th</sup> Ave NE/NE 198 <sup>th</sup> St	В	11.7	WB App.	В	12.6	WB App.	В	11.9	WB App.	В	12.3	WB App.	
156 <sup>th</sup> Ave NE/NE 195 <sup>th</sup> St	В	12.5	WB App.	В	13.1	WB App.	В	12.7	WB App.	В	13.1	WB App.	
156 <sup>th</sup> Ave NE/NE Woodinville-Duvall Rd	С	20.5	0.79	С	21.6	0.82	С	20.9	0.80	С	21.4	0.81	
NE Woodinville-Duvall Rd/NE Woodinville Wy	A	6.9	0.45	А	7.0	0.46	А	6.9	0.45	А	6.9	0.46	
NE Woodinville-Snohomish Rd/NE 195 <sup>th</sup> St	С	29.8	0.91	С	30.0	0.91	С	29.8	0.91	С	30.0	0.91	
	20068 No Action Conditions			200 <u>68</u> with Proposed Action			20068 with R-1 Zoning			200 <u>68</u> with Attached Housing			
Weekday PM Peak Hour	LOS	Delay <sup>2</sup>	WM or V/C³	LOS	Delay	WM or V/C	LOS	Delay	WM or V/C	LOS	Delay	WM or V/C	
156 <sup>th</sup> Ave NE/NE 203 <sup>rd</sup> PI	В	11.3	WB App.	В	11.7	WB App.	В	12.3	EB App.	В	11.5	WB App.	
156 <sup>th</sup> Ave NE/NE 202 <sup>nd</sup> St	В	11.0	EB App.	В	11.4	EB App.	В	11.3	EB App.	В	11.5	EB App.	
156 <sup>th</sup> Ave NE/NE 201 <sup>st</sup> St	В	11.3	EB App.	В	12.2	EB App.	В	11.5	EB App.	В	11.9	EB App.	
156 <sup>th</sup> Ave NE/NE 198 <sup>th</sup> St	С	15.3	WB App.	С	17.9	WB App.	С	15.8	WB App.	С	16.9	WB App.	
156 <sup>th</sup> Ave NE/NE 195 <sup>th</sup> St	С	15.3	WB App.	С	17.2	WB App.	С	15.9	WB App.	С	16.8	WB App.	
240 <sup>th</sup> St. SE/75 <sup>th</sup> Ave. SE	<u>B</u>	<u>12.2</u>	EB App.	<u>B</u>	<u>12.7</u>	EB App.	<u>B</u>	<u>12.3</u>	EB App.	<u>B</u>	<u>12.5</u>	EB App.	
156 <sup>th</sup> Ave NE/NE Woodinville-Duvall Rd	С	26.3	0.93	С	32.7	0.97	С	27.5	0.94	С	30.7	0.94	
NE Woodinville-Duvall Rd/NE Woodinville Wy	С	28.8	0.83	С	30.3	0.85	С	29.2	0.83	С	29.9	0.85	
NE Woodinville-Snohomish	С	30.0	0.81	С	30.7	0.82	С	30.2	0.81	С	30.6	0.82	
Rd/NE 195 <sup>th</sup> St													

### EXHIBIT T-9: Development LOS Summary

Level of Service.
 Average vehicle delay (seconds).
 Worst movement reported at unsignalized intersections; volume to capacity ratio at signalized intersections.

Exhibit T-10



### Highway Capacity Manual 2000

Equation 17-3 is also used for major-street leftturn movements

where

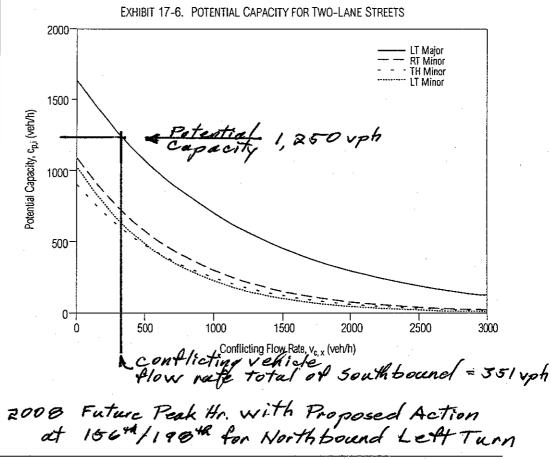
- $c_{p,x} = v_{c,x} \frac{e^{-v_{c,x}t_{c,x}/3600}}{1 e^{-v_{c,x}t_{r,x}/3600}}$
- potential capacity of minor movement x (veh/h), C<sub>p,x</sub>
  - conflicting flow rate for movement x (veh/h), =
- V<sub>c,x</sub> critical gap (i.e., the minimum time that allows intersection entry for t<sub>c.x</sub> one minor-stream vehicle) for minor movement x (s), and
- follow-up time (i.e., the time between the departure of one vehicle from  $t_{fx}$ the minor street and the departure of the next under a continuous queue condition) for minor movement x (s).

The potential capacity of a movement is denoted as  $c_{p,x}$  (for movement x) and is defined as the capacity for a specific movement, assuming the following base conditions:

- Traffic from nearby intersections does not back up into the subject intersection.
- A separate lane is provided for the exclusive use of each minor-street movement.
- An upstream signal does not affect the arrival pattern of the major-street traffic.
- No other movements of Rank 2, 3, or 4 impede the subject movement.

#### **MOVEMENT CAPACITY**

The potential capacity, c<sub>p.x</sub>, of minor-street movements is given in Exhibit 17-6 for a two-lane major street and in Exhibit 17-7 for a four-lane major street. These figures show the application of Equation 17-3 with the values presented in Exhibit 17-5. The potential capacity is expressed as vehicles per hour (veh/h). The exhibits indicate that the potential capacity is a function of the conflicting flow rate v<sub>c,x</sub> expressed as an hourly rate, as well as the minor-street movement.



Chapter 17 - Unsignalized Intersections Methodology - TWSC Intersections

Potential capacity defined